

**PUBLIC ACCOUNTS COMMITTEE
(1977-78)**

(SIXTH LOK SABHA)

**TWENTY-SEVENTH REPORT
PURCHASE OF FERTILISERS
FROM ABROAD**

**MINISTRY OF SUPPLY AND REHABILITATION
(DEPARTMENT OF SUPPLY)**

**MINISTRY OF AGRICULTURE AND IRRIGATION
(DEPARTMENT OF AGRICULTURE)**

**[Paragraph 41 of the Report of the Comptroller &
Auditor General of India for the year 1973-74, Union
Government (Civil)]**



**(Presented in Lok Sabha on 19 December, 1977.
Laid in Rajya Sabha on 19, December, 1977)**

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NEW DELHI**

December, 1977 Agrahayana, 1899 (Saka)

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PART II*

Minutes of the sittings of the Public Accounts Committee held on
13 and 14 August, 1975 and 16 November, 1977

*Not Printed. One cyclostyled copy laid on the Table of the House and five copies placed in the Parliament Library.

PUBLIC ACCOUNTS COMMITTEE
(1977-78)

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Shri C. M. Stephen

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22. Shri Zawar Hussain

SECRETARIAT

1. Shri B. K. Mukherjee—*Joint Secretary.*
2. Shri Bipin Behari—*Senior Financial Committee Officer.*

*Elected w.e.f. 23 November, 1977 *vice* Sarvashri Sheo Narain and Jagdambi Prasad Yadav ceased to be Members of the Committee on their appointment as Ministers of State w.e.f. 14-8-1977.

INTRODUCTION

I, the Chairman of the Public Accounts Committee, as authorised by the Committee, do present on their behalf this Twenty-Seventh Report of the Public Accounts Committee (Sixth Lok Sabha) on paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil) relating to the Ministry of Supply and Rehabilitation (Department of Supply) and Ministry of Agriculture and Irrigation (Department of Agriculture) on Purchase of Fertilizers from abroad.

2. The Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil) was laid on the Table of the House on the 30 April, 1975. The Public Accounts Committee (1975-76) examined the paragraph relating to the Purchase of Fertilizers from abroad at their sittings held on 13 and 14 August, 1975 but could not finalise the Report on account of dissolution of Lok Sabha on 18 January, 1977.

3. This Report is based on the evidence taken by the Public Accounts Committee (1975-76) and information furnished by the Ministries of Supply and Rehabilitation (Department of Supply), Agriculture and Irrigation (Department of Agriculture), Chemicals and Fertilizers and Commerce.

4. The Report was considered and adopted by the Public Accounts Committee (1977-78) at their sitting held on 16 November, 1977. The Minutes of the sittings of the Committee form Part II* of the Report.

5. A statement containing conclusions/recommendations of the Committee is appended to the Report (Appendix XXIV). For facility of reference these have been printed in thick type in the body of the Report.

6. The Committee place on record their appreciation of the commendable work done by the Public Accounts Committee (1975-76) in taking evidence and obtaining information.

*Not Printed. (One cyclostyled copy laid on the Table of the House and five copies placed in Parliament Library).

7. The Committee place on record their appreciation of the assistance rendered to them in the examination of the subject by the Comptroller and Auditor General of India.

8. The Committee would also like to express their thanks to the officers of the Ministries of Supply and Rehabilitation (Department of Supply), Agriculture and Irrigation (Department of Agriculture), Chemicals and Fertilizers, Commerce, Finance (Department of Economic Affairs and Expenditure), Law, Justice and Company Affairs and Minerals and Metals Trading Corporation of India for the cooperation extended by them in giving information to the Committee.

NEW DELHI;

December 6, 1977.

Agrahayana 15. 1899 (S)

C. M. STEPHEN.

Chairman,

Public Accounts Committee.

REPORT
CHAPTER I
PLANNING FOR IMPORTS

Audit paragraph

1.1. The main chemical fertilisers used in India are shown below, with the percentage of nutrition contents (*viz.*, nitrogen or 'N', phosphorus or 'P' and potassium or 'K') shown in brackets:

(i) *Nitrogenous fertilisers*

- Ammonium sulphate (20.6 per cent N)
- Ammonium sulphate nitrate (26 per cent N)
- Ammonium chloride (25 per cent N)
- Calcium ammonium nitrate (20.5 to 26 per cent N)
- Urea (46 per cent N)

(ii) *Phosphatic fertilisers*

- Single superphosphate (16 to 20 per cent P)
- Triple superphosphate (46 per cent P)

(iii) *Potassic fertilisers*

- Muriate of potash (58 to 60 per cent K)
- Sulphate of potash (48 to 52 per cent K)

(iv) *Complex and compound fertilisers*

- Ammonium phosphate sulphate (16 to 20 per cent N and 19.5 to 20 per cent P)
- Di-ammonium phosphate (18 per cent N and 46 per cent P).
- Urea ammonium phosphate (20 per cent N and 20 per cent P or 28 per cent N and 28 per cent P)
- Nitrophosphate (20 per cent N and 20 per cent P)
- Nitrophosphate with potash (18 per cent N, 18 per cent P, 18 per cent K or 15 per cent N, 15 per cent P, 15 per cent K)
- NPK complex and mixtures (different grades with various proportions of N:P:K, such as, 15—15—15, 14—36—12, 14—14—14, 13—13—13, 12—24—12, 12—32—16, 10—26—26, etc.).

1.2. Use of chemical fertilisers in India started towards the end of the 19th century in plantation crops like tea, coffee, etc. In the context of planned economic development after independence, use of these fertilisers became popular with the Indian farmers. With the introduction of high yielding variety seeds of food-crops in the mid-sixties, use of chemical fertilisers in India increased to a great extent. From meagre 0.71 lakh tonnes in 1951-52, consumption of fertilisers (in terms of nutrients) in India went up to 7.84 lakh tonnes in 1965-66 and 26.99 lakh tonnes in 1972-73. India is still among the countries with the lowest fertiliser consumption rates in the world, though.

1.3. The extent to which India has been depending on imports of fertilisers can be seen from the following table:

Year	Consumption (Lakh tonnes of nutrients)	Import (N+P+K)	Percentage (Import to consumption)	Value of Imports (Crores of Rupees)
1968-69	16.74	10.36	61.88	163.00
1969-70	19.89	7.62	38.31	116.77
1970-71	21.77	6.33	29.00	95.87
1971-72	26.21	9.70	37.00	90.23
1972-73	26.99	12.19	45.00	118.81
1973-74	27.83	12.56	45.00	183.49

1.4. Import requirements are worked out by the Department of Agriculture on the basis of the stock position, estimated requirements ascertained from the State Governments and other major consumers, and the estimates of domestic production prepared by the Ministry of Petroleum and Chemicals. These requirements are approved by the Standing Committee of Fertilisers and, where necessary, by the Committee of Economic Secretaries. The Minerals and Metals Trading Corporation arranges import of fertilisers against rupee payment under bilateral trade agreements. The Department of Supply arranges import from the rest of the world. Purchases made by the Department of Supply abroad constituted nearly 72 per cent of the total purchases during 1970-71, 1971-72 and 1972-73.

1.5. The following table illustrates how quickly estimated requirements for 1972-73 (to be imported by the Department of Supply) were changed by the Department of Agriculture:

Item	Original demand in March 1972 (tonnes)	Subsequent modifications
Urea from U.K. and West Europe	82,500	Actual purchase in May 1972 against modified demand was 1,23,000 tonnes.
Muriate of Potash from U.K. and West Europe.	22,000	Actual purchase against modified demand in May 1972 was 65,000 tonnes.
Total requirement of Urea	2,73,000	Total purchase during the year against modified demands were 15.08 lakh tonnes.

1.6. Changes in estimates for imports were due mainly to shortfall in indigenous production and imports by Minerals and Metals Trading Corporation from rupee payment areas. The Department of Agriculture stated (February 1975) that changes in estimates had also to be made depending on availability of foreign exchange.

1.7. The following table shows the estimates of indigenous production of fertilisers in terms of nitrogen (N) and phosphorus (P) vis-a-vis actual production (potassic fertilisers are not manufactured in India):—

Year		Estimates of indigenous production given by Ministry of Petroleum and Chemicals from time to time			
		Original	Revised	Further revised	Actual production
1969-70	N:	9.17	8.50	8.50	7.16
	P:	Nil	3.10	3.10	2.22
1970-71	N:	12.28	10.50	8.50	8.30
	P:	4.20	3.20	2.30	2.30
1971-72	N:	14.20	13.20	11.90	9.42
	P:	4.20	3.30	3.30	2.87
1972-73	N:	18.20	14.05	12.13	10.60
	P:	4.76	3.96	4.10	3.26

1.8. The Minerals and Metals Trading Corporation had promised to procure, among other things, 7.50 lakh tonnes of urea during 1972-73 from East European countries. By June 1972, however, it was evident that imports during 1972-73 from East European countries would be far less than what was expected. In that year actual imports by Minerals and Metals Trading Corporation were only 2.65 lakh tonnes. The Department of Agriculture had observed in June 1972 that with better economic intelligence this could have been foreseen and alternative arrangements for import could have been made in time.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), pp. 98—100].

A. Preliminary observations

1.9. The Audit paragraph points out that the imports of fertilisers had steadily increased from 6.33 lakh tonnes of nutrients (N+P+K) in 1970-71 to 12.56 lakh tonnes in 1973-74 and that the percentage of import to consumption increased from 29 per cent in 1970-71 to 45 per cent in 1973-74. The following table furnished, at the Committee's instance, by the Department of Agriculture indicates the relevant position in this regard in 1974-75:

	(In lakhs tonnes)
	(N+P+K)
Domestic Production (January—December, 1974)	14.31 ^a
Imports (January—December 1974)	14.00
Consumption (February 1974—January 1975)	25.79
Percentage of Imports to consumption	54.6%
Value of imports	Rs. 402.45 crores.

^aIn 1974-75, the Plan estimate of domestic production was 18.5 lakh tonnes of N and 5.76 lakh tonnes of P. The first revised estimate of domestic production intimated by Petroleum and Chemicals was 15.00 lakh tonnes of N and 3.65 lakh tonnes of P. Actual production was 11.85 lakh tonnes of N and 32.7 lakh tonnes of P.

1.10. Since the statistics in regard to India's increased dependence on imports to meet its requirements of fertilisers, presented a disquieting picture, the Committee desired to know the factors contributing to this state of affairs. The Additional Secretary of the Department of Agriculture stated in evidence:

“At the outset I would say that in calculating the percentage of imports to consumption perhaps it would be more correct to exclude potassium, because we do not produce it indigenously;

it is not available here. So, to get a correct figure of import percentage to consumption we should exclude that. We have made an exercise excluding potassium, which indicates the following trend. We will also submit it to the Committee. In 1968-69, the percentage is 61.76; in 1969-70, it is 42.89."

He added:

"Roughly, based on these calculations in 1973-74 our percentage of import to consumption would come to 35.24 and not 45; in 1974-75 it is 43 per cent. This percentage depends both on the estimated requirements and the indigenous production."

1.11. The following table, furnished subsequently by the Department of Agriculture, indicates the percentage of imports to consumption, in terms of Nitrogen and Phosphorus after excluding Potassium, during the period from 1968-69 to 1974-75:

Year	Consumption	Import of	Percentage of imports to consumption
	of N and P	N and P	
	In lakh tonnes		
1968-69	15.00	9.82	61.76
1969-70	17.72	7.60	42.89
1970-71	20.20	5.00	25.20
1971-72	23.36	7.20	30.94
1972-73	24.21	8.60	35.60
1973-74	24.80	8.74	35.24
1974-75	24.51	10.65	43.78

1.12. On the Committee pointing out that even after excluding the imports of potash, which were unavoidable on account of there being no indigenous production, dependence of the country on imports of Nitrogenous and phosphatic fertilisers had increased since 1970-71, the Additional Secretary of the Department of Agriculture stated:

"It depends on the estimated requirements which is naturally progressively increasing. If the indigenous production does not keep up to estimated production, import goes up."

1.13. The following table, furnished at the Committee's instance by the Ministry of Petroleum & Chemicals (Department of Fertilisers) indicates the progress made in increasing the indigenous capacity for the production of fertilisers in the successive Plan periods and the actual production:

(Capacity in '000 tonnes)

Period	Capacity		Production		Growth of capacity		% Growth of Production	
	N ₂	P ₂ O ₅	N ₂	P ₂ O ₅	N ₂	P ₂ O ₅	N ₂	P ₂ O ₅
<i>First Five year Plan</i> 1955-56, last year	85	64	80	12	..	..	..	..
<i>Second Five year Plan</i> 1960-61 (last year)	242	95	98	52	+ 184.7	+ 48.4	+ 22.5	+ 133.3
<i>Third Five year Plan</i> 1965-66 (last Year)	548	228	233	111	+ 126.4	+ 140.0	+ 137.8	+ 113.5
<i>Fourth Five year Plan</i> 1973-74 (last year)	1939	560	1060	323	+ 253.8	+ 145.6	+ 354.9	+ 191.0
<i>Fifth Five year Plan</i> 1974-75 (first year)	1981	560	1185	327	+ 2.2	..	+ 11.8	+ 1.2

9

1.14. It would be seen from the above table that there has been a substantial gap between the installed capacity of the indigenous fertiliser industry and actual production. In the light of the increased emphasis being placed on reducing the country's dependence on imports, the Committee enquired into the reasons for the low capacity utilisation of the indigenous fertiliser industry which, *prima facie*, presented a rather dismal picture and the steps, if any, proposed to be taken to step up indigenous production so as to reduce imports. The Additional Secretary of the Department of Agriculture stated in evidence:

“Mr. . . . will be able to answer the question of indigenous production and the plans for improving and increasing the same. As far as Department of Agriculture is concerned, I would like to assure you straightaway that we are taking steps to increase the use of organic fertilisers as much as possible and we are encouraging farmers to use compost from the Municipalities and so on, so as to try to reduce dependence on inorganic chemicals as far as possible.”

The Secretary, Department of Fertilisers & Chemicals stated in this connection:

“Regarding indigenous production of fertilisers, I would be covering it in extenso later. I hope to make detailed observations at that stage.”

The difficulties faced by the indigenous fertiliser industry and steps taken to improve its performance have been discussed by the Committee, in greater detail, in Chapter V of this Report.

B. Estimates of annual requirements

1.15. According to the Audit paragraph, the estimated requirements of fertilisers to be imported by the Department of Supply in 1972-73 were periodically changed by the Department of Agriculture. Thus, while a demand for the import of 82,500 tonnes of urea from the United Kingdom and West Europe had been initially placed in March 1972, the actual purchase made in May, 1972 (just two months later) against a modified demand amounted to 1,23,000 tonnes, representing an increase of nearly 50 per cent. Similarly, the actual purchase of Muriate of Potash from the United Kingdom and West Europe, against the initial demand of 22,000

tonnes (March, 1972), amounted to 65,000 tonnes in May, 1972, the increase in this case being nearly 200 per cent. The total purchases of 15.08 lakh tonnes of urea during 1972-73 against modified demands also bore no relation to the initial requirements of 2.73 lakh tonnes projected in March, 1972. The Committee learnt from Audit that the Department of Agriculture had stated (February 1975) in this connection as follows:

“The procedure followed in the Ministry of Agriculture for assessing the annual import requirements of fertilisers has been to estimate a year in advance the annual agronomic requirements of fertilisers to support the agricultural production programmes of that year. These requirements are themselves subject to modifications which might be necessary as a result of fluctuations in demand due to adverse seasonal conditions, special programmes which may be taken up by the States subsequent to the initial assessment, etc. The import requirements are worked out by deducting the domestic production as estimated by the Petroleum and Chemicals Ministry from the total agronomic requirements. However, it has been the experience of the Ministry of Agriculture that the actual indigenous production is far below the estimates given earlier by the Ministry of Petroleum and Chemicals. The import requirements thus worked out are intimated to the Department of Economic Affairs for authorisation of imports and allotment of necessary foreign exchange. Here again the Department of Economic Affairs authorises imports of quantities less than what has been estimated by the Ministry and also allots foreign exchange only in instalments. It may thus be seen that there are a number of factors which take place subsequent to the original assessment of import requirements by the Ministry of Agriculture which require mid-term adjustments in the purchase programmes. The procedure outlined above was also followed during the period covered by the draft Audit paragraphs.”

1.16. The Committee desired to know the basis on which the fertiliser requirements for 1972-73 were worked out and the reasons for the wide variations between the original and subsequent demands of Urea and Muriate of Potash. In a note, the Department of Agriculture stated:

“Fertiliser requirements of 1972-73 were finalised initially on 27th October, 1971 by the Standing Committee on Fertilisers. The method adopted to project the requirements was to grant 20

per cent and 25 per cent increase over the consumption of the previous Kharif and Rabi season respectively. Based on the requirements projected on the above lines and the then estimated domestic production for 1972-73, the import requirements were worked out to be 8.69 lakh tonnes of N, 4.06 lakh tonnes of P_2O_5 and 3.04 lakh tonnes both for 1972-73. These requirements were communicated to the Department of Economic Affairs on 6th November, 1971, for the allocation of necessary foreign exchange to effect the imports.

Since the foreign exchange position was not very happy at that time, the Department of Economic Affairs could not release the necessary foreign exchange immediately. However, on 2nd December, 1971, the latter authorised imports worth \$ 47 million from the Rupee payment areas and \$ 5 million from the hard currency area. An import plan was immediately chalked out within this allocation.

The Committee of Economic Secretaries, which went into the details of the projected requirements of fertiliser desired at its meeting held on 7th December, 1971 that a sub-committee should go into the projected requirement and evaluate a supply position *vis-a-vis* the requirement. The sub-committee headed by Shri Y. T. Shah, the then Additional Secretary, Foreign Trade, recommended in its report dated 13th December, 1971, *inter alia*, that demand projection for 1972-73 should be completed after allowing an increase of 23 per cent on the previous years consumption. The recommendations of the sub-committee were placed before the Committee of Economic Secretaries on 28th December, 1971 which, however, suggested a fresh look at the demand projections. The Sub-committee after studying in depth the consumption trends of previous years suggested that demand projection for Kharif, 1972 should be made on the basis of 15—20 per cent increase over the consumption of Kharif 1971 and for Rabi 1972-73 on the basis of 20—25 per cent increase over the consumption of the Rabi 1971-72. This suggestion was considered in the meeting of the Committee of Economic Secretaries in March 1972 and the latter decided that the demand for fertiliser should be worked out on the basis of 17 per cent increase over the consumption of the preceding Kharif and 22 per cent increase over the consumption of the preceding Rabi. Based on the above recommendations, the requirement of 1972-73 Kharif and Rabi worked out thus:

	(In lakh tonnes of nutrients)		
	N	P	K
Kharif, 1972	8.61	2.74	1.39
Rabi, 1972-73	12.95	3.94	2.20
Total :	21.56	6.68	3.59
1st revised estimate of domestic production	14.05	3.96	NIL
Import requirement	7.51	2.72	3.59

As regards the reasons for the quick changes in the estimates of requirements and subsequent modifications of the demand, the Department stated:

"The import requirements of fertilisers for Kharif 1972 and Rabi, 1972-73 originally worked out on 27th October, 1971 and communicated to the Department of Economic Affairs on the 6th November, 1971 were as follows:

Season	(In lakh tonnes of nutrients)	
	N	K
Kharif, 1972	2.25	0.05
Rabi, 1972-73	6.36	2.99
Total :	8.61	3.04

The position regarding availability of foreign exchange in that period was very uncertain and prospects for aid and credit for purchase of fertilisers un-predictable. Hence communications regarding the quantities to be imported during the year had to be made from time to time as and when foreign exchange became available.

During 1972-73, the MMTC was expected to procure 7.5 lakh tonnes of Urea. In March 1972 they gave an indication that they hope to procure only 3.2 lakh tonnes of Urea during the period upto September, 1972. In fact, they succeeded in procuring only 2.27 lakh tonnes in 1972-73. The domestic production of N originally estimated at 18.2 lakh tonnes was revised to 14.05 lakh tonnes and then again to 12.6 lakh tonnes. The actual production of N was only 10.60 lakh tonnes. All this necessitated greater imports from free foreign exchange areas by the Department of Supply.

On the basis of the position regarding availability of credit, the Department of Supply was requested to make the following purchases of Urea from U.K. and West Europe in our D.O. No. 1-9/71-MPR dated March 24, 1972:

Name of Country	Credit available (in million \$)	Quantity of Urea to be purchased (in tonnes)
Italy	1.0	15,000
U.K.	3.0	45,000
Holland and Belgium	1.5	22,500
Total :	5.5	82,500

Simultaneously the Department of Supply was also requested to purchase 50,000 tonnes of Urea against IDA credit and 75,000 tonnes of Urea from the free foreign exchange resources. Hence additional quantities of fertilisers were purchased from U.K., Holland and Belgium by utilising free foreign exchange resources. As a result the total purchases were as follows:

Name of Country	Purchased against credit	Purchased again free foreign exchange
Italy	7,000	—
UK	48,000	12,000
Holland and Belgium	24,600	31,400
Total :	79,600	43,400

Thus the total purchases worked out to 1,23,000 tonnes. This position would make clear that there was no change whatsoever in the requirements communicated by the Department of Agriculture. Additional purchases were made against free foreign

exchange resources indicated to the Department of Supply simultaneously.

On a request for purchase of 60,000 tonnes of MOP Special grade for Madras Fertiliser Ltd. received from the Department of Fertilisers and Chemicals, the Department of Economic Affairs desired that the purchase should be made out of the foreign exchange allocations already made for the Department of Agriculture for import of fertilisers. However, owing to shortage of foreign exchange, it was not possible for the Department of Agriculture to do this. It was proposed to purchase 22,000 tonnes of MOP Special grade from West Germany against the German credit of \$ 1.37 million (in addition to 4,000 tonnes of SOP) through our D.O. No. 1-9/71-MPR dated March 24, 1972.

Subsequently Madras Fertiliser Ltd. modified their requirements of MOP special grade to 65,000 tonnes. The Department of Economic Affairs clarified on 10th April, 1972 that a total credit of dollars 4.81 million would be available from West Germany. Accordingly, the Department of Supply was requested on 11th April, 1972 to procure 65,000 tonnes of special grade MOP from West Germany.

The import requirement for 1972-73 was originally estimated at 8.61 lakh tonnes of Nitrogen (equivalent to 18.8 lakh tonnes of Urea) and communicated to the Department of Economic Affairs on the 6th November, 1971. As against this requirement, foreign exchange of 47 million dollars was released on the 2nd December, 1971 for imports from rupee payment areas. A foreign exchange of dollars 5 million was also released for imports from free foreign exchange areas. It was decided that out of the foreign exchange allocation for imports from RPA, 6 lakh tonnes of urea should be imported and that the entire foreign exchange allotment for imports from free foreign exchange areas should be utilised for importing 16,000 tonnes of DAP.

Subsequently foreign exchange of 46 million dollars was released for imports from free foreign exchange areas. The Department of Supply was informed on the 4th April, 1972 that out of this foreign exchange allocations, 2.73 lakh tonnes of Urea should be imported. In the meantime the Department of Economic Affairs authorised an import of additional 1.5

lakh tonnes of Urea from rupee payment areas thus increasing the total authorisation to 7.5 lakh tonnes of Urea. Subsequently Norwegian aid for importing 0.4 lakh tonnes of Urea became available. Later the West European credit was increased from 11.5 million dollars to 13 million dollars. This additional credit was utilised for import of Urea (of about 21,000 tonnes). Some quantities of ANPs and NPKs which are originally proposed to be imported could not be obtained and had to be replaced by urea in order to ensure that there are no shortages of Nitrogen. Later foreign exchange of 15 million dollars was released for import of nitrogenous fertilisers. This is again utilised for import of Urea (of about 2.1 lakh tonnes). Subsequently in view of the failure of the MMTC to procure adequate quantities of Urea and in view of shortfall in domestic production, it became necessary to import larger quantities of urea from free foreign exchange areas. Accordingly, an additional foreign exchange allocation of 13.3 million dollars was made on 14th June, 1972 (which could provide urea of about 1.86 lakh tonnes).

As a result of all these developments the total quantities of U.K. imported for 1972-73 increased from 2.73 lakh tonnes to 7.45 lakh tonnes.

As regards the figure of 15.08 lakh tonnes mentioned in the Audit paragraph, it may be pointed out that this figure comprises of imports of Urea not only for 1972-73 but also for 1973-74.

The import requirements for Kharif 1973-74 were worked out on the 28th October, 1971. Foreign exchange of 22 million dollars was released and the import of 1.5 lakh tonnes of Nitrogen authorised by the Department of Economic Affairs on 4th July, 1972. In the FPC meeting held on 14th July, 1973, this Department suggested the purchase of 3.2 lakh tonnes of Urea for meeting this requirement. The import requirements of fertilisers for Rabi 1973-74 were worked out and communicated to the Department of Economic Affairs on the 28th October, 1971. The import of 8.94 lakh tonnes of Nitrogen were authorised and foreign exchange of dollars 134.1 million released by the Department of Economic Affairs on 15th September, 1972. Against this authorisation, this Department proposed the import of 11.45 lakh tonnes of Urea. Out of the total imports of 15.07 lakh tonnes made

during 1972-73, imports of 7.52 lakh tonnes of Urea were actually made for use during 1973-74. These are as follows:

Date of contracting	Supplier	Quantity (M.T.)
September 1972	Mexico	12,500
	Kuwait	40,000
	Japan	200,000
December 1972	Nitrex	120,000
January 1973	Anic, Italy	60,000
	ICI/UK	20,000
February 1973	Japan	300,000
Total :		752,500 or 7.52 lakh tonnes'

1.17. The Additional Secretary of the Department of Agriculture, however, conceded during evidence that "in the past, the nature of the methods of assessment of the requirement of fertilisers was *not very satisfactory*" (emphasis added). He added:

"As you are aware, fertiliser is one of the most important inputs in our agricultural production programme. It is really an essential item, for which we should spend any amount of foreign exchange to import, if that becomes necessary, for lack of sufficient indigenous production.

Regarding estimation of total requirements, we have evolved recently a very scientific method by which we take into account the actual consumption in each State and also the level of consumption reached in individual States and then by a scientific method, standardise the acreage and then allow, based on our experience and our assessment of the progress, they are likely to make in the succeeding years, a suitable increment on this. We have been able to evolve a method, as realistic as we could, under the circumstances taking into account the production programme which we need and which we have indicated to individual States and then arrive at a total demand. Thereafter, we check with the Fertiliser & Chemicals Department the indigenous production they anticipate in the year of import. After taking into account all these things, we arrive at the total demand of the various fertilisers required for the import programme of the concerned year and also simultaneously approach for release of foreign

exchange the Department of Economic Affairs who, depending upon the availability of foreign exchange with them, give credit or free foreign exchange or ask us to get from rupee payment countries, as the case may be.

In the past, for the information of this Committee, I may mention that there used to be some difficulty in getting foreign exchange at one time. Therefore, in the last 1½ years, if I am right, they have been good enough to give us a bulk allotment of foreign exchange straightway, which has enabled us to streamline and overcome some of the difficulties which we have faced in the past in procuring this through the Department of Supplies and the MMTC who handles the rupee payment import."

1.18. Asked whether there was any difficulty in regard to the timely placement of demands, based on a realistic assessment of requirements, and the actual procurement, the witness replied:

"Some of the difficulties which may arise are only these. While we need fertiliser, and this, as you know, depends on the seasonality and it has to be given urgently after the sowing at different stages for the growth of the crop, sometimes due to various other considerations, they may ask questions whether we need this immediately or can we not wait for some time or can we go elsewhere. Then we insist that we have given you our indent quite earlier and we want this urgently. We also tell them that our crops cannot wait for your convenience."

1.19. Since the Audit paragraph appeared to indicate that the estimation of requirements of fertilisers was far from satisfactory which, in turn, adversely affected their timely and most economical procurement by availing of the best market conditions, the Committee desired to know whether it was not possible to streamline the procedure for assessing the requirements more accurately. The Additional Secretary of the Department of Agriculture stated in evidence:

"As I mentioned . . . we have evolved in the last two years a more scientific method and as realistic a method as possible. We take every State and find out from them the best consumption level of the season as they would like to indicate to us. Then we take into account the agronomic dosages recommended by the experts in the Ministry. In many cases they do not always come up to the recommended dosage which is quite high. Therefore, we take the actual consumption level of a high-yielding variety and then standardise the acreage in respect of other non-high yielding crops also which take lesser inorganic ferti-

lisers. Thus we come to the actual dosage and then allow a certain increment based on assessment by our experts of the possibilities of that increase being achieved by the concerned State. Then the whole thing is added up. That gives us the total requirements based on the production programmes. Then we check up with the Department of Fertilisers and Chemicals the indigenous production anticipated by them. We deduct this and then come to the conclusion that the balance will have to be imported. Thereafter we approach the Economic Affairs Department for foreign exchange. In the past, the Economic Affairs Department, because of the various constraints in the availability of free foreign exchange and credits, used to release either credit or free foreign exchange, as the case may be, or sometimes tell us to get from rupee payment countries which procurement is done by the MMTC. As you rightly pointed out, these figures, even after this exercise, change. That is because of the shortfall in the indigenous production from time to time. As you would have noticed from the figures, there have been considerable variations and these put us into difficulties."

Asked whether such periodical revision of the estimates of requirements did not create problems in procurement, the witness replied:

"Our Department is helpless in the face of the assurance given by the Ministry of Petroleum and Chemicals: when we have an assurance from the Ministry of Petroleum and Chemicals, there is no point in our insisting on an upward revision of our imports."

1.20. As regards the periodical revision of the estimates of indigenous production, the Secretary, Department of Fertilisers & Chemicals stated:

"In order to arrive at a correct position, we have to have three parameters. Firstly, we must have a clear understanding of what will be consumed in the country. This may or may not be based on growth rate, this may or may not be based on agronomic considerations; often it would be based on the mood of the peasants, the pricing policy in respect of fertilisers and various other factors. Therefore, the first judgement which has to be made is what is the quantum of fertilisers which will be actually consumed by the peasants. I may point out that this is, by no means, an easy task. Recently when we had gone for the meeting of the International Commission

on Fertilisers, we were told that in most of the developing countries and, for that matter, even in developed countries, they were not finding it easy to estimate the fertiliser consumption level in agriculture. By and large, I would say, what the Ministry of Agriculture is doing is quite good in international circumstances. But there is, in the nature of things, a certain amount of uncertainty. This is the first parameter. The second parameter is the one with which I am directly concerned—proper estimation of the fertiliser production indigenously. *We would not hesitate to concede that, over the past six to seven years, the estimations have not been accurate* (emphasis added). I think that at a later stage of the proceedings, in answer to several questions, we will be able to analyse what precisely went wrong and what corrective action we are now taking so as to ensure that we could make forecasts which, under any circumstances, will be fulfilled and which will take place. The third parameter, I would suggest, is the availability of fertilisers and their price abroad. I do not think that one can make a simplistic assumption that having worked out the demands of fertilisers and the indigenous supplies position even assuming that these two can be made very accurately, the balance would be made available without hesitation by the Department of Economic Affairs. You will appreciate that last year—in the last 18 months—the international price of fertilisers shot up to such an exorbitant level that our bill went out of our control. I should imagine, therefore, that there is some constraint also from the foreign exchange angle about how much can really be given.”

1.21. Explaining, at the Committee's instance, the corrective measures taken to ensure a more satisfactory and realistic forecast of annual requirements of fertilisers, the Joint Secretary (Inputs), Department of Agriculture stated:

“Sir, I would just mention something on the general assessment of the total agronomic requirements. Mr.... had also mentioned that this is the first and the most important factor which also determines the quantity of imports and the foreign exchange which is required; upto 1970, there was no problem of availability of fertilisers. It was only a question of persuading the farmers in all the States to take more and more consumption of fertilisers, and we in the Agriculture Ministry, had been assessing the consumption of fertilisers with reference

to what the State Governments have asked for. Upto 1970, the figures given by them were very inflated ones and it was also an irrational demand because the State Governments merely went by the recommended doses without any reference to levels of consumption in the State. It was, therefore, felt that the Ministry of Agriculture should themselves assess the requirements, even after the demands have been placed by the State Governments. From 1970, we were mainly giving an *ad hoc* increase over the consumption levels which were achieved in the States—it was an *ad hoc* increase of 25 per cent over the previous year's consumption. This was now found to be a little irrational. There was a Committee of Secretaries appointed under the chairmanship of Shri Y. T. Shah. They studied the trends of consumption and various other factors but still came to the conclusion that it was enough if we increase by a certain percentage over the Kharif consumption and a certain percentage increase over the Rabi consumption of the previous seasons. This was really a formula which was adopted to arrive at an agreed figure. The Committee of Secretaries agreed to 17 per cent increase in the Kharif and 22 per cent increase in Rabi. We followed this formula in assessing the requirements for different States for the Rabi of 1972 and the Kharif of 1973. But we found that many States were protesting against this method, because they felt that it does not take into account the fact that some States could even achieve a much higher level of consumption because they were starting with low levels of consumption. This was so particularly in the eastern States. These States felt that the formula would give a bias in favour of States which had already progressed far in respect of fertiliser consumption. So, the whole question was gone into once again. It was felt that the best method of rationalising the assessment of requirements of fertilisers would be to link it to the production programmes which were proposed and also the levels of application which had been reached in each State. So, the Ministry of Agriculture, in consultation with the State Governments, evolved a formula which had been briefly referred to by Mr. . . . by which we allowed, the States to choose the best consumption season. We, then take the coverages achieved in that season under different crops—high yielding and non-high yielding—and standardised the whole thing and by dividing the total consumption in the season by the total coverage, we arrived at a dosage figure actually reached in that season in that State. Then we allowed a differential

rate of increment on this dosage, *e.g.*, at the rate of 5 per cent in the case of Punjab and an increment of 20 per cent in the case of Assam. Then we ask the State Governments to indicate the coverage under the different crops which are proposed to be taken up in the season under consideration. This is checked with the Planning Commission figures—Crops Division figures—to see that the State Governments have not inflated their coverage figures. And then we multiply the total coverage proposed to be taken up in the coming season with the dosage rates which we have arrived at earlier. That is the figure arrived at by us for the requirements of that State. Then we total it for all the States. That is how the agronomic requirement to support the agricultural programmes of the coming season is decided for the entire country.”

The witness stated further:

“Mr. . . .’s point is that this may not really be an achievable target, because that is based on the production estimates and what the State will have to do in order to achieve these production targets. But, if we merely go by what consumption has been achieved in the past by all the States, then there would be a lot of difficulty because, as you know, in 1972 and 1973, the consumption was artificially depressed because there was no availability of fertilisers. So, if we just went by the consumption in these years, when we achieved 28 lakhs tonnes of consumption in 1972-73, how do we propose to achieve 36 lakhs tonnes of consumption in 1975? I would only say that in these two years, the consumption would have been much more if there were no constraints of availability. During 1974, that is, last year, the position was this. The actual consumption was lower than in the previous year. Consumption was not even 26 lakh tonnes. There were a variety of factors. 8 States had adverse seasonal conditions. There was steep price increase; there was inadequacy of credit. There were lot of distribution bottlenecks and there was the permit card system. There were a large number of constraints which applied last year. Merely to go by the consumption level for current year and therefore production would come down. The answer to that is to remove in the current year the bottlenecks which depressed consumption and to relate consumption level to production targets which we have set for ourselves and the coverage under different crops that we have set for ourselves.

This is the basis on which agronomic requirements are worked out, which is related to actual coverages proposed to be taken under different crops in States and also the actual level of fertiliser consumption reached to each State. This is a realistic method of formulating the requirements.

Two committees were appointed to review the basis for assessing requirements. One was under my Chairmanship, with a few representatives of the States. This formula was to be agreed to by the States. Developed States said that their requirements should be first met; since they have already established infrastructure. This is regarding States like Punjab, Haryana, etc. Developing States said we cannot be penalised because we have not been able to achieve in the past this high level of consumption. So we were not able to arrive at definite conclusion. The Ministry of Agriculture set up another committee under Mr. Sivaraman's chairmanship; this matter was gone into with the Planning Commission and Mr. Sivaraman wrote that in the context of easy availability of fertilisers there is no need to go into the finer details and that the formula already adopted by Ministry of Agriculture could be adhered to. We are now going by this formula."

A note furnished subsequently in this regard by the Department of Agriculture is reproduced in Appendix I. Copies of the reports of the Shah Committee and the Anna George Committee referred to above were also made available by the Department. A note indicating the methodology employed for collecting data on consumption of fertilisers, furnished by the Department to the former Committee, is also reproduced in the Appendix II.

1.22. The following statement, compiled from the information made available by the Department of Agriculture, indicates chronologically the manner in which the estimates of requirements for 1972-73 were periodically revised:

27-10-1971	Fertiliser requirements of 1972-73 finalised by the Standing Committee on Fertilisers by granting 20% and 25% increase over the consumption of the previous Kharif and Rabi seasons respectively.
6-11-1971	Requirements communicated to Department of Economic Affairs for allocation of necessary foreign exchange for imports.
2-12-1971	Imports worth \$ 47 millions from Rupee Payment Areas and \$ 5 millions from Hard Currency Areas Authorised.
7-12-1971	Committee of Economic Secretaries which went into the details of projected requirements desired that a sub-committee should go into the projected requirements and evaluate supply position <i>vis-a-vis</i> the requirement.
13-12-1971	Sub-Committee recommended, <i>inter alia</i> , that demand projection for 1972-73 should be computed after allowing an increase of 23% on the previous year's consumption.

- 28-12-1971 . . . Sub-Committee's recommendations placed before Committee of Economic Secretaries which, however, suggested a fresh look at the demand projections.
- 7-3-1972 . . . Sub-Committee suggested that the demand projection for Kharif, 1972 should be made on the basis of 15—20% increase over the Kharif, 1971 consumption and for Rabi 1972-73 on the basis of 20—25% increase over the consumption during the preceding Rabi Season.
- March 1972 . . . Committee of Secretaries decided that the demand for 1972-73 should be worked out on the basis of 17% increase over the consumption of the preceding Kharif season and 22% increase over the preceding Rabi consumption.

1.23. Since this appeared to indicate that the method of assessment of fertiliser requirements was changed a number of times within a short period, which inevitably led to unrealistic estimates, the Committee desired to know whether this could be considered satisfactory. Conceding that the methods of assessment of requirements were not very satisfactory' in the past, the Additional Secretary, Department of Agriculture reiterated that certain corrective measures, aimed at ensuring a more accurate forecast of requirements, had since been taken and informed the Committee that the requirements worked out on the basis of the revised formula, referred to earlier by the Joint Secretary, were not being gone into by various committees as in the past but were being accepted. He added:

“The only other exercise that is done after this is, we ascertain from the Department of Chemicals the indigenous production. We deduct it and put that as the demand required by the Agriculture Department for achieving the production targets. Thereafter, due to changes in indigenous production or non-availability from rupee payment countries or foreign exchange constraints, the actual purchases fall short at a particular stage during the import year and again it increases when the availability is better. This is the phenomenon you observe in the various Audit paras.”

1.24. In view of the fact that the requirements of fertilisers for the year 1972-73 appeared to have been finalised only in March 1972, the Committee desired to know how it was ensured that the peasants got their fertilisers in time. The witness stated in evidence:

“There is always a carry-over stock of 10 to 20 per cent for such emergencies. In these years, the constraint has been that purchases had to be made at different stages during the import year depending on the credits available from various countries. At the bottom of page 99, the entire thing happened because the Supply Department could actually go in for purchases only depending on the availability of credit or free foreign exchange

at that time. This is why there is difference between actual quantities indicated initially for purchase and the actual purchases made later.”

1.25. The following statement furnished by the Department of Agriculture indicates the foreign exchange allocations made, from time to time during 1970-75, and the dates on which these were made available:

(In million dollars)

Year	Date of allocation of foreign exchange	Amount allocated	Total
1970-71	18-2-1971	121.64	
	25-2-1971	1.98	123.62
1971-72	25-3-1971	5.03	
	19-5-1971	2.52	
	27-5-1971	1.16	
	7-7-1971	11.50	
	19-7-1971	9.99	
		6.05	
	24-7-1971	2.43	
		1.08	
	26-8-1971	7.67	
	27-10-1971	2.14	
	10-1-1972	1.50	
		51.92	
		16.22	
1972-73	4-4-1972	49.60	
	2-5-1972	15.00	
	1-6-1972	13.30	
	19-9-1972	19.29	219.34*
	10-8-1972	40.20	
	11-10-1972	203.62	243.82
1973-74	9-8-1973	280.45	
	29-1-1975	378.07	658.52
1974-75	24-2-1975	1080.00	

*This constitutes the revised and final allocation as against the original allocation of \$ 160.15 millions.

1.26. The Audit paragraph points out that the estimates of indigenous production of fertilisers had been periodically revised by the Ministry of petroleum and Chemicals. Thus, for instance, the original estimates of 14.20 lakh tonnes of Nitrogen, expected to be produced during 1971-72 had been revised later to 13.20 lakh tonnes and further revised to 11.90 lakh tonnes, while the actual production amounted to only 9.52 lakh tonnes. Similarly, as against the original estimates of 18.20 lakh tonnes, revised estimates of 14.05 lakh tonnes and further revised estimates of 12.13 lakh tonnes, the actual production of Nitrogen in the country during 1972-73 was only 10.60 lakh tonnes. The indigenous production of Phosphorus did not also come up to the levels originally estimated and subsequently revised during these years. According to the information furnished by the Department of Fertilisers and Chemicals, at the Committee's instance, the position in this regard was no better during 1973-74 and 1974-75, as can be observed from the following table:

(In lakh tonnes)

Year	Original Estimates	Revised Estimates	Annual production
1973-74	N : 16.00 P : 4.50	N : 13.30 N.F.	N : 10.60 N.F.
1974-75	N : 15.00 P : 4.00	N : 12.70 P : 3.50	N : 11.85 P : 3.27

N.F. : Not Furnished.

1.27. Drawing attention to the wide gulf that appeared to exist between the estimates of indigenous production projected by the Department of Fertilisers and Chemicals, on the basis of which the import strategy was determined often with disastrous results, and the actual production, the Committee enquired into the reasons for such wide variations and asked whether a more realistic estimation was not possible. The Secretary, Department of Fertilisers and Chemicals replied in evidence:

"We concede without any hesitation that on the basis of the past there has been a big gulf between the target and the actual production. There are two specific reasons. The biggest single reason is that most of these targets had been pitched at levels which were even higher than the installed capacities at that time on the assumption that new fertiliser projects would actually

be commissioned. We concede Namrup and the Barauni which ought to have been commissioned three years ago are still to be commissioned. These are two tragic cases. Even the private sector plants which have been planned were not commissioned in time. Therefore, the targets themselves should bear no relationship to the installed capacities.

Secondly, in the installed capacity itself we have the problems of operating at as high a level as possible and it is for this reason that this year we have changed the system and the target which has been given is based entirely on capacity which already exists, which means that we are in a position to monitor a system based on actual capacity which exists in the country and we have not taken any credit for the plants which are likely to be commissioned in the current year. We hope to get the additional production but in making the forecast we do not want to make any theoretical assumptions that the plants will be commissioned on 'X' date. Our experience has not been good enough in the past about the reliability of the dates when the fertiliser plants could be commissioned either in the private sector or the public sector. This has been the basic mistake of the past and our assumptions that the new plants would be commissioned on 'X' date did not materialise."

He added:

"I may say that in our estimation we take two factors into consideration. One is what is the production we can get from plants already in operation; secondly, we have an estimated date by which a new project will go into commission—and here, we have gone wrong. Last year, for instance, it was estimated while fixing the target that Namrup and Barauni would be commissioned, but they were not a commissioned. This year we have a target of 15.76 lakh tonnes which we have announced based only on the plants which are already in operation. We are of course expecting that Barauni and Namrup will be commissioned in the third quarter of this year and will start manufacturing. Two private sector plants would also start operating in October."

The witness stated further:

"The assumption that plants will be commissioned on 'X' date has been belied in the past. This year we want to make no such assumption. Before the Cabinet we are placing our estimates for the current year. We have estimated that the current year's production will be 15.75 lakh tonnes of nitrogen which is entirely based on the existing plants. I have no doubt that it

is going to be achieved. I hope 1975-76, you will see, will be the first year in which the target of production will be achieved."

1.28. A note furnished in this regard by the Department of Fertilisers and Chemicals, indicating the basis on which the estimates of indigenous production are worked out and the reasons for the periodical revision of the estimates during 1969-70 to 1974-75, is reproduced in Appendix III. Briefly, the following have been enumerated as the factors responsible for the shortfall in production targets at different times:

- (i) Power cuts and instability of power systems;
- (ii) occasional labour troubles;
- (iii) breakdown of plants and equipments;
- (iv) unplanned shutdowns because of unforeseen technological difficulties;
- (v) shortage in supply of critical inputs like feedstock and raw materials;
- (vi) old and ageing equipment in some of the plants like Sindri and Always; and
- (vii) slippage in the commissioning of new projects.

As regards the shortfalls in production *vis-a-vis* the estimates during 1973-74 and 1974-75, the Department have attributed these to the following factors:

1973-74:

- "(a) The slippages in the commissioning of the new plants and the difficulties experienced in stabilising production at the Durgapur and the Cochin plants which represent our first major effort towards maximum indigenisation. The contribution from the new units was only 84,800 tonnes as against a target of 2.25 lakh tonnes.
- (b) Substantial loss suffered by the operating units on account of the power constraint, labour trouble, raw material shortage etc."

1974-75:

- "(a) Additional loss of production at MFL due to continued plant shut down which extended upto November 1974;
- (b) Continuing difficulties of the Ko'a plant due to mechanical breakdowns, shortage of coal for power generation etc.;
- (c) Continued inability of the Durgapur and Cochin plants to stabilise and achieve the expected level of productions; and

- (d) Inadequacy of power and the instability of the power systems which affected several plants in varying degrees; the supply of power to Nangal was restricted to 72 MW from June, 1974 as against its requirement of 164 MW for optimum production. The Gorakhpur and Kanpur units were also subject to a 50 per cent power cut for about a month during the year."

1.29. The following table, furnished to the Committee by the Department of Fertilisers and Chemicals, indicates the extent of loss of production on account of various factors during the period 1969-70 to 1973-74:

(‘000’ tonnes of Nitrogen)

Factors	1969-70	1970-71	1971-72	1972-73	1973-74
(a) Unplanned shutdowns & plant breakdowns	73.1	62.3	77.5	21.5	61.3
(b) Shortage of raw material	76.8	98.1	92.7	61.9	60.5
(c) Shortage of utilities	4.6	8.1	7.7	11.3	4.6
(d) Power cut/fluctuations/ failures	5.1	44.8	34.4	60.7	130.2
(e) Labour trouble	2.5	0.8	28.1	30.1	27.8
(f) Design deficiency	24.2	24.0	24.0	22.0	22.0
(g) Operational and process difficulties	11.5	10.1	10.7	22.0	5.1
(h) Loss in aged plants (Estimated)	31.0	33.6	26.6	50.7	45.2
(i) Loss during commissioning of new capacity	37.4	138.4	58.7	57.7	..
(j) Others	39.8	14.8	10.3	73.4*	132.9†
	306.0	435.0	370.6	420.3	489.6

*Includes losses at Kanpur, Baroda and Vizag for which full break-up is not available.

†Includes loss of 105 thousand tonnes at Baroda due to floods, water salinity, urea reactor failure etc., at Vizag due to reformer limitations and at Neyveli due to prolonged shut downs for modifications etc.

1.30. Outlining the steps taken to ensure a more accurate estimation of the indigenous production of fertilisers, the Department of Fertilisers and Chemicals have stated as follows:

*“Arising out of past experience in estimating production of fertilisers, the Department has now revised the methods of estimation for the year 1975-76. The estimates of production made for 1975-76 are based entirely on the performance of operating units; no credit has been taken for production that is likely to come out of units expected to go on stream during the year 1975-76. Even in estimating production from the operating units, a suitable provision has been made for likely loss in production arising out of known constraints such as power cuts/fluctuations, shortage of raw material, labour problems etc. It is, therefore, expected that the actual production during the year 1975-76 would not vary from the target to any appreciable extent. It is, however, proposed to take a mid-year review in October 1975.”

1.31. At the instance of the Committee, the Ministry of Chemicals and Fertilisers have furnished on 29 June, 1977 the following statement showing the estimates of production of nitrogenous and phosphatic fertilisers vis-a-vis actual production during 1974-75, 1975-76 and 1976-77:

(Figures in lakh tonnes)

	Estimates of production				% of short fall (—) or % excess (+) over original target
	Original	Revised	Further revised	Actual production	
1974-75	Nitrogenous Fertiliser	15.00	14.33	12.7	— 21.0
	Phosphatic Fertiliser	4.00	3.50	3.50	— 18.25
1975-76	Nitrogenous Fertiliser	15.00	15.00	..	(+) 2.30
	Phosphatic Fertiliser	3.90	3.00	..	— 17.90
1976-77	Nitrogenous Fertiliser	19.50	19.50	..	— 32.60
	Phosphatic Fertiliser	4.80	5.00	..	4.80 Equal to original target.

1.32. Explaining the difference between the estimates of production and actual production of nitrogenous and phosphatic fertilisers during 1975-76

*Not vetted in Audit.

and 1976-77, the Ministry of Chemicals and Fertilisers have stated as follows:

“It would be seen that the original target of production for nitrogen in 1975-76 was not only achieved but, in fact, marginally exceeded by 2.3 per cent. The position was, however, not satisfactory in so far as P₂O₅ production in 1975-76 is concerned. As against the original target of 3.90 lakh tonnes, the industry could produce only 3.20 lakh tonnes. The shortfall in production of P₂O₅ was by no means due to any production or technical constraints. In fact, the industry was capable of producing substantially more than what it did in 1975-76, but for the major marketing constraints which resulted in very poor off take of phosphatics over which this Ministry had no control. Nor was the Ministry in a position to anticipate the demand situation which is subject to various imponderables like weather conditions, purchasing capacity of the farmer, input-output ratio etc. Because of the poor offtake, there was a slowdown in production by some units and a deliberate cut-back on production in many other units. This would be borne out by the industry's showing on phosphatic front in 1976-77 when the production was exactly equal to the original production target for P₂O₅, the details of which are given in the succeeding paragraphs.

During the year 1976-77, the production of nitrogen was 19.00 lakh tonnes as compared to the original target of 19.5 lakh tonnes, the shortfall being only to the extent of 2.6 per cent. It may be added, however, that the production target for purposes of import planning during 1976-77 was kept at 18.5 lakh tonnes and this target has been exceeded. There was, thus, no adverse effect of the overall short fall of 2.4 per cent in the production target of 19.5 lakh tonnes on the import planning. Even regarding this over all short fall of 2.4 per cent, it bears mention that the actual production during the period April 1976—December 76 was 99.6 per cent of the proportionate target for that period on the basis of the annual production target of 19.5 lakh tonnes. It was only during the last quarter of 1976-77 that certain unfortunate and unforeseen events happened in four major plants viz. IFFCO, Kanpur, Tuticorin and Mangalore and belied the well founded expectation of the Ministry to achieve 100 per cent target of nitrogen production in 1976-77 also. The actual production, as stated earlier, fell short of the original target by 2.6 per cent. In regard to phosphatics, however, the original production target of 4.8 lakh tonnes of P₂O₅ was fully achieved. This was

a direct consequence of the improved offtake of phosphatic fertilizer in 1976-77."

1.33. As regards the steps taken by the Ministry of Chemicals and Fertilisers to fix targets of production of fertilizers accurately, it has been stated in the note furnished to the Committee:

"The Ministry noted that in previous years there was a tendency to be over optimistic in production target and actual performance had invariably fallen short of targets by substantial margins. This had an undesirable consequence in the calculation of indigenous availability and in the planning of imports to make good the gap.

Accordingly, this Ministry revised the strategy of target fixation and converted it into a system of production planning from 1975-76. A greater emphasis was laid to draw up a production plan which is achievable with variation of +2 per cent. For this purpose, following steps have been taken:

- (1) Production plan for each production unit is drawn up in the beginning of the year in consultation with the management of each of the fertilizer plants in public and private sector.
- (2) Due allowance is given for the condition of the plant, its technological deficiencies, limitations of inputs and utilities, modification jobs to be carried out and its after effects.
- (3) A careful examination of the progress of plants under implementation likely to be commissioned during the year is made. In case of any doubt about the commissioning of the plant on due date no credit of production is taken for that unit during that year.
- (4) Due consideration is given to the planned shutdowns, their duration, month of shutdown, jobs to be done, etc.
- (5) From the assessment of production, an over all allowance to the extent of 5 per cent is made for all unforeseen shutdowns due to labour problems, mechanical breakdowns, accidental damages etc.
- (6) Production plan so drawn up is closely mentioned in the Ministry on a weekly basis, analysing the shortfall, if any, and the factors inhibiting production. Corrective measures are taken to reduce the shortfall in production in the subsequent weeks. Review meetings are arranged in the Ministry and in the plants during the year to identify the production areas and the corrective methods required."

1.34. The Audit paragraph also appeared to indicate that on a number of occasions, on account of the wide gap between the estimates of indigenous production and the actual production, distress purchases of fertilisers from abroad had to be resorted to, often at considerable financial disadvantage. The Committee, therefore, desired to know whether any study was made by Government to determine how far the periodical downward revision of the estimates of production had affected the availability of fertilisers and timely purchases. The Additional Secretary of the Department of Agriculture stated in evidence:

“We have not made any regular study as such but when we get intimation of any downward revision of production in indigenous sector we take urgent steps to inform Supply Department of the need for extra purchase.”

1.35. The Committee called for details of (i) the number of occasions, during the preceding five years, when it became necessary to resort to additional purchases of fertilisers from abroad, (ii) the circumstances justifying these additional purchases, and (iii) the dates on which the shortfall in indigenous production had been intimated to the Department of Agriculture and the date(s) on which the Department of Supply was approached to arrange for the additional purchases. The following table, compiled on the basis of the particulars intimated by the Department of Agriculture, indicates the dates on which the shortfall in indigenous production had been intimated to the Department of Agriculture by the Ministry of Petroleum and Chemicals:

(In lakh tonnes)

Year	First estimates and date		Second estimates and date		Third estimates and date		Actual production	
	N	P	N	P	N	P	N	P
1970-71	12.28 (August 1969)	4.10	10.20 (April 1970)	3.20	8.50 (17 November 1970)	2.30	8.30	2.29
1971-72	14.20 (December 1970)	4.20	13.20 (April 1971)	3.30	11.90 (27 October 1971)	3.00	9.52	2.78
1972-73	18.20 (October 1971)	4.76	14.05 (December 1971)	3.96	12 to 13 (29 June 1972)	3.80 to 4.10	10.60	3.26
1973-74	16.00 (June 1972)	4.05	14.04 (February 1973)	4.05	11.28 (July 1973)	3.35	10.60	3.23
1974-75	15.50 (December 1973)	4.00	..	..	12.70 (November 1974)	3.50	11.85	3.16

Detail of the opening stock and consumption during these years are indicated in the following table:

(In lakh tonnes)

Year	Consumption		Opening stock	
	N	P	N	P
1970-71	14.79	5.41	8.62	4.78
1971-72	17.98	5.58	6.90	1.198
1972-73	18.39	5.81	3.20	1.66
1973-74	18.29	6.50	2.05	1.15
1974-75	17.74	4.77	0.95	0.01

As regards the steps taken by them, on receipt of intimation that there might be shortfalls in the estimates of domestic production, the Department of Agriculture have stated as follows:

“During 1970-71, even though the domestic production fell below the estimates earlier made by the Department of Fertilisers and Chemicals, there were sizable stocks of fertilisers which served as a cushion. This situation prevailed in 1971-72 also. During 1972-73, imports were planned assuming a level of production of 14 lakh tonnes of N. However, as soon as this Department became aware of the possibility of the domestic production not reaching this target, the Secretary, Department of Economic Affairs, was addressed demi-officially by the Secretary (Agriculture) on the 17th April 1972, indicating the unlikelihood of domestic production not exceeding 12.6 lakh tonnes and requesting for an additional foreign exchange for making up the deficit. Thereupon, the Department of Economic Affairs, through their Office Memorandum No. F. 1(10) FEB. III/72 dated the 2nd May, 1972, released an additional free foreign exchange of \$ 15 million to be used for the import of nitrogenous fertilisers. A copy of this letter was endorsed to the Department of Supply. This foreign exchange was utilised for purchasing the additional quantities of urea from Europe

by the delegation which was already in Western Europe and for importing urea from Japan. Subsequently, additional foreign exchange of \$ 13.3 million was released through O.M. No. 1(10)FER.III/72 dated the 1st June 1972 by the Department of Economic Affairs and a copy was also endorsed to the Department of Supply. This was utilised for the import of urea from Japan, and South Korea and of CAN from Western Europe.

Regarding 1973-74, although there was shortfall in indigenous production of fertilisers, we did not take up the matter with the Ministry of Finance (Department of Economic Affairs) for release of more foreign exchange as the availability position in the International market was very tight and as the purchasing agencies could not contract the quantities of fertiliser for which foreign exchange was already authorised by that Department during this year as will be seen from the table given below:

(In lakh tonnes)

	Quantity for which foreign exchange was released by the Ministry of Finance (Department of Economic Affairs)	Quantity contracted by the Purchasing agencies
N	10.41	6.59
P	3.77	2.13
K	4.09	3.70

1.36. The Committee desired to know, in respect of the years 1974-75 and 1975-76 (i) the indigenous production of fertilisers estimated and communicated by the Department of Fertilisers and Chemicals, (ii) the import requirements intimated to the Department of Supply and the

Minerals and Metals Trading Corporation, and (iii) whether the quantity to be purchased from abroad had to be revised subsequently on account of shortfalls in indigenous production. In a note furnished in this regard, the Department of Agriculture have stated:

"The Plan target of fertiliser production for the year 1974-75 was put at 15.00 lakh tonnes of N and 4.00 lakh tonnes of P_2O_5 . The agronomic requirement worked out by the Department of Agriculture was 28.22 lakh tonnes of N, 9.15 lakh tonnes of P_2O_5 and 5.24 lakh tonnes of K_2O . After taking into account the indigenous production targets and the total agronomic requirements worked out by this Department in consultation with the State Governments, the Ministry of Finance (Department of Economic Affairs) released foreign exchange for the import of 10.0 lakh tonnes of N, 3.5 lakh tonnes of P_2O_5 and 4.98 lakh tonnes of K_2O and the same was intimated to the purchasing agencies. The Ministry of Petroleum and Chemicals was hopeful till June 1974, that the above production target would be achieved. However, at the end of July 1974, the estimates of production were revised to 14.3 lakh tonnes of N and 3.5 lakh tonne of P_2O_5 . As against this, the actual production during 1974-75 was *11.8 lakh tonnes of N and 3.3 lakh tonnes of P_2O_5 . There was, however, no change in the authorised import requirement communicated to the purchasing agencies, since the availability position in the international market was very tight and since the purchasing agencies could not contract the quantities of fertilisers which they had already been authorised as would be seen from the table given below:

(In lakh tonnes of nutrients)

Sl. No.	Name of nutrient	Import quantity authorised by the Department of Economic Affairs	Quantity contracted by purchasing agencies
1.	N	10.00	8.84
2.	P	3.50	2.81
3.	K	4.98	4.37

*Except this figure, other figures could not be verified in Audit.

For the year 1975-76, the Plan target of fertiliser production was 15.0 lakh tonnes of N and 4.0 lakh tonnes of P_2O_5 . The agronomic requirements as initially estimated were 32.37 lakh tonnes of N, 10.38 lakh tonnes of P_2O_5 , and 6.19 lakh tonnes of K_2O , which were subsequently revised to 25.0 lakh tonnes of N, 7.0 lakh tonnes of P_2O_5 and 4.0 lakh tonnes of K_2O . The Ministry of Finance (Department of Economic Affairs) released foreign exchange for the import of 10.0 lakh tonnes of N, 3.5 lakh tonnes of P_2O_5 and 5.5 lakh tonnes of K_2O which were intimated to the procurement agencies for further action. There was, however, no change in the authorised import requirements already communicated to the purchasing agencies, since the availability of fertilisers in the country, taking into account the opening stocks, revised estimates of domestic production and imports made, was adequate to meet the reduced consumption target."

1.37. Reverting, during evidence, to the periodical revision of the estimated requirements of fertilisers, the Committee desired to know why the initial estimates should have been so wide off the mark. The Additional Secretary, Department of Agriculture, stated:

"This has been replied to in reply to the questionnaire given by the Committee (vide paragraph 1.16). The practice prior to two years ago was, we could ask the Supply Department to procure quantities only depending on the credit or free foreign exchange actually available and sanctioned and release order given by the Economic Affairs Department. When we mentioned the requirement of urea as 82,000 and muriate of potash as 22,000 tonnes, it is not to be related to the demand as such, but as quantities which we authorised the Supply Department to procure for us indicating the various credits available and the releases given by the Economic Affairs Department. In our note, we have pointed out, the Italian credit available was for 1 million dollars, Holland and Belgium 1.5 million dollars and U.K. 3 million dollars adding up to 5.5 million dollars. In addition, we had requested the Supply Department that they should purchase for us 50,000 tonnes of urea against IDA credit and another 75,000 tonnes from free foreign exchange resources, which were also made available. If you add up this, the total comes to 1,23,000 tonnes.

Then, you said that the total requirement of urea was indicated as 2,73,000 tonnes whereas the total purchase during the year were 15 lakh tonnes. Out of this 15 lakh tonnes, nearly 7.5 lakh tonnes were advance procurement for 1973-74. Actually we

should relate only the balance of 7.55 lakh tonnes for 1972-73. Originally we expected the MMTC to procure from rupee payment areas nearly 7.5 lakh tonnes of urea, but they mentioned in March or April that they would be able to procure no more than 4.6 lakh tonnes. But for various reasons—they must have had some difficulties—they finally gave us only 2.6 lakh tonnes from rupee payment areas. Indigenous production came down to 12 from 14 and ultimately to 10. This necessitated an increase in our purchases from credit and free foreign exchange resources.”

1.38. The Audit paragraph also points out that the changes in the requirements of urea during 1972-73 were mainly on account of the shortfall in indigenous production and in imports by the Minerals and Metals Trading Corporation from rupee payment areas. Thus, while 7.50 lakh tonnes of urea were to be procured, during 1972-73, by the latter from East European countries, the actual imports amounted to only 2.65 lakh tonnes. Explaining, during evidence, the reasons for the Corporation not fulfilling its commitments in this regard, the Chairman of the Minerals and Metals Trading Corporation stated:

“At the end of 1971, there was a particularly difficult time for free foreign exchange and we were charged with the task of getting as much fertiliser as possible from East Europe. We sent for the trade representatives and they were pressing us to take more and more fertilisers from them. We made the estimates as 6 lakh tonnes of urea plus 1½ lakh tonnes to come as spill-over. This is how the original figure of 7.5 lakhs was arrived at. But it was clear very soon that due to adverse weather conditions and very big upsurge in the demand in West and East Europe, this quantity may not be available. They had a very short winter, an early spring and again a frost. It was a catastrophic year for agriculture in Europe. When sowing in autumn had not come up, they started spring sowing. After the frost, they had a second dressing of urea. So, the demands for fertilisers went up in Europe. So, Poland, Bulgaria and Rumania did not offer as much as they had originally indicated. It was clear in March that we would get only 4½ lakh tonnes against 7 lakh tonnes and we immediately requested the Agriculture Department to make other arrangements. But ultimately we did not succeed in getting even 4½ lakh tonnes. Poland had a major accident in a fertiliser plant and there was a blast. Bulgaria and Rumania had some shortage of natural gas and they also stopped supply. In fact, I sent two delegations to East Europe in that year to find out the exact position. They visited the plants and found that the invocation of the force

majeure clause was justified. We have never had this sort of experience with East European countries. They consider it a loss of prestige if they default in any contract. What happened in 1972-73 was unique, which could not have been foreseen when we forecast the possibility of imports to these countries and made the contracts. So, there was a further shortage of nearly 2 lakh tonnes."

1.39. On the attention of the witness being drawn, in this context, to the observations of the Department of Agriculture (June 1972) referred to in the Audit paragraph, that with better economic intelligence this could have been foreseen and alternative arrangements for import could have been made in time, he replied:

"There are two stages. The first stage is that when we were making a foreign exchange budget for fertilisers and wanted to purchase from abroad. We took the usual step of sending for commercial representatives to East European countries to find out what amount of fertiliser they would supply. We had a spillover of over 1.5 lakh tonnes. We were quite confident that we would be able to import 7.5 lakh tonnes. In December, we gave this assurance and we had every reason to believe that these estimates were not inflated ones because the East European countries were selling lot of fertilisers. All the fertiliser journals in the world were predicting a very easy time for fertiliser buyers. In 1971, therefore, we accepted this estimates from them.

The next stage came when the Ministry of Commerce actually concluded a trade plan with these countries. When the trade plan was concluded, we found that the quantity agreed to in the trade plan was about 4.5 lakh tonnes only. It was at this stage that we began to feel some doubt. I made searching inquiries when I went to Geneva to attend a Conference. During this period, the fertiliser prices also went up. Here in India, consequences of fertiliser prices and fertiliser availability were still to be understood. In fact, I thought that there would be a change later in that year. It was also known at that time that these bilateral countries were offering a great deal of urea to western countries as well as to China against free foreign exchange. Even smaller countries were eager to make it available for free foreign exchange. And the production which would have normally been earmarked for India was absorbed there because of the early spring which made the fertiliser season commence 2 months before the usual time. As soon as I came back from Geneva, I wrote to the Ministry of Agri-

culture on March 7, 1972 pointing out that the anticipated quantities of urea were not likely to be available from East European countries as they had disposed of their stock to the western countries. I also forewarned the Ministry that there was a great danger that we might not be able to procure more than 3 lakh tonnes. It was ultimately justified because of the spillover which was there, but even these contracts were not fulfilled as there were series of accidents in the units of those countries."

1.40. Asked whether there was any perceptible lack of warmth on the part of the East European countries, who were otherwise known to be favourably disposed towards India, during that particular year, or whether their reluctance to make available larger quantities of fertilisers could be attributed to their dissatisfaction over the smaller orders placed earlier, the witness replied:

"I do not know how I have given the impression that they were not acting exactly in accordance with the tradition which we have built up in the past. It may be because I have said that they were collectively bargaining for a better price; but this is a commercial instinct which has come to socialist countries; and they are very keen to get as good a price as they can and they cannot sell below international prices. There is no political pricing. Prices are never subject to political considerations. In the beginning, they certainly stood firm. At the same time, one of the factors which stood in the way was that when they can find immediate markets, they dispose their goods. Both Romania and Poland had said that due to adverse weather conditions, they must have a good look at the fertiliser production for their own needs. Therefore, it took them a long time to verify things. I verified their difficulties by sending our team to two factories in their countries. In these circumstances, I don't think there was a lack of warmth. Perhaps they were a little piqued that we were not earlier taking sufficient quantities from them. These things do not weigh in commercial transactions."

In reply to another question whether this did not indicate that the planning of imports of fertilisers, particularly in relation to those socialist countries with whom India could have long-term arrangements comparatively easily, could have and ought to have been regulated better, the witness replied:

"I would say that you have read the situation correctly, so far as 1972-73 is concerned they had certain economic advantages; and they did avail of them. But the difficulties they had, sub-

sequently, in fulfilling their contracts, were very real. I referred to actual contracts which they had made, under which we would have got 4.75 lakh tonnes. The shortfall in this figure *i.e.* our getting only 2.25 lakh tonnes was due to their own difficulties; but this has not at all influenced their supply of fertilisers in 1973-74 and 1974-75 when we have been buying more and more fertilisers from them and they have supplied us according to schedule. Of course, we had to buy at international prices. As you said, we can make long term purchases from them under 5-year trade plans. And there is indication of a tremendous growth of possibilities of import from these countries."

1.41. A note* furnished on this question by the Ministry of Commerce is reproduced in Appendix IV. The Ministry also furnished, at the Committee's instance, a copy of the letter dated 7 March, 1972 on the subject from the Chairman, Minerals and Metals Trading Corporation to the Department of Agriculture.

1.42. The Committee found from the letter dated 7 March, 1972 that certain concrete suggestions had been made by the Chairman of the Corporation to overcome the shortfall in the availability of fertilisers. The Committee, therefore, desired to know the action taken on these suggestions by the Department of Agriculture. The additional Secretary of the Department stated in evidence:

"As soon as we got this information from the MMTC, we took immediate action to intimate the Department of Supply the necessity to go in for higher procurement in the open market. We took it up with the Department of Economic Affairs to give us additional foreign exchange—both at the official as well as at the Minister's levels. And we did get foreign exchange releases from the Department of Economic Affairs, as follows:

\$15 million on 17th April; \$1.5 million on 19th April; again \$ 15 million on 19th April; another \$ 15 million on 6th May; and \$13.3 million on 14th June."

A note furnished subsequently in this regard by the Department of Agriculture is reproduced below:

"The following suggestions were made by the Chairman, Minerals and Metals Trading Corporation in his letter dated March 7, 1972:

*Not vetted in Audit.

1. The link deals under the consideration of the Minerals and Metals Trading Corporation should be finalised quickly.
2. Negotiations should be started immediately with Japan and other sources of supply such as ICI and Nitrex.
3. Additional quantity may be obtained through open tender.
4. Political pressure should be brought on USSR, Bulgaria and Poland.

The following action was taken in pursuance of these suggestions:—

- (i) The Secretary (Agri.) took a meeting on the 9th March 1972 to consider barter proposals of Minerals and Metals Trading Corporation. At the instance of Secretary (Agriculture) the Additional Secretary, Department of Economic Affairs cleared all the proposals in a meeting held on 10th March, 1972. However, the proposals fell through for a variety of reasons.
- (ii) At a meeting of the Fertiliser Purchase Committee held on 25th March 1972, recognising the urgency of the matter, the Committee decided that a delegation may go to Europe, U.K. and Japan to arrange early import of further quantity of fertilisers.
- (iii) The Minister for Foreign Trade was addressed demi-officially by the Minister of Agriculture requesting early action by the Ministry of Foreign Trade and by MMTC for arranging for import against Trade Plan provision and barter deals. It was even suggested that the matter could be taken up with the Ambassadors of concerned East European countries stationed in India.
- (iv) Minister of Supply was addressed by the Minister of Agriculture on 10-4-72 that all measures should be taken for early import of fertilisers.
- (v) The Secretary, Department of Economic Affairs was addressed by the Secretary (Agriculture) on April 17 requesting that foreign exchange may be immediately released for the import of fertilisers to the tune of 15 million dollars. The Department of Economic Affairs accordingly released foreign exchange amounting to 15 million dollars on May 2, 1972.
- (vi) The Finance Minister was addressed by the Minister of Agriculture on 10-5-72 requesting that additional free foreign exchange amounting to 90 million dollars may be released immediately. Accordingly, foreign exchange required for the import of 2 lakh tonnes of urea was allotted.

(vii) Chief Minister of Punjab was addressed by the Minister of Agriculture on 3-6-72 suggesting that electricity may be supplied to Nangal Unit of Fertiliser Corporation of India to enable the maximum production of CAN."

1.43. Asked whether any disadvantage in prices had resulted because of the upward revision of demand during 1972-73, which would have necessarily upset the procurement programme, the Department of Supply, in a note, have replied:

"A general worldwide shortage of fertilisers had come about during 1972-73 due to various factors, such as closure of some of old plants, late snow in Europe leading to increased domestic consumption of fertilisers etc. The purchases of urea from April 1972 till about the early part of July 1972, of approximately 7 lakh tonnes were made at prices ranging from \$ 65 to \$ 67 C&F approx. Only later on for purchases from August 1972 till February 1973, the prices accepted were at higher rates. It is difficult at this stage to say whether it would have been possible to obtain larger quantities during this period if the entire forecast of purchases had been given at these prices indicated above. The other point of view could be that if the entire quantity of requirements had been given it might have led to better planning and better prices. At this late stage, however, this can only be a matter for conjecture.

Purchases by the Department of Supply were always made after firm indication of quantities and allocation of funds."

1.44. At the Committee's instance, the Department of Supply and the Ministry of Commerce (MMTC) furnished details of the country-wise imports of fertilisers during the period from 1968-69 to 1974-75, which are summarised* (in respect of all types of fertilisers) below:

*Statements not vetted in Audit.

(Quantity in lakh Metric Tonnes)

I. Department of Supply

(Value in Million Dollars)

Country of Origin	1968-69		1969-70		1970-71		1971-72		1972-73		1973-74		1974-75	
	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value
United States of America	15.63	66.64	3.76	21.00	2.21	13.27	4.75	32.26	4.92	56.01	3.34	55.59	6.06	256.34
Canada	1.98	10.27	2.20	10.31*	4.20	17.27	3.49	13.71	2.92	19.22	5.89	46.86	..	..
United Kingdom	0.71	6.00	..	..	4.45	3.30	0.50	2.66	0.80	5.89	0.40	4.80	1.45	42.02
France	0.60	4.00	..	..	1.45	9.21	0.80	5.26	2.01	13.06	1.35	12.95	3.24	104.26
Spain	0.19	1.18	..	..	..	..	..	..	..	..	0.30	2.92	0.20	5.58
Italy	0.32	2.25	..	..	1.59	8.04	0.56	1.65	0.72	6.24	1.68	18.14	2.61	68.04
West Germany	0.24	1.59	0.36	2.67	0.69	4.04	1.15	4.62	4.08	26.31	1.64	18.75	3.21	84.64
Austria	0.15	0.80	..	..	..	..	..	..	..	..	0.10	1.33	0.50	12.78
Belgium	0.12	1.00	..	..	0.25	1.32	0.12	0.50	0.40	2.74	0.20	2.44	0.21	5.35
Holland	0.40	2.19	0.50	0.40	0.90	5.08	0.23	1.00	2.66	20.84	0.45	4.66	0.90	26.53
Norway . . . . .	..	..	..	..	..	..	..	..	0.20	1.86	0.15	1.82	..	..
Finland . . . . .	..	..	..	..	..	..	..	..	0.10	0.64	0.23	2.54	..	..
Denmark . . . . .	..	..	..	..	..	..	..	..	..	..	..	..	0.10	3.05
Yugoslavia . . . . .	..	..	..	..	..	..	..	..	..	..	0.40	7.19	0.10	2.06

*Value in Canadian Dollars.

Country of Origin	1968-69		1969-70		1970-71		1971-72		1972-73		1973-74		1974-75	
	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value
Greece	0.53	0.12	1.18	..	..
Saudi Arabia	0.38 @	2.06	..	..	1.32	8.58	0.40	4.52	..	..
Kuwait	0.16	0.96	..	..	..	..	1.80	11.98	1.35	15.55	1.50	50.67
Qatar	0.11	4.29
Taiwan	0.19	1.25	..	..	..	..
South Korea	0.25	1.37	0.93	7.20	..	..	..	..
Japan	1.31	10.00	0.75	5.00	1.77	4.00	7.76	59.25	1.20	18.70	4.80	146.34
Mexico	0.12	0.93	..	..	..	..

Notes : @ Includes purchases from Iran also.

1. The figures of quantity and value indicated in the contracts from 1968-69 to 1971-72 have been worked out on the basis of orders placed which are either on FOB/FAS or C&F basis.
2. The contracts for the period 1972-73 onwards have been indicated on C&F/estimated C&F.
3. The values indicates are based on prices at the time of the issue of the contract.

(Quantity in lakh Metric Tonnes)

II. Minerals & Metals Trading Corporation

(Value in lakh Rupees)

Country of Origin	1969-70*		1970-71		1971-72		1972-73		1973-74		1974-75	
	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value	Qty.	Value
U.S.S.R.	0.19	83.56	1.16	441.19	0.76	257.62	1.21	445.88	1.42	779.76	3.10	6117.65
East Germany	0.04	21.25	0.07	33.45	..	..	..	..	..	..	..	..
Poland	0.16	64.42	1.03	561.26	1.28	609.39	1.01	485.51	1.53	1220.28	2.37	6861.20
Bulgaria	0.07	38.54	1.30	696.58	1.76	830.33	0.99	474.28	0.50	404.76	0.67	1832.11
Romania	..	..	0.79	364.58	2.22	868.27	1.74	690.53	1.25	940.02	2.15	4038.24
Hungary	..	..	..	..	0.10	52.27	..	..	..	..	..	..
German Democratic Republic	0.21	67.75	0.39	143.78	0.19	74.22	1.31	475.91	1.37	622.94	2.09	1715.45
Greece	..	..	0.25	99.27	..	..	..	..	..	..	..	..
Canada	0.24	62.53	..	..	..	..	..	..	..	..	..	..
Japan	0.10	47.57	0.16	95.33	..	..	0.16	77.56	..	..	..	..
Kuwait	0.11	62.44	0.28	157.62	..	..	..	..	..	..	..	..
Burma	..	..	..	..	..	..	0.03	19.12	0.03	19.26	..	..
D.P.R.K.	..	..	..	..	..	..	..	..	..	..	0.11	266.73

Note : *From January to March MMTG took over the imports of fertilisers from STC on 1 January, 1970.

1.45. While the imports during the period from 1968-69 to 1973-74 ranged from 6.33 lakh tonnes to 12.56 lakh tonnes, the imports during 1974-75 amounted to 14.09 lakh tonnes. The world prices of fertilisers were also the highest during 1974-75, almost six times the prices prevailing in 1971-72. However, paradoxically enough, internal consumption of fertilisers was the lowest during that year (25.79 lakh tonnes) as compared with the consumption during the preceding three years. The Committee, therefore, desired to know whether this did not indicate that avoidable imports were made in 1974-75 when world prices were the highest. The representative of the Department of Supply stated in evidence:

“About requirements, it is only the Agriculture Department who could tell us. It looks as if purchases were made anticipating a rise in demand and ultimately for some reason or other, the demand from the consumers was less.”

The Additional Secretary of the Department of Agriculture stated in this connection:

“I would like to mention that the consumption in the previous year was 28 lakh tonnes of nutrients. Even without allowing for normal increase, we should have been in a position to consume the same quantity of 28 lakh tonnes, but unfortunately, as you may recall, there were floods and drought and almost eight States were involved in this. Added to this difficulty, the sudden spurt in the price to an abnormal extent also contributed to lesser offtake. In fact, the problem of providing adequate credit for a certain increase also contributed to lesser offtake in 1974-75. These were the factors responsible for lesser consumption.”

Elaborating further, the Joint Secretary (Input), Department of Agriculture added:

“...as mentioned by Mr. eight States had very severe drought and flood which had never happened in one year together earlier. For example, Gujarat did not lift even one tonne for Rabi and Kharif, which could not have been anticipated. If the season were normal and had we not provided for this, we would have been in great difficulty.”

1.46. Asked whether, by a more realistic assessment of requirements and also by taking into account the stocks carried forward from 1973-74, it would not have been possible to avoid the import of a substantial quantity

at very high prices, particularly in view of the fact that a surplus of 2.61 lakh tonnes was available at the end of 1974-75, the witness replied:

“This is the availability as on 1-2-1975. There was a heavy stock at the beginning of 1975 because of the lack of adequate consumption in the previous Rabi for the reasons already mentioned. When the Agricultural Ministry came to be aware of this, by that time most of the contracts had already been entered into. We did write to the Department of Supplies and Mines and Metals Corporation that even if the imports had been finalised, whether the arrivals could be rescheduled to delay them, because we could not have anticipated such a high pending stock position.”

1.47. The Committee drew attention, in this connection to certain press reports which pointed out that as a result of persisting with imports even when the estimated consumption levels did not materialise, there was an unexpectedly heavy accumulation of fertilisers throughout the country and enquired into the factual position in this regard and the steps taken for the disposal of the large inventories. A note furnished by the Department of Agriculture in this regard is reproduced in Appendix V.

1.48. A statement furnished by the Department of Agriculture, at the Committee's instance, indicating, in respect of the period 1969-75, (i) the opening stock of fertilisers at the beginning of each year, (ii) the estimated requirements during the year, (iii) indigenous availability, (iv) purchases from abroad, (v) quantities distributed and (vi) carry-over stock at the end of the year, is reproduced in Appendix VI.

1.49. To another question whether the import requirements for 1976-77 had been finalised, the Joint Secretary (Inputs), Department of Agriculture replied:

“We have not yet finalised the exact figure though we have requested Department of Economic Affairs and they have made advance ad hoc allotments. This is because last year we ran up against several constraints in the consumption of fertilisers many of which we are trying to correct during the last about 8 months by the reduction of prices, increasing the distribution margins, removal of distribution bottlenecks and increase of credit arrangements for distribution. So, now the consumption season has started from July, we would like to make a review of the consumption trends as a result of all these corrective measures which have been taken by September-October when we will be able to more or less finalise a realistic estimate of what would be the figure of imports which would be required for the next year. For this year all the imports have been finalised and there

is no problem. We would like to watch how the consumption has picked up and based on the latest estimate of the indigenous production which has been given for the next year, we would be able to finalise the exact figure of imports for next year."

C. Consumption of fertilisers

1.50. Consumption trends which determine the demand influence, to a very large extent, planning and strategies for the purchase and stock-piling of fertilisers. Though the consumption of fertilisers (in terms of nutrients) in India increased, as has been pointed out in the Audit paragraph, from a meagre 0.71 lakh tonnes in 1951-52 to 7.84 lakh tonnes in 1965-66 and 26.99 lakh tonnes in 1972-73, India is still among the countries with the lowest fertiliser consumption rates in the world, as would be evident from the following table, which indicates the fertiliser consumption per hectare, in India and some other countries of the world, in relation to the arable land and population in 1970-71:

(Consumption in kilograms)

Region/country	Fertilizer consumption per hectare	Per capita consumption
<i>Europe</i>	169.6	54.0
Denmark	223.2	121.4
France	241.4	91.6
Poland	168.0	78.5
Sweden	164.7	62.5
Austria	241.6	55.6
Belgium	380.2	51.8
Netherlands	719.3	49.9
United Kingdom	258.4	33.7
Yugoslavia	78.7	30.3
<i>North/Central America</i>	68.5	54.6
United States	86.8	71.6
Canada	17.9	36.4
<i>U.S.S.R.</i>	40.4	38.7
<i>Asia</i>	22.0	6.0

Region/country	Fertilizer consumption per hectare	Per capita consumption
Japan	385.6	20.5
Korea	243.6	17.4
India	13.2	4.0
Pakistan	15.1	3.3
<i>Africa</i>		
Egypt	121.8	10.4
<i>Oceania</i>		
New Zealand	579.5	159.3
Australia	21.8	77.2

Source: Fertiliser Statistics.

1.51. The targets of consumption of fertilisers in India envisaged during the Fourth Plan period (1969-70 to 1973-74) and the actual achievements were as under :

(In lakh tonnes of nutrients)

Year	Consumption Targets				Consumption achieved			
	N	P	K	Total	N	P	K	Total
1969-70	17.00	6.00	3.00	26.00	N and P--17.72	2.10	..	19.82
1970-71	20.00	7.50	4.20	31.70	14.79	5.11	2.36	22.56
1971-72	20.00	8.00	4.00	32.00	N and P--23.36	3.00	..	26.36
1972-73 (Original Estimates)	27.80	11.50	7.30	46.60	..	..	..	..
1972-73 (Revised Estimates)	22.00	8.00	4.50	34.50	18.40	5.81	3.48	27.69
1973-74 (Original Estimates)	32.00	14.00	9.00	55.00	..	..	..	..
1973-74 (Revised Estimates)	26.00	8.10	5.20	39.30	N and P--24.80	3.14	..	27.94

The Fourth Five Year Plan had envisaged a 27 per cent compound rate of increase per year in the consumption of fertilisers in the country. However, as against this target, the actual consumption growth achieved was

only 15 per cent in 1968-69 and 1969-70 (as against the growth rate of 40 per cent achieved in 1967-68), 14 per cent in 1970-71, 18 per cent in 1971-72, 4.5 per cent in 1972-73 and 0.005 per cent in 1973-74.

1.52. The targets of consumption proposed in the Fifth Plan period are indicated in the following table:

Year	Quantity in lakh (tonnes)			
	N	P	K	Total
1974-75	20.70	9.40	5.16	41.26
1975-76	31.00	10.35	6.50	50.85
1976-77	36.10	12.40	7.50	58.00
1977-78	45.40	14.65	8.60	68.65
1978-79	72.00	18.00	10.00	80.00

It will thus be seen that by the end of the Fifth Five Year Plan, the consumption of fertilisers in the country is expected to rise from 4.4 million tonnes in 1974-75 to 8.0 million tonnes in 1978-79. According to the Annual Plan for 1975-76, the consumption of fertilisers was expected to be around 25 lakh tonnes of nutrients during 1974-75, and the targets for 1975-76, based on local availability from domestic production and imports was expected to be 36 lakh tonnes.

1.53. Outlining, at the Committee's instance, the measures taken to increase consumption of fertilisers and to educate the average farmer on the advantages of using chemical fertilisers for achieving increased productivity, the Department of Agriculture have stated:

"The use of chemical fertilisers on a significant scale started in 1952. Thereafter there has been a steady increase in the consumption of fertilisers. The introduction of High Yielding Varieties showed a real breakthrough in fertiliser consumption. The growth in consumption of fertilisers during the period from 1966-67 to 1971-72 has been really remarkable, the consumption going up from 7.57 lakh tonnes of nutrients in 1965-66 to 26.21 lakh tonnes of nutrients in 1971-72. The consumption of fertilisers in 1972-73 and 1973-74 was seriously hampered owing to shortage of fertilisers in the

country. The domestic production fell far below expectations. Owing to non-availability in the international market and steep rise in prices, imports of fertilisers could also not be made to the extent required. The situation of shortage in fertilisers availability continued right upto December 1974.

With effect from October 1973, a new factor came into play. As a result of shortage of fertilisers in the world market the price of fertilisers in the international market rose steeply. The cost of production in the country also went up considerably owing to increases in the cost of fuel, feed-stock and labour. As a result, the prices of fertilisers had to be increased first in October 1973 and then in June 1974. As a result of these two increases the prices of fertilisers almost doubled. This had an adverse effect on consumption, which was accentuated by unfavourable weather conditions in 1974-75. In as many as 8 States there was either flood or drought. There was a serious shortage of power which reduced the area under irrigation, thereby bringing down the consumption of fertilisers. The area under agricultural irrigation also went down. In some parts of the year shortage of diesel oil was also observed. As a result of all these, the consumption of fertilisers went down from 28.4 in 1973-74 to 25.79 lakh tonnes in 1974-75. A large number of corrective steps have already been taken to reverse this trend and have been enumerated in detail in the note on item 6. (Vide paragraph 4.1 on 'Distribution of Fertilisers').

It has been recognised that steps should be taken to encourage fertiliser consumption, particularly among small farmers, un-irrigated cultivators and cultivators in backward areas where consumption of fertilisers is very low. With this end in view, a fertiliser promotion scheme was launched in the Fourth Plan. A post of Commissioner (Fertilisers) was created and a series of demonstrations were organised to encourage the use of fertilisers. Unfortunately, during the last phase of the scheme, there were acute shortages of fertilisers and a paradoxical situation arose in which, while we were not able to provide adequate fertilisers to farmers who deserved fertilisers, efforts were being made to persuade cultivators to use the chemical fertilisers. The scheme was, therefore, not approved for continuance in the Fifth Plan.

With the relatively easy availability of fertilisers for the past 6 months or so, renewed efforts are being made to stimulate fertiliser consumption. All constraints in the offtake of fertilisers have been removed and both during the Zonal Confe-

rences held in July 1975 and in the meetings held by the Minister for Agriculture and Irrigation with the State Chief Ministers, considerable emphasis has been placed on using the extension machinery for promoting the use of chemical fertilisers. The States have taken up a large programme of demonstrations plots, village level demonstrations and block level demonstrations in order to bring home to the cultivators the advantages of chemical fertilisers. In the State of Punjab, the bonus on wheat is being paid in the form of fertiliser coupons. In the State of Maharashtra, up to 20 per cent of the prices are being paid in the form of fertilisers. All this has resulted in increased consumption of fertilisers. Targets of fertiliser consumption for each State have been fixed during the Zonal Conferences and many States have in turn fixed targets right from the district level down to the village level. Responsibility for fixing the targets has also been placed on the functionaries at the various levels.

With the idea of persuading small farmers to use fertilisers, a scheme is in operation in areas covered by the small farmers development agency and marginal farmers and agricultural labourer agencies for granting subsidy on fertilisers to the extent of 50 per cent for a period not exceeding 2 seasons, to the extent of Rs. 100. The movement of fertilisers to remote areas such as Jammu and Kashmir, North-eastern regions, is subsidised by the Central Fertiliser Pool by taking certain road-heads as rail-heads and bearing the cost of transport right upto that point. The cost of transport from the main-land to the Andaman and Nicobar Islands and the cost of transport from the last point outside Sikkim to Sikkim is also subsidised entirely. The Fertiliser Corporation of India have also recently agreed to bear the cost of transport to remote areas in the North-eastern region in the same manner as the Pool.

With a view to encourage fertiliser consumption in backward areas a larger increment is given to such areas, as compared to the more progressive areas. The increment allowed for Punjab is 5 per cent and for Tamil Nadu 6 per cent. On the other hand, the increment allowed for Jammu and Kashmir, Himachal Pradesh, Orissa and Madhya Pradesh is 17 per cent and for Rajasthan, Assam and other States and Union Territories in the north-eastern region is 20 per cent. Increase in fertilisers consumption is also linked up with the supply of other inputs and with the development of improved agriculture in general. For this purpose, various schemes are being taken up for increasing areas under irrigation and for ensuring a timely and

adequate supply of seeds and insecticides. The Directorate of Extension have also taken up programmes for popularising modern agricultural practices and for encouraging the use of fertilisers in general and in particular the balanced use of nutrients.”

1.54. A recent study on ‘Fertiliser Consumption in Indian Agriculture’ by Shri A. Seshan (Deputy Director, Banking Department, Economic Division, Reserve Bank of India), published in the inaugural issue of ‘Reserve Bank Staff Occasional Papers’ (Volume 1, Issue No. 1, June, 1976), points out that though consumption of fertilisers in the country increased from 2.94 lakh tonnes in 1960-61 to 28.39 lakh tonnes in 1973-74, “the fertiliser consumption targets were never realised to the full extent in any of the Plans indicating that they were always on the higher side,” as would be evident from the following table indicating the targets and achievements in consumption of fertilisers under the Five Year Plans:

(In thousand tonnes)

	Second Plan			Third Plan			Fourth Plan		
	Target	Actual consumption (1960-61)	Col. 3 as percentage of Col. 2	Target	Actual consumption (1965-66)	Col. 6 as percentage of Col. 5	Target	Actual consumption in 1973-74	Col. 9 as percentage of Col. 8
1	2	3	4	5	6	7	8	9	10
N	3,76	2,12	56.4	10,16	5,47	53.8	32,00	18,29	57.2
P	1,22	53	43.4	4,06	1,32	32.5	14,00	6,50	46.4
K	30	29	96.7	2,03	78	38.4	9,00	3,60	40.0
TOTAL	5,28	2,94	55.7	16,25	7,57	46.6	55,00	28,39	51.6

Source: Ministry of Statistics, The Statistical Association of India.

The fall in growth rate of consumption during the Fourth Plan period, as compared with the earlier Second and Third Plan periods, is also evident from the following table:

	1955-56	1960-61	1965-66	1968-69	1973-74	1955-56 to 1960-61	1960-61 to 1965-66	1965-66 to 1968-69	1968-69 to 1973-74
	2	3	4	5	6	7	8	9	10
N	1.07	2.12	5.47	11.31	18.29	15	21	27	10
P ₂ O ₅	13	53	132	3.80	6.50	32	20	43	11
K ₂ O	19	20	78	1.54	3.60	24	22	25	19
TOTAL	1.39	2.94	7.57	16.74	28.39	18	21	30	11

Source: Fertiliser Statistics, The Fertilisers Association of India, New Delhi for cols. 1 to 6.

1.55. This view is also reinforced by another article entitled 'Fertiliser consumption, Price—the Major Constraint' by Shri K. P. Sundaram, which appeared in the 1 November, 1976 issue of 'Economic Times', wherein the author observes, *inter alia*, as follows:

“An analysis of consumption pattern of the three basic nutrients, *i.e.*, NPK from 1970-71 to 1974-75 shows that six States, *viz.*, Andhra Pradesh, Tamil Nadu, Gujarat, Maharashtra, Uttar Pradesh and Punjab alone accounted for over 65 per cent of the total consumption of fertilisers in all the five years. Naturally these six States cannot go on increasing their consumption for the law of diminishing return will set in after a certain level is reached. The recent study of the Agriculture Ministry also shows that about 45 per cent of the total fertiliser consumption was limited to a mere 55 of the total 370 districts in India.”

1.56. The following table indicates the contribution of the six States referred to in the article to the consumption of fertilisers in the country:

State	1970-71	1971-72	1972-73	1973-74	1974-75
Andhra Pradesh	283	297	275	281	306
Tamil Nadu	259	346	325	341	257
Gujarat	161	178	179	212	136
Maharashtra	184	218	199	261	303
Uttar Pradesh	411	468	519	466	410
Punjab	213	289	322	333	271
TOTAL	1511	1796	1819	1894	1683
All India Consumption	2177	2628	2688	2839	2591
Percentage consumption by the six States to the total all-India consumption	69	68	67	66	64

SOURCE: Fertiliser Statistics 1974-75 and Annual Review 1974-75, FAI.

D. Coordination between different Ministries

1.57. As has been pointed out in the Audit paragraph, while the import requirements are worked out by the Department of Agriculture on the basis of the stock position, estimated requirements ascertained from the State Governments and other major consumers of fertilisers, the indigenous fertiliser industry is the responsibility of the Ministry of Fertilisers & Chemicals. Similarly, while purchases from abroad were handled both by the Department of Supply and the Minerals and Metals Trading Corporation, the responsibility for marketing and distribution of fertilisers has been entrusted to the Department of Agriculture and the State Governments. The Committee, therefore, desired to know how integrated functioning was possible amidst this apparent diversity and whether it was necessary to have so many agencies dealing with this subject. The Secretary, Department of Fertilisers & Chemicals stated in evidence:

“Factually as things stand today, what the hon. Member says is correct to a certain extent. . . . We are charged with the duty of looking after investment policy and production of fertilisers in the country. This does not mean that we dissociate ourselves. . . . we are interested vitally in the marketing, sale and pricing. We are concerned about imports. We will not be in an advantageous position if there is gap between production and import policy. There is now a system of coordination in the Ministry of Petroleum and Chemicals. The Ministry of Agriculture which bears the main responsibility for marketing, distribution and pricing policy. They act as representatives of the consumer and farmer interest. There is inter-ministerial coordination. As you know 15 years ago there was very little production of fertiliser in the country. Today we have the situation involving domestic producers. One of the steps is improving coordination. We have reduced the number of authorities dealing with the subject. This has been done by a recent decision of Government. MMTC would be handling all imports. So, such steps have been taken and this is in the right direction.”

1.58. Asked whether there was a workable liaison and coordination between the various agencies involved in the production, purchase and distribution of fertilisers, the Additional Secretary, Department of Agriculture replied:

“I think so.”

The Joint Secretary (Inputs), Department of Agriculture added in this connection:

"I would just like to mention that in regard to problems of finance concerning foreign exchange, problems of estimating the requirements of fertilisers correctly or even the estimates of indigenous production to see whether they are realistic or not, several times the Cabinet Secretary has convened meetings and gone into these matters and taken decisions with the representatives of the Ministries concerned, regarding the foreign exchange availability, as to whether dilute fertilisers have to be purchased, whether indigenous production should be stepped up and so on. Many meetings have been convened by the Cabinet Secretary. Whenever there was any kind of apparent lack of co-ordination in regard to problems concerned with agriculture, we have removed that gap. We could get you the dates on which meetings have been held, a number of them, in a year, just to effect this co-ordination on points where there has been some difficulty either in regard to foreign exchange availability or about taking measures to step up indigenous production or where the question of assessment of requirements needed a review."

1.59. To another question, in this context, whether such unending sequence of meetings and consultations, which often proved to be infructuous and appeared to lead to only *ad hoc* and temporary solutions, was really necessary, the Secretary, Department of Fertilisers & Chemicals replied:

"In the case of the fertiliser industry, we have an unfortunate situation where the industry does not refer to one single Ministry—and I should like to draw a distinction here. My own Ministry deals with petroleum, in which case the petroleum import policy, pricing policy, marketing policy, investment policy and production control are all under the Department of Petroleum. If you look at fertilisers, we have the Department of Fertilisers and Chemicals (which I head) which deals with indigenous production. Then, you have the Ministry of Agriculture which deals with marketing and pricing and consumers' interests and farmers. Then you have the Department of Supply which till now was in charge of imports from free foreign exchange areas. Then you have the Ministry of Commerce and its instrument, the MMTC, which deals with import from eastern Europe and Communist countries. In this situation, quite obviously some

mechanism of inter-Ministerial co-ordination has to be in operation. If all the functions were ultimately merged in one Ministry there can be better co-ordination."

On the Committee observing that it was a most unsatisfactory state of affairs that even at the Fifth Plan stage, one had to wait for coordination to take place while committee after committee took *ad hoc* decisions on whatever desultory information had been collected, the witness replied:

"When the division of functions takes place between different Ministries, it is inevitable that there has to be inter-ministerial co-ordination."

On the Committee pointing out that the coordination claimed to exist ought to work in actual practice, the witness replied:

"I agree."

He added:

"With due respect, I do not think, we would concede that there is lack of coordination. The fact that we are meeting so often indicates that at least the Ministries want to sit together and want to reach common conclusions."

To another observation of the Committee that everything had to be justified by results and that the results achieved so far could not be considered very satisfactory, the witness replied:

"We concede that."

1.60. The indigenous fertiliser industry has, no doubt, grown impressively with its installed capacity for the production of nitrogenous and phosphatic fertilisers increasing from a meagre 1.49 lakh tonnes at the end of the First Five Year Plan (1955-56) to 24.99 lakh tonnes at the end of the Fourth Five Year Plan (1973-74). The Committee, however, find that while the capacity for the production of nitrogenous fertilisers had increased by 184.7 per cent, 126.4 per cent and 253.8 per cent respectively during the Second, Third and Fourth Plan periods, actual production was only 40.5 per cent of the available capacity in the last year of the Second Plan (1960-61), 42.5 per cent in the last year of the Third Plan (1965-66) and 54.6 per cent in the last

year of the Fourth Plan (1973-74). Similarly, in respect of phosphatic fertilisers also, while the installed capacity during these three Plan periods increased respectively by 48.4 per cent, 140.0 per cent and 145.6 per cent, actual production amounted to only 54.7 per cent of the capacity in 1960-61, 48.7 per cent in 1965-66 and 57.7 per cent in 1973-74. On account of the wide gap between installed capacity and actual production on the one hand and between production and estimated demand on the other, the country has been dependent to a very large extent on purchases from abroad. Imports of nitrogenous and phosphatic fertilisers have, thus, steadily increased from 5.09 lakh tonnes in 1970-71 to 11.65 lakh tonnes in 1974-75, when the proportion of imports (excluding potassic fertilisers which have to be necessarily imported as they are not produced indigenously) to consumption was as high as 51.78 per cent, after having come down to 25.20 per cent in 1970-71 from 61.76 per cent in 1968-69. Correspondingly, the value of imports have also been progressively on the increase since 1971-72. (While purchases from abroad of all varieties of fertilisers cost the country Rs. 90.23 crores in 1971-72 as against Rs. 163.00 crores, Rs. 116.77 crores and Rs. 95.87 crores during each of the preceding three years, purchases valued at Rs. 118.81 crores, Rs. 183.49 crores and Rs. 402.45 crores were made respectively during 1972-73, 1973-74 and 1974-75). The extent of the country's dependence on imports in the recent past would also be evident from the fact that while the investments made in the indigenous fertiliser industry (public sector) during the five year period from 1970-71 to 1974-75 totalled Rs. 531.35 crores, the fertiliser import bill during this period amounted to as large a sum as Rs. 890.85 crores, and in 1974-75 alone, the import bill (Rs. 402.45 crores) was more than double the investment (Rs. 200.88 crores) in the public sector for augmenting indigenous production of fertilisers.

1.61. These statistics serve to emphasise the imperative need for exercising great care in planning for the imports of a vital commodity, which is known to be acutely sensitive to world demand, supply and price trends, and for evolving a sound and rational import strategy which would enable purchases being made at the proper time and at the most advantageous prices. Unfortunately, however, as would be seen from the facts disclosed in the foregoing paragraphs as well as from some of the specific cases of purchases discussed later in this Report, it appears that there had been no

scientific planning in the past on which a sound import strategy could have been determined, as a consequence of which recourse had often to be had to distress purchases at inopportune moments, when market conditions were unfavourable, to bridge the gap between demand and production. It also appears that imports were persisted with even when the estimated demands and consumption levels did not materialise, resulting in purchases in a falling market at abnormally high prices and avoidable inventories and accumulation of stocks.

1.62. In the Committee's view, the failure of the strategy hitherto adopted for the purchase of fertilisers from abroad is mainly attributable to the unreliable and unscientific estimation and projection of consumption and demand, indigenous production and requirements, leading to periodical changes and adjustments in the purchase programmes which proved to have been, in the ultimate analysis, detrimental to the country's financial interests. The Committee have been informed that the annual import requirements of fertilisers are worked out by the Department of Agriculture by deducting the domestic production, as estimated and communicated by the Ministry of Petroleum and Chemicals, from the total agronomic requirements, which in turn are estimated a year in advance, of fertilisers to support the agricultural production programmes of that year. The requirements thus computed are intimated to the Department of Economic Affairs for authorisation of the imports and allocation of funds. That Department, in turn, depending upon the availability of foreign exchange resources, approves the purchases either against free foreign exchange or against foreign aid or credit or from Rupee Payment Areas under bilateral trade agreements. While all this sounds simple enough, the Committee find that in actual practice, there were wide variations between the consumption levels estimated initially and actual consumption and off-take and between the estimates of indigenous production intimated by the Ministry of Petroleum and Chemicals and actual production, as a result of which the import requirements as assessed by the Department of Agriculture had mostly been wide off the mark and far removed from realities.

1.63. For instance, the Committee find that the estimates of fertiliser consumption levels, which forms the basis for assessing requirements and

planning for import, have never been realised to the full extent which would indicate that these were perhaps optimistic and on the high side. Thus, during 1969-70, 1970-71 and 1971-72, while the agronomic requirements of nitrogen and phosphorus had been estimated at 23.00 lakh tonnes, 27.50 lakh tonnes and 28.00 lakh tonnes respectively, actual consumption was only 17.72 lakh tonnes, 20.20 lakh tonnes and 23.36 lakh tonnes. A similar trend is discernible in the subsequent years also and during 1972-73, 1973-74 and 1974-75, the actual consumption of nitrogen and phosphorus was respectively 24.21 lakh tonnes, 24.80 lakh tonnes and 22.51 lakh tonnes as against the estimates of 30.00 lakh tonnes, 34.10 lakh tonnes and 39.10 lakh tonnes. Similarly, there were wide variations between estimates and actuals during this period in respect of potassic fertilisers also. That the projections made in this regard were unrealistic is also borne out by the following observations contained in the 'Fourth Plan Mid-term Appraisal':

"Fertiliser consumption has not increased as planned. The targets are not likely to be reached. The likely consumption of nitrogenous fertilisers in 1973-74 is now reckoned at 2.60 million tonnes (N) as against the original target of 3.20 million tonnes (N). Against the Plan target of 1.4 million tonnes (P2O5) for phosphatic fertilisers, actual achievements are likely to be around 0.8 million tonne (P2O5)."

The draft Fifth Five Year Plan also refers to the shortages in the achievements of fertiliser consumption targets.

1.64. Though it was contended during evidence by the representative of the Department of Fertilisers and Chemicals that an estimation of fertilisers which will be actually consumed by the peasants is "by no means an easy task", and that when even developed countries were not finding it easy to estimate the fertiliser consumption level in agriculture, what the Department of Agriculture was doing was "quite good in international circumstances", it has nevertheless been conceded by the representative of the Department of Agriculture that "in the past, the nature of the methods of assessment of the requirement was not very satisfactory". Admittedly also, upto 1970, the Department had been assessing the consumption of fertilisers with reference to what the State Governments had asked for and the figures of consumption intimated by the State Governments were "very inflated ones" and their demands "irrational". The Committee have also been told in this context that the State Governments merely went by the recommended doses without any reference to levels of consumption in the State. Even after the Department of Agriculture themselves assumed the responsibility subsequently of assessing the requirements, the practice till

1971-72 was to allow an ad hoc increase of 25 per cent over the consumption achieved in the States in the previous year, which was also, according to the witness "found to be a little irrational."

1.65. The Committee find that it was only in respect of the requirements for 1972-73 that serious attempt to assess the requirements on a more realistic basis was made for the first time, in December 1971, when a sub-committee, under the chairmanship of the then Additional Secretary, Ministry of Foreign Trade, was appointed to go into the requirements projected by the Department of Agriculture in October 1971 and to evaluate the supply position vis-a-vis requirement. This sub-committee, after studying the trends of consumption and various other factors, also came to the conclusion that it would suffice if the requirements were worked out after allowing a certain percentage increase over the consumption of the previous Kharif and Rabi seasons and accordingly recommended an increase of 23 per cent over the previous year's consumption. However, on the Committee of Secretaries suggesting a fresh look at the demand projections, the sub-committee recommended, in March 1972, that the projections for Kharif, 1972 be made on the basis of an increase of 15 to 20 per cent over the Kharif, 1971 consumption, and for Rabi, 1972-73 on the basis of an increase of 20 to 25 per cent over the consumption during the preceding Rabi season. The Committee of Secretaries, which considered these recommendations, appears on the contrary to have adopted a safe course when they decided that the demand for 1972-73 should be worked out on the basis of 17 per cent increase over the consumption of the preceding Kharif season and 22 per cent increase over the preceding Rabi consumption, as against the increments of 20 per cent and 25 per cent respectively over the consumption of the previous Kharif and Rabi seasons recommended earlier, in October 1971, by the Standing Committee on Fertilisers of the Department of Agriculture.

1.66. That this elaborate exercise spanning nearly six months did not also produce the desired results would be evident from the figures of estimated requirements and actual consumption quoted earlier in paragraph 1.61 (In 1972-73, actual consumption of fertilisers was only 24.21 lakh tonnes of nitrogen and phosphorus as against the estimated demand of 30.00 lakh tonnes). The representative of the Department of Agriculture also admitted during evidence that "this was really a formula which was adopted to arrive at an agreed figure. As has been pointed out earlier, the tendency appears to have been to base future projections on the recommended doses without, however, taking into account the fact that the farmers do not always use the full recommended doses, and herein lies the root cause of the inflated estimates of fertiliser consumption for the future. Besides, as has been rightly pointed out by a recent (June 1976) study by the Reserve Bank of India on 'Fertiliser Consumption in Indian Agriculture', the pre-Plan levels of consumption of fertilisers were so low

as a base that subsequent increases in consumption worked out to a high compound growth rate and "such high growth rates cannot be expected to be sustained throughout in future for the simple reason that the bulk of fertiliser consumption, by and large, is accounted for by certain pockets in various parts of the country with favourable conditions for its use and even as it reaches a near saturation level at the existing level of technology and related factors like irrigation and cost-price relationship the scope for further growth is rather limited." Unfortunately, however, the availability of complementary inputs like credit and irrigation on which the use of fertilisers depends to a large extent does not also appear to have been taken into account while making demand projections. Yet another variable factor which seems to have been lost sight of is the variation in soil-crop complexes from place to place. In these circumstances, it is not at all surprising that the estimates made from time to time had gone away.

1.67. It would, therefore, appear *prima facie* that inflated consumption figures had been assumed somewhat mechanically and not on the basis of any sound statistical data leading to unrealistic forecasting of demand and requirements, which also had its inevitable impact on the import programme. It would also appear that Government had played excessively safe and erred on the side of liberalism in planning fertiliser imports and that some of the imports could well have been avoided by a more scientific and realistic assessment of requirements. The Committee are of the opinion that greater care could and ought to have been exercised in planning for the import of an item like fertilisers instead of adopting *ad hoc* measures.

1.68. The Committee have, however, been informed that certain corrective measures aimed at ensuring a more accurate forecast of requirements have since been taken and that "a very scientific method" has been evolved recently to arrive at the total demand by linking the assessment to the actual consumption in each State and also the level of consumption reached in individual States and to the agricultural production programmes of the States. Under this method, which was adopted for the assessment of fertiliser requirement for Rabi, 1973-74, the area under high yielding variety programmes, non-high yielding variety cereals and other commercial crops is taken into consideration separately and the requirements computed in the following manner:

- (i) An option was given to the State Governments to select the best fertiliser season since 1969-70 as the base.
- (ii) The area under different crops in a State was standardised by converting the area under different crops and reducing these area figures into one common figure. For instance, if a State grew HYV wheat, local wheat, HYV Bajra, local Bajra, Sugarcane, Potatoes and Cotton, the area under these various

crops was reduced into one area (e.g. area under HYV wheat), the conversion being done by assuming certain conversion ratios, based on the recommended doses. It was, thus, assumed that if HYV wheat required one unit of fertilisers, non-HYV wheat would need 1/2 unit, cotton 1 unit, HYV Bajra 1/2 unit, local Bajra 1/4 unit, etc. and the standardised areas of different crops were added to arrive at one common figure.

- (ii) The average dose required was then calculated by dividing the consumption at (i) by the area calculated as at (ii) above.
- (iv) On the average dose thus calculated, a 5 per cent increase was granted for each season to obtain the estimated dose for the season under consideration. (Thus, if the average dose had been calculated for Rabi, 1970-71 season, a 5 per cent increase was given for Rabi, 1971-72, another 5 per cent for Rabi 1972-73 and yet another 5 per cent for Rabi 1973-74).
- (v) The estimated dose so arrived at was multiplied by the standardised area for Rabi, 1973-74 (or for the season for which assessment is to be made) to work out the total requirements of fertilisers.
- (vi) However, in case Rabi, 1972-73 season happened to be the best season for a particular State, this State was granted yet another 5 per cent increase over the requirements worked out at (v) above. (The reason for this is stated to be the artificial depression of consumption during 1972-73 on account of non-availability of fertilisers and it was, therefore, assumed that if sufficient fertilisers were available, the consumption "would have been comparatively a little more"). The State Governments were, however, given the option of choosing between the results obtained by this method and those obtained on the basis of the method earlier adopted in respect of assessment of requirements for 1972-73, viz. applying an increment of 22 per cent over the preceding Rabi consumption.

1.69. A further refinement in the method of assessing fertiliser requirements was introduced for the Kharif, 1974 season, on the basis of the recommendations of a Committee constituted, under the Chairmanship of the Joint Secretary (Inputs), Department of Agriculture, to go into this question once again when some State Governments (particularly in the eastern region) protested that the earlier method, according to which a uniform rate of increment over the previous best year's consumption was allowed for all States was weighted in favour of the States which had already progressed far in fertiliser consumption and did not take into account the fact that some States which had started with low levels of consumption had the

potential for achieving a much higher level of consumption. This Committee (the Anna George Committee), while broadly approving the method adopted by the Department for Rabi, 1973-74, however, suggested that comparatively backward States should be accorded a higher rate of increase in the dosage rate to enable them to gradually catch up with the progressive States and had arrived at the following conclusions:

- (i) The assessment should be based on the production programmes of the season and not on the basis of past consumption only.**
- (ii) By and large, the formula proposed by the Ministry of Agriculture was considered to be sound except for the rate of increment which it was felt should not be uniform for all the States.**
- (iii) The increment in dose to be allowed for each State may be worked out in such a manner that the consumption per hectare of all the States will be brought more or less to the same level in a reasonable number of years, say 8 or 10 years.**

In pursuance of these recommendations, while assessing the fertiliser requirements of the States for Kharif, 1974, the States were classified into eight groups on the basis of their consumption per hectare in a year of no shortage and a different percentage increase in the average dose, varying between 5 per cent (for States like Punjab) and 12 per cent (for States like Assam, Tripura, etc.) was granted to each group of States. However, from Rabi, 1974-75 onwards, on complaints from the States that the percentage increase accorded to the backward States was "too meagre", the States were reclassified into nine groups and allowed percentage increases in the average dose varying from 5 per cent (Punjab and Pondicherry) to 20 per cent (Assam, Manipur, Tripura and Rajasthan).

1.70. While the Committee concede that this represents a certain improvement over the earlier methods of estimation of requirements, they, however, find that even this method suffers from a number of deficiencies with a number of basic issues involved remaining largely unresolved, and that this can, therefore, be considered at best a sort of compromise formula. For instance, the Committee note that under the revised method of assessment, an option was given to the State Governments to select the best consumption season since 1969-70 as the base. For forecasting purposes, the base should be, by and large, a representative base and not a biased one which will result in excessive weightage being given to extremes of high or low performance, thus vitiating the reliability of the final figures. Further, though the fertiliser requirements have been linked to the production programmes, the conversion factor employed for standardisation of the area under different crops is once again based on the recommended doses and here again the fact, referred to earlier in paragraph 1.64, that the farmers do not always use the full recommended doses appears to have been lost sight of.

In this context, the observations contained in the Report of the Programme Evaluation Organisation of the Planning Commission for Kharif, 1967, that "the nitrogenous fertilisers were applied for about 2/5th of the high-yielding paddy plots and at about half the recommended dose" are also relevant. In fact, the Committee also find from the Report of the Anna George Committee that the Economic and Statistical Adviser to the Ministry of Agriculture (who was also a member of the Committee) had also drawn attention to the fact that even in IADP (Intensive Agricultural Development Programme) districts, the recommended doses had not been achieved even at a time when there was no shortage of fertilisers. Besides, since Demand Estimation is a positive and not a normative analysis, the prescribed or recommended dosages can be employed as a basis for estimation only if the other factors which influence the use of fertilisers, like availability of funds, climatic conditions, other infra-structural facilities and, above all, willingness on the part of the farmer to employ fertilisers, are held to be 'ceteris paribus' factors, and this is an assumption which is naturally extremely restrictive. The basis on which the incremental percentage of 5 per cent over the average dose was arrived at for Rabi, 1973-74, is also not clear to the Committee. Finally, whatever might have been the reliability of this method, it had been nullified to a considerable extent by giving an option to the State Governments to choose either the results obtained by this method or those obtained by the earlier one which was even less scientific. In these circumstances, and also in view of the fact that the actual consumption of fertiliser during 1973-74 and 1974-75 was only 24.80 lakh tonnes and 22.51 lakh tonnes respectively as against the estimates of 34.10 lakh tonnes and 39.10 lakh tonnes, the Committee are doubtful whether even the revised method of estimation of requirements can be considered dependable.

1.71. It is thus fairly evident that the major problem of estimation of domestic requirements, which forms the basis for the import strategy, is yet to be resolved satisfactorily, and the requirements continue to be computed by adopting different criteria more with a view to reconciling the divergent claims of the comparatively developed States and the developing States, as a result of which a certain amount of adhocism still persists in working out the requirements. The Committee are of the view that it should not be too difficult to ensure a more accurate forecasting of requirements by adopting various tools of demand estimation as are provided by the science of econometrics. While they admit that even the most rigorously scientific, econometric methods can yield estimates which prove to be different from the actuals, and that these estimates can be vitiated by a number of unforeseen and unpredictable factors, the Committee, however, see no justification for the replacement of scientific estimation by ad hoc and arbitrary formulae. Imports of fertilisers should not be planned on the basis of a mere extrapolation of past trends in this regard but in the context of a definite

picture emerging from a scientific study of the actual patterns of fertilizer use in the country, the evolution of high-yielding varieties of commercial crops, extension of irrigation facilities, multiple cropping, break-through in dry farming techniques, etc. A critical review of the estimates projected from time to time would also be necessary to determine what went wrong and, benefiting from past mistakes, to adopt concrete corrective measures promptly. The Committee, therefore, recommend that such a review should be undertaken with the assistance of experts in the field of econometrics and the fertilizer import policy realigned and determined in a more scientific and realistic manner.

1.72. A sound machinery for the collection of relevant statistical data is also a basic pre-requisite for a scientific estimation of demand and requirements. For any planning on a realistic basis, it is also absolutely necessary that the planning agency is provided with timely and reliable data. In this connection, the Committee find that the Indian Institute of Management, Ahmedabad had suggested, at the request of the Department of Agriculture, a system of data reporting in regard to stocks and sales of fertilisers using the retailers as the reporting base and that their suggestions included rationalisation of the report format, avoidance of double accounting and streamlining of the reporting machinery. It, however, appears that this system, when tried out in Punjab and Tamil Nadu, disclosed "large scale defaults" in the reporting by the retailers, despite a legal obligation cast on them and it was, therefore, proposed to adopt the wholesalers rather than the retailers as the reporting base and also to maintain a month-wise flow of data for effective import planning. It also appears from the Report of the sub-committee, appointed to examine the requirements projected for 1972-73, that the Department of Agriculture were also not in possession of past data relating to the actual dosage per hectare used for different crops. Stressing, therefore, the importance of timely and contemporaneous flow of all relevant data, the Committee desire that the adequacy of the existing machinery for data collection should be reviewed and necessary measures taken urgently to streamline it so as to ensure that the data collected is timely and also reliable to form a sound basis for the formulation of policies. They would also like to be apprised of the specific steps taken in this regard and whether the adoption of the wholesalers as the reporting base has worked satisfactorily.

1.73. As pointed out earlier, another factor responsible for the deficiencies noticed in the planning for imports is the unreliable estimation of indigenous production of fertilisers by the Department of Fertilisers and Chemicals. The Committee are concerned to observe a wide gulf between the estimates initially projected by the Department, on the basis of which the import strategy was determined often with disastrous results, and the actual

production. The estimates had also been periodically revised by the Department of Fertilisers and Chemicals as a result of which changes and adjustments had to be made in the purchase programmes, not always to the country's advantage. Thus, the original estimates (December 1970) of 14.20 lakh tonnes of Nitrogen, expected to be produced during 1971-72, had been revised in April 1971 to 13.20 lakh tonnes and further revised in October 1971 to 11.90 lakh tonnes, while the actual production amounted to only 9.52 lakh tonnes. Similarly, as against the original estimates (October 1971) of 18.20 lakh tonnes, revised estimates (December 1971) of 14.05 lakh tonnes and further revised estimates (June 1972) of 12 to 13 lakh tonnes, the actual production of nitrogen in the country during 1972-73 was only 10.60 lakh tonnes. The position in this regard was no better during 1973-74 and 1974-75 also. While in 1973-74, actual production of nitrogen was 10.60 lakh tonnes as against the original estimates (June 1972) of 16.00 lakh tonnes, revised estimates (February 1973) of 14.04 lakh tonnes and re-revised estimates (July 1973) of 11.28 lakh tonnes, during 1974-75, actual production amounted to 11.85 lakh tonnes as against the initial estimates (December 1973) of 15.50 lakh tonnes and revised estimates (November 1974) of 12.70 lakh tonnes. The indigenous production of phosphatic fertilisers had also not come upto the levels originally estimated and subsequently revised during these years. The representative of the Department of Agriculture also informed the Committee during evidence that it had been the Department's experience that the actual indigenous production was "far below the estimates given earlier" by the Department of Fertilisers and Chemicals.

1.74. The representative of the Department of Fertilisers and Chemicals admitted during evidence that he "would not hesitate to concede that, over the past six to seven years, the estimations have not been accurate", and that "there has been a big gulf between the target and the actual production." It appears that while forecasting estimates of indigenous production, a somewhat facile assumption had been made that the new fertiliser projects would actually be commissioned as planned, as a consequence of which the estimates had been pitched at levels which were even higher than the then existing installed capacities. The fact that even the existing plants were operating only at levels far below their installed capacity also appears to have been overlooked. Thus the estimates themselves bore no relation to the available capacities and delays in the commissioning of new plants inevitably made the estimates unreliable and unrealistic. The Committee cannot help feeling that adequate care had not been exercised in this regard by the Department which is regrettable.

1.75. The Committee have been informed that the Department of Fertilisers and Chemicals, learning from past mistakes, have revised the method of estimation from 1975-76 onwards. Under the revised method, the estimates of production are based entirely on the performance of the operating

units and no credit is taken for production likely to come out of units expected to go on stream during the year. Even in estimating production from the operating units, a suitable provision is made for likely loss in production arising out of known constraints like power cuts fluctuations, shortage of raw material, labour problems, etc. From the gross assessment of production an overall allowance to the extent of 5 per cent is made for all unforeseen shutdowns due to labour problems, mechanical breakdowns, accidental damages etc. The Committee, however, note that there was variation in the estimates of production and actual production of nitrogenous and phosphatic fertilisers during 1975-76 and 1976-77. The production of nitrogenous fertilisers during 1975-76 was 2.30 per cent in excess over original targets but 2.60 per cent less than original targets in 1976-77. The production of phosphatic fertiliser was 17.90 per cent less than original target during 1975-76. The Committee would, therefore, like the Ministry of Chemicals and Fertilisers to have a fresh look at the method employed for estimating indigenous production and devise a more scientific and realistic method which would ensure that all the variables are taken into account and the estimates approximate as closely as possible, to the actuals. The Committee are also of the opinion that since under the revised method of estimation, the likely increase in production as a result of commissioning of new plants during the year is not taken into account, a situation may well arise (in the event of the new plants going on stream as per schedule) in which the import requirements worked out on the basis of these depressed estimates of production may prove to be excessive. The Committee are, therefore, of the view that in forecasting, for the purposes of planning for imports, indigenous production of fertilisers, this fact should also be taken into account suitably and the progress made in the commissioning of new plants as well as the performance of existing plants monitored effectively and continuously so that timely intimation regarding likely increase in or set-back to production could be made available to the indenting agency (Department of Agriculture) and the procurement organisation (Minerals and Metals Trading Corporation).

1.76. Hitherto, the procurement of fertilisers from abroad was also dependent on the availability of foreign exchange and the Committee have been informed in this context that earlier the Department of Economic Affairs used to authorise imports of quantities less than what had been estimated by the Department of Agriculture and also allot foreign exchange only in instalments. As a result, the requirements of fertilisers to be imported by the Department of Supply had been regulated periodically having an inevitable impact on the prices. Thus, during 1972-73, as against the initial requirement of 60,000 tonnes of Muriate of Potash (special grade) for Madras Fertilisers Ltd., indents for the procurement of only 22,000 tonnes could be placed on 24 March 1972 owing to shortage of foreign exchange and less availability of credit, which were later revised to 65,000 tonnes (after taking

into account the modified demand of Madras Fertilisers Ltd.) on 11 April 1972, after the Department of Economic Affairs had clarified that larger credit would be available. Similarly, periodical adjustments in the purchase programme for urea had to be made as and when the Department of Economic Affairs authorised purchases against credit or released additional foreign exchange. Such piece-meal purchases, particularly during 1972-73, when there was admittedly a general world-wide shortage of fertilisers leading to increases in international prices of fertilisers (prices of urea, for instance, ranged from US Dollars 65 to US Dollars 67 C&F approximately between April, 1972 and July 1972 and from US Dollars 70 to US Dollars 92 C&F between August 1972 and February, 1973), had obviously adversely affected the procurement programme and resulted in purchases at disadvantageous prices.

1.77. In the opinion of the Committee, better results might have ensued had indents for the entire quantity of fertilisers, computed on a more scientific and rational basis, required during the year had been placed in advance after, of course, taking into account the prevailing market prices and the likely behaviour of the market during the following period, as this would have made for better planning and lower prices. The Committee have been informed in this connection that the Department of Economic Affairs now make a bulk allotment of foreign exchange straightaway which has enabled the Department of Agriculture to streamline and overcome some of the difficulties faced in the past in procuring fertilisers through the Department of Supply and the Minerals and Metals Trading Corporation and they trust that this would bring about the desired improvements in planning for imports and placement of demands on the purchase agencies.

1.78. It would also be seen from a specific case of purchase of ammonium sulphate discussed later in this Report that while planning for imports of fertilisers, even the elementary precaution of building up a market buffer which could be used in times of emergency had not been taken. This combined with the unrealistic estimation of requirements and indigenous production, led to purchases at wrong seasons and at prohibitive prices on the ground that the requirements were urgent and could not be postponed, and placed the country at the mercy of the suppliers and allowed little leverage in negotiations. The Committee were amazed to learn from a representative of the Department of Agriculture that imports were resorted to only "when the stocks had run down almost to the last tonne" which was "very well known" to the suppliers who "have exploited us year after year". Now that a decision has been taken, though belatedly, to allow a market buffer of 10 per cent and pipeline provision of 20 per cent, the Committee hope that there would be greater flexibility in making purchases keeping in view the seasonal advantages and market conditions and distress purchases at inopportune moments will be a thing of the past.

1.79. The success or failure of the import strategy also depends to a very large extent on effective coordination and speedy exchange of information between the different agencies involved in planning and implementation. The Committee note that in respect of fertilisers, a multiplicity of agencies are concerned with various aspects of imports. While the Department of Agriculture is responsible for assessing requirements, prescribing material specifications and shipping schedules, and placing indents, indigenous production is monitored by the Department of Fertilisers and Chemicals, imports authorised by the Department of Economic Affairs and the actual procurement done by the Department of Supply and the Minerals and Metals Trading Corporation (with effect from 1 August 1975, however, the entire purchase of fertilisers from abroad has been centralised in the Minerals and Metals Trading Corporation). Similarly, the responsibility for marketing and distribution of fertilisers has been entrusted to the Department of Agriculture and the State Governments. It is, therefore, evident that unless effective liaison and coordination are maintained between all the agencies involved, integrated functioning would be well high impossible. Though it has been claimed during evidence that effective interministerial coordination was in fact being ensured, judging from the actual performance, the Committee are of the view that a lot more requires to be done in this regard. They would, therefore, stress that a suitable system for continuous coordination and exchange of information between the different agencies involved should be devised and its actual performance kept constantly under review and timely corrective measures taken.

1.80. Consumption trends, which determine the demand, influence to a very large extent planning and strategies for the purchase and stock-piling of fertilisers. The Committee are, however, concerned to find that even though the growth of the indigenous fertiliser industry has been steady with substantial output in absolute terms and imports have also been considerable, the consumption of fertilisers in the country is still extremely disappointing and India, even after Four Five Year Plans, is at the bottom of the world map in fertiliser consumption with the per capita consumption in 1970-71 being only 4 kilograms. It makes distressing reading that in spite of the acknowledged role of fertilisers in augmenting agricultural production, the consumption achieved during the Fourth Plan period was consistently less than the Plan targets, and for the last two years of the Plan, Government themselves had to revise the earlier targets. Thus, as against a 27 per cent compound rate of increase per year in the consumption of fertiliser envisaged in the Fourth Five Year Plan, the actual consumption growth achieved was only 15 per cent in 1969-70 (against the growth rate of 40 per cent achieved in 1967-68), 14 per cent in 1970-71, 18 per cent in 1971-72, 4.5 per cent in 1972-73 and a meagre 0.005 per cent in 1973-74. Again, in the first year of the Fifth Plan (1974-75), even though an ambitious target of 44.26 lakh tonnes (in terms of nutrients) had been proposed, actual consumption achiev-

ed was only 25.79 lakh tonnes, which was even less than the achieved in the preceding three years.

1.81. Explaining the reasons for the decline in consumption of fertilisers during this period, the Department of Agriculture have stated that while the growth consumption during the period from 1966-67 to 1971-72 had been "really remarkable", the consumption going up from 7.57 lakh tonnes of nutrients in 1965-66 to 26.21 lakh tonnes of nutrients in 1971-72, the consumption of fertilisers in 1972-73 and 1973-74 had been "seriously hampered" on account of (i) the domestic production falling "far below expectations" and (ii) non-availability and steep rise in prices in the international market, as well as increase in the cost of indigenous production (on account of increase in the cost of fuel-feed-stock and labour) leading to increase in the cultivators' prices of fertilisers. . . . And in 1974-75, apart from the adverse impact of non-availability and rise in prices, unfavourable weather conditions, shortage of power which reduced the area under irrigation and shortage of diesel oil, aggravated the situation, resulting in less consumption than envisaged. The Committee have also been informed that "a large number of corrective steps" have already been taken to reverse this trend and that a fertiliser promotion scheme was also launched in the Fourth Plan under which a series of demonstrations were organised to encourage the use of fertilisers, which however has not been approved for continuance in the Fifth Plan as a paradoxical situation arose in which while Government were not in a position to provide adequate fertilisers to farmers who needed them, efforts were being made to persuade cultivators to use chemical fertilisers.

1.82. However, now that availability of fertilisers has improved considerably and prices have also been reduced, the Committee feel that an intensive emphasise that a major thrust in fertiliser consumption can be achieved only through sustained promotional activities and that in the interest of sound agricultural development, there should be greater awareness amongst the farmers of the role of balanced nutrition and complex fertilisers. A well thought out and properly integrated promotional approach, in which duplication and overlapping of efforts should be avoided, is also necessary to overcome the apathy of the average farmer to the use of fertilisers. As has also been pointed out by the Committee on Public Undertakings, in paragraph 5.41 of their 50th Report (Fifth Lok Sabha), the promotional programmes undertaken by the Fertiliser Corporation of India Limited should be properly dovetailed and integrated with the other promotional measures of the State Governments to avoid any overlapping.

1.83. Another important aspect which needs to be kept in view while undertaking promotional activities is the identification of areas in which

fertilisers can be profitably utilised. The Committee learn that six States (Andhra Pradesh, Tamil Nadu, Gujarat, Maharashtra, Uttar Pradesh and Punjab) alone accounted for over 65 per cent of the total consumption of fertilisers in the country during the period from 1970-71 to 1974-75. Accelerating the growth rate of fertiliser use should, therefore, be directed in those areas where consumption is low and also towards aiding small farmers, by making available timely credit for a package of inputs and other necessary infra-structural facilities, in taking to the use of fertilisers on a much larger scale than before. All this necessarily calls for concerted efforts and effective coordination at all levels as well as a periodical evaluation of the efficiency of the measures undertaken and the Committee trust that timely and concentrated action would be taken in this regard.

CHAPTER II

PURCHASES AND CONTRACTS

I. PURCHASES

Audit Paragraph

2.1. All purchase proposals are considered by a Fertiliser Purchase Committee under the Chairmanship of the Secretary, Department of Supply, and consisting of representatives of the Departments of Agriculture, Economic Affairs, Expenditure, Transport, Ministry of Commerce and the Minerals and Metals Trading Corporation. The Committee also prescribes ceilings for purchases to be made by the Minerals and Metals Trading Corporation. After purchase decisions have been taken by the Department of Supply with the approval of the Fertiliser Purchase Committee, formal contracts are executed by the Director General, India Supply Mission, Washington (on suppliers in U.S.A. and Canada), the Director General, India Supply Mission, London (on supplies in U.K. and West Europe) and the Director General, Supplies and Disposals, New Delhi (on suppliers in other countries, such as Japan, Kuwait, etc.).

2.2. A test check of purchases made by the Department of Supply was made. In all 186 contracts executed during February, 1971 to September, 1973 were checked.

2.3. The following table shows the method of purchase followed by the Department of Supply during the last three years:

Year	Total Purchase	Purchase by negotiations	Percentage of Purchase by negotiations
	(Lakh tonnes)		
1970-71	12.77	5.99	47
1971-72	13.87	5.13	37
1972-73	30.92	28.00	91
TOTAL	57.56	39.12	68

2.4. Analysis of 176 contracts relating to the above period with reference to sources of finance and methods of purchase are given below:

(Qty. in lakh tonnes)

Source of finance	Purchase by tender		Purchase by negotiations following tenders		Purchase by negotiations only	
	Number of contracts	Quantity	No. of contracts	Quantity	No. of contracts	Quantity
(i) U.S. and Canadian AID loans	50	10.44	Nil	Nil	Nil	Nil
(ii) Other loans and credits (U.K., West Europe and Japan)	Nil	Nil	Nil	Nil	34	6.71
(iii) Free foreign exchange	26	3.34	30	5.68	36	11.95

2.5. It is obligatory to invite tenders from the suppliers of the country giving the aid or loan for purchase against (i) above. It would be seen that out of 92 contracts of the third category (purchases from free foreign exchange) for purchase of 20.97 lakhs tonnes of fertilisers which have been test checked, 36 contracts for 11.95 lakh tonnes (57 per cent) were placed by negotiations only.

2.6. Prior to 1966, purchases were mostly made as a result of tenders. It has been stated (January, 1975) by the Department of Supply that thereafter delegations were generally sent abroad for negotiations as it was noticed that the main suppliers in foreign countries had a tendency to quote "ring prices" on C&F basis and tenders were dispensed with, where not essential. Even where tenders were issued, the purpose, it has been stated, was to use the offers received as guidelines for negotiations; where, however, regulations, as in the case of some foreign aids, required it, tenders were invited and in these cases no negotiations were held, as the regulations prohibited negotiation.

2.7. It was decided in February, 1971 that ordinarily suppliers should be invited to come to India if negotiations were necessary, as that would ensure prior consultations with, and approval by, Government and general result in better terms of purchase. In May, 1971, it was, therefore, decided that no delegation need be sent to Europe for purchase of fertilisers. In February, 1972, it was decided that departure from the policy of holding negotiations in India for purchases from abroad would be allowed only if it was in the national interest. Nevertheless, during April, 1971 to September, 1973, eleven delegations went to Japan, West Europe, U.K., U.S.A., Canada and Kuwait. On return from abroad, the delegations submit report to Government.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil); pp. 100—102].

A. Methodology of Purchase

2.8. According to a note furnished to the Committee by the Department of Agriculture, the Department as the indenting Ministry in respect of procurement of fertilisers, lays down the material specifications, bagging specifications (in case the material is received in bags), shipping terms, etc. The Department of Agriculture is also responsible for the assessment of fertiliser requirements, its allocation to various State Governments taking into account the indigenous production, and for making available necessary foreign exchange for various purchases, follow-up despatch instructions not only of imported fertilisers but also of indigenous production. Prior to

1 August, 1975, the work relating to procurement of fertilisers from free foreign exchange and General Currency Areas—U.S.A., Canada, West Europe, Japan and Middle East countries were centralised in the Department of Supply in the sense that all contracts were finalised by the Department of Supply and purchases from the Rupee Payment Areas were handled by the Minerals and Metals Trading Corporation. With effect from 1 August, 1975, however, purchase of fertilisers from all foreign countries has been entrusted to the Minerals and Metals Trading Corporation.

2.9. The Department of Agriculture further informed the Committee that all purchase proposals after the approval of the material specifications etc. by the Department of Agriculture, are considered by a high powered committee, known as the Fertiliser Purchase Committee. Prior to 1 August, 1975 when import purchases were made by the Department of Supply as well as by the Minerals and Metals Trading Corporation, the Fertiliser/Purchase Committee was constituted under the Chairmanship of the Secretary, Department of Supply and consisted of the Secretary of the Department of Agriculture, Secretary, Department of Expenditure, Secretary, Department of Economic Affairs, Joint Secretary, Ministry of Shipping and Transport, Joint Secretary, Ministry of Commerce and Chairman, Minerals and Metals Trading Corporation. After purchase decisions were taken with the approval of the said Fertiliser Purchase Committee, formal contracts were executed by the Director General, India Supply Missions at Washington and London on suppliers in so far as purchases controlled by the Department of Supply were concerned (*i.e.* from the free foreign exchange and General Currency Areas). The Minerals and Metals Trading Corporation placed contracts under Rupee Payment on suppliers from the East European countries. As and when there was any item concerning the Ministry of Petroleum and Chemicals to be considered at the Fertiliser Purchase Committee, that Ministry was also invited to the meetings of the Committee.

2.10. Since it has been decided that the Minerals and Metals Trading Corporation would be the only single agency responsible for the purchase

of fertilisers with effect from 1 August, 1975, the Corporation would be assisted in its deliberations by a Fertiliser Purchase Committee under the Chairmanship of the Chairman, Minerals and Metals Trading Corporation, with the following members:

1. Director (Fertiliser), MMTC.
2. Director (Finance), MMTC.
3. Additional Secretary, Ministry of Finance (Department of Expenditure).
4. Joint Secretary, Ministry of Finance (Department of Economic Affairs).
5. Joint Secretary (Inputs), Ministry of Agriculture, (Department of Agriculture).
6. Joint Secretary, Ministry of Petroleum & Chemicals, (Department of Chemicals Fertilisers).
7. Joint Secretary, Ministry of Shipping & Transport. (Department of Transport).
8. Joint Secretary, Ministry of Commerce.

2.11. The Audit paragraph points out that while 47 per cent and 37 per cent respectively of the total purchases made by the Department of Supply during 1970-71 and 1971-72 had been purchased by negotiations, 91 per cent of the total purchases during 1972-73 were by negotiations. The Committee enquired into the position in this regard in respect of the purchases made by the Department of Supply and the Minerals and Metals Trading Corporation during 1973-74 and 1974-75. The information furnished by the concerned agencies is tabulated below:

(Quantity in lakh MT)

Year	Total purchases	Purchase by negotiations	Percentage of purchase by negotiations
<i>A. Department of Supply</i>			
1973-74	19.20	19.20	100%*
1974-75	24.99	24.99	100%
<i>B. Minerals and Metals Trading Corporation@</i>			
1973-74	5.13	5.13	100%
1974-75	11.72	11.72	100%

*The Committee were informed by the Department of Supply that during 1973-74, an enquiry had been issued for di-ammonium phosphate without indicating the quantity involved and that contracts for 240,000 MT were placed by negotiations. This quantity has also been included under 'purchase by negotiations'.

@The Minerals and Metals Trading Corporation informed the Committee that its purchases were made from Rupee Payment countries against India's Bilateral Trade Agreements with them and that the contracts were negotiated with the Government enterprises of the countries concerned.¶

2.12. Since the bulk of fertiliser purchases from abroad appeared to have been made by negotiations and not by floating tenders, the Committee desired to know how a reasonable price was ensured by negotiations. A representative of the Department of Supply stated in this connection:

"We have compared from time to time our purchases as compared to the purchases made by other countries and we have found that our prices have been reasonable. We also know who are the main suppliers and the manufacturers. We also know which item should go to which particular country. For example, DAP we normally ask our India Supply Mission to float a 24-hour or 36-hour tender and get the quotations and we use them as the basis for further discussions and on the basis of the market intelligence and the advice that is given to us by the India Supply Mission, London and Washington we go ahead with our purchases."

He added:

"Our experience has been that for fertilisers inviting tenders is not the best method of purchase. We have had discussions a number of times about this in the fertiliser purchase committee meetings and we have felt that most of our purchases should be by negotiation."

2.13. Since all the purchases made by the Department of Supply during 1973-74 and 1974-75 had been through negotiations, as compared to 47 per cent in 1970-71, 37 per cent in 1971-72 and 91 per cent in 1972-73, the Committee asked whether the Department had found by experience that purchases by negotiations was the best method. The witness replied in the affirmative.

2.14. The Committee desired to know whether any comparative study of the advantages and disadvantages of purchases through negotiations and through tenders had been made by the Department of Supply with a view to adopting the most beneficial mode of purchase. In a note, the Department of Supply stated:

"The strategy for the purchase of fertilisers *i.e.* whether purchase should be by tender or by negotiations, was decided by a high powered Fertiliser Purchase Committee which had representatives of the various concerned Ministries namely the Department of Supply, Department of Agriculture, Ministry of Finance (Expenditure and Economic Divisions), Ministry

of Commerce, MMTC and Transport Ministry. All the information and expertise was pooled together in coming to a decision whether purchase should be by tender or by negotiations.

As regards general stores purchased through the DGS&D the normal practice is to invite tenders and accept the lowest offer subject to technical suitability etc. The instructions issued for the guidance of Purchase Officers generally discourage the method of negotiation, but in many cases negotiation becomes unavoidable. Even if no negotiation is necessary on the point of price, the tenderers sometime put down unacceptable terms and conditions, different from those stipulated in the Tender Enquiry, and negotiations of some kind have to be held in order to sort out these differences. Again, it sometimes happens that, after the opening of tenders, some firms offer a belated reduction in price. In such a situation it becomes necessary to give an opportunity to the other tenderers to reconsider their prices, and this comes within the definition of 'negotiation'."

2.15. The Committee enquired into the policy proposed to be adopted by the Minerals and Metals Trading Corporation in regard to the purchase of fertilisers from abroad. The Chairman of the Corporation replied:

"It is a very difficult question to answer. In a rising market, no business concern would normally float a tender. When there are rising conditions in prices, if you float a tender, the quotations are very high, because the parties participating in the tender have a habit of getting together—whether they are from Japan, Europe or other countries—and saying, 'Let us get the best price because there is a big demand'. So, in a rising market, it is better to make arrangements with producers on a long-term basis, not with middlemen who are speculators. This is what we have been advocating from 1973 and this ensures the supply with the possibility of negotiating prices from time to time, not entirely on the basis of market fluctuations."

When asked whether this approach was not different from the approach adopted by the Department of Supply which gave the impressions that negotiation was the best method of purchase, the witness replied:

"That is because the market is buoyant. I feel we must have a judicious combination of both, depending on market condi-

tions. You have to evolve a philosophy in this matter and what we have done in the last two years is to develop a new philosophy for purchase."

2.16. When the Committee drew attention in this context to the report of the F.A.O. on the State of Food & Agriculture, 73 wherein it had been suggested that calling for tenders was preferable to negotiations since this resulted in a certain amount of price flexibility, the witness replied:

"We have actually found from experience that the people who tender get together, because their interests are alike and they keep some sort of margins. Basically they say, the price would be 'X' plus 2 or 3 per cent this way or that way, according to each one's capability to transport it cheaper or to command the cash required for holding on to the stock at cheaper rates of interest, etc. It may vary a few cents this way or that way but there is a sort of understanding among them and prices are rigged up to that extent. It is this danger we wanted to obviate. The tenders are opened in the presence of tenderers and the prices are read out. So, no manufacturer or supplier wants to quote the lowest he can possibly quote. But if you call them and negotiate with them, they are willing to supply at a much lower price. This is borne out by the experience of other developing countries like Sri Lanka, Pakistan, Vietnam etc., who have gone in for tenders at the same time when we purchased by negotiation and paid more than what we paid. If you buy four lakh tonnes of fertilisers, this is such a large quantity that you can influence the price to a great extent. If you publish the tender saying you want to buy 4 lakh tonnes, that itself is going to firm up the price. I think the publicity which is attendant on tenders should be avoided."

2.17. In view of the fact that purchases through tenders had a certain amount of sanctity about them in that the prices were kept secret and contracts could be awarded to the lowest tenders, the Committee desired to know whether this would not be a better method of purchase. The witness replied:

"From the point of view of safety of the person it is good to go by the lowest tender but from the commercial point of view, it is not always good."

He added:

“From the point of view of safety of the man who places order, the tender system is the best. But if you compare the price paid through tenders by Pakistan or by other countries in South-East Asia, you will find a lot of difference. They had paid \$30 to 40 more on tender basis. In fact, in Government service, a person would prefer to go by the lower tender. But if you want good results, some risk will have to be taken.”

2.18. A note furnished subsequently by the Ministry of Commerce/Minerals and Metals Trading Corporation, indicating the comparative advantages and disadvantages of purchases through negotiations and through tenders, is reproduced below:

“There are advantages and disadvantages in purchases through tenders or through negotiations or tender enquiry followed by negotiations with parties. The selection of the method for purchase will necessarily have to depend on a judgment of the market situation at each point of time. While tenders are expected to establish reasonable levels of prices and to indicate the market trend, there is no guarantee that ‘rings’ would not be formed between the suppliers for quoting higher than market prices. While calling for tenders and acceptance of the lowest offer received might be satisfactory in a well-organised market for a commodity the supply of which is well in balance with the demand, it is not always possible to adopt tender buying for fertilisers. When market prices are rising and material is scarce, calling for tenders would establish higher than prices which can be secured through negotiations. Tenders at such times also have a bullish effect on market prices. When market prices are falling and material is plentiful, tenders would establish the general level of prices at which market transactions are being concluded but not necessarily, the lowest prices that can be secured. There is thus, no optimum or most desirable method for buying fertilisers. Purchases against tenders, by negotiations and often, a combination of both, would lead to the most economic buying.”

2.19. Since Russia and China were also dependent on purchases from abroad to meet their requirements of grains, the Committee desired to know the modality adopted by them in their purchases and whether any

studies had been conducted in this regard. The Chairman of the Minerals and Metals Trading Corporation stated in evidence:

“They have developed astute commercial sense in making these purchases. They used to go about in a bureaucratic way before. But now they have changed, they have developed computers, intelligence sources and they are going about this very astutely. You will remember their grain purchase of 1973. Who knows what they are going to buy? Nobody knows that. In our case, FAI, the Ministries, everybody say this is the shortfall, this is so much in respect of indigenous production; so we have to import this much etc. and the whole world is aware of our situation.”

He added:

“Last time Dr. Hammer acted with great secrecy and world knew only this, that they chartered ships in a big way. That was all. For what this was meant, nobody knew. Only when three Chicago merchants bought the grain people knew about it.”

When asked in this connection whether it was not possible to streamline the procedures for the purchase of fertilisers so as to be in an advantageous position as buyers instead of getting entangled in a sellers' market which apparently resulted in a disadvantage at the negotiating table, the witness replied:

“We would certainly like to have the very best of worlds. But we also know how to live with existing conditions. Although we cannot maintain secrecy, we can at least operate in such a way that people will know, these people mean business and they will not buy if good price is not offered.”

2.20. The Committee asked whether the element of secrecy essential in such transactions was difficult to maintain, when other countries were able to conduct their business without the rest of the world getting to know about the requirements. The Secretary, Department of Chemicals stated in this context:

“Much of this information here is published information in the sense that these are statements which we place before Parliament and we give out estimates of consumption in the country, production, shortfall etc. The Soviet Union and China do not, I believe, publish this kind of information.”

2.21. To another question whether it was not desirable to maintain an element of secrecy in transactions relating to purchase of fertilisers so that when Government was forced to enter the world market as a large scale buyer, the prices did not increase unnecessarily, the Chairman, Minerals and Metals Trading Corporation replied:

"I entirely agree with you. So far as our general operation in our Corporation is concerned, we are able to maintain our secrecy. For example, if we send somebody to sell any goods, it is known only to two or three persons, because they give the brief by word of mouth. After that, he notes down in his diary. It is not known to anybody elsewhere. At least, we are now trying to streamline the practice which we have to follow. In other places, papers are stencilled and circulated and then it is made public. It is done by lower grade staff. All these things, we are trying to avoid, as far as MMTC is concerned. We are trying to maintain our secrecy."

2.22. The normal accepted method of purchase of stores by Government purchase agencies is to invite tenders and accept the lowest offer subject to technical suitability, capability of the tenderer, etc. If necessary, the offers and other terms and conditions are negotiated with the tenderers after the opening of tenders. This method has a certain sanctity and secrecy attached to it and ensures purchases in the most competitive manner. In regard to purchase of fertilizers from abroad, however, the Committee find that while it is obligatory to make purchases made through tenders in respect of purchases made against US and Canadian Aid loans, the position in regard to other sources of purchase has varied widely from time to time. While purchases prior to 1966 were made by the Department of Supply mostly as a result of tenders, an analysis of 176 contracts relating to the period from 1970-71 to 1972-73 discloses that 34 contracts for a total quantity of 6.71 lakh tonnes for purchases against loans and credits other than US and Canadian Aid loans (U.K., West Europe and Japan) were placed by negotiations only and 36 contracts (11.95 lakh tonnes), 30 contracts (5.68 lakh tonnes) and 26 contracts (3.34 lakh tonnes) relating to purchases against free foreign exchange were placed respectively by negotiations, tenders followed by negotiations and by tenders. Subsequently, during 1973-74 and 1974-75, the entire quantity (19.20 lakh tonnes and 24.99 lakh tonnes) had been purchased only by negotiations. On the other hand, all the fertilizer purchases by the other procurement agency, Minerals and Metals Trading Corporation, from Rupee Payment countries against bilateral trade agreements with them were negotiated with the Government enterprises of the countries concerned.

2.23. The Committee observe that conflicting views have been expressed in regard to the comparative advantages and disadvantages of purchases

through negotiations and through tenders. While the Department of Supply have maintained that inviting tenders was not the best method of purchase and that purchases by negotiations had been found to be more suitable, the Committee have been informed by the representative of the Minerals and Metals Trading Corporation that while the methodology of purchase to be adopted was difficult to determine, a "judicious combination" of purchases by both tenders as well as negotiations depending on market conditions was considered advisable and would lead to the most economic buying, and that the selection of the method of purchase would necessarily have to depend on a judgement of the market situation at a given point of time. The Committee also understood that while tenders are expected to establish reasonable prices and to indicate the market trend, there was no guarantee that 'rings' would not be formed between the suppliers for quoting higher than market prices and that while calling for tenders and acceptance of the lowest offer might be satisfactory in a well-organised market for a commodity the supply of which is well in balance with the demand, it was not always possible to adopt the tender system for buying fertilisers. On the other hand, the Report of the Food and Agriculture Organisation (FAO) on the State of Food and Agriculture, 1973, points out that export sales are normally on tender which results in a certain amount of flexibility with smaller lots usually commanding the highest prices.

2.24. While the Committee concede, in the circumstances, that it might perhaps be difficult to lay down any rigid norms for the methodology of purchase to be adopted, they would, however, emphasise that before deciding upon the method to be adopted in a particular situation, all the pros and cons should be carefully weighed and the method which would prove most advantageous to the country adopted. In order to safeguard against the possibility of arbitrary and ad hoc decisions, it would also be advisable to invariably record the reasons for adopting a particular method. The Committee also feel that it would be worthwhile to make a comparative study of the methods adopted in the past so as to determine what went wrong on different occasions, as well as those adopted by other countries like USSR and China, and see what improvements can be brought about in the present methods to obtain fertilisers at internationally competitive prices and also on an assured basis for meeting the country's requirements adequately and in time. In any case, it should be possible to maintain strict confidentiality about the quantum of purchase of fertilisers contemplated so that when the country is forced to enter the world market as a large scale buyer, prices do not increase unnecessarily thus placing the country at a disadvantage.

B. Market Intelligence

2.25. Since it had been stated earlier during evidence that negotiations with suppliers were held on the basis of market intelligence and the advice

given by the India Supply Missions at London and Washington, and in view of the fact that fertilisers had to import almost continuously from abroad, the Committee desired to know whether Government obtained continuous information regarding availability, market trends, prices, etc. from agencies abroad. The representative of the Department of Supply stated in evidence:

“We get monthly reports from the India Supply Missions in London and Washington. They keep us informed of the trend of prices.”

When asked whether the advice of the Supply Missions was always obtained with a view to ascertaining the best time to enter the market for purchases, the witness replied:

“We always consult them. For all our purchases in USA, we consult the India Supply Mission, Washington.”

A representative of the Department of Expenditure stated in this connection:

“Purchases are made in accordance with the decisions of the Fertiliser Purchase Committee, but it is always the practice to consult our Embassies in Tokyo, London and Washington as to the appropriate time for making purchases, and actually it is only when the Ambassadors advise that it is the proper time for making purchases that delegations are sent out or the suppliers are asked to come to India for negotiations. There may have been a few exceptions in the past, but during the last two years the purchases have always been made at the best possible time, when the prices were expected to be the lowest in the market.”

2.26. The Committee desired to know the arrangements that exist for obtaining market and economic intelligence from abroad, so that purchases could be made at the most competitive rates and also at a most advantageous time. In a note, the Department of Supply informed the Committee as follows:

“The sources of market intelligence in the Department of Supply are as under:

We get copies of following magazines mainly devoted to fertiliser trade. These are received from ISM, London:

- | | |
|-----------------------------|------------|
| 1. NITROGEN | bi-monthly |
| 2. PHOSPHORUS & POTASSIUM | Do. |
| 3. FERTILIZER INTERNATIONAL | Monthly |
| 4. STATISTICAL SUPPLEMENT | Annual |

The magazine by name 'Chemical Marketing Report' Weekly is received from ISM Washington.

Further we get Reports from time to time from ISM London, ISM Washington and Indembassy Tokyo, Indembassy Kuwait, Indembassy, Ottawa etc. These reports indicate the market trends, tenders issued by foreign countries and news items published in local papers about fertilizers etc.

We also receive circulars from time to time from certain International Suppliers like Messrs Interore, M/s International Commodities Export Company (through Morlidhar Premchand & Co., New Delhi), Woodward Dickerson, etc. indicating the prices of fertilizers as quoted by suppliers against various tenders issued by various Governments.

The delegations which go abroad from time to time study the market trends in fertilizers and submit their report on arrival in India."

The Minerals and Metals Trading Corporation stated as follows in this connection:

"MMTC attempts to keep abreast of the latest position in the fertilizer field through analysis of inter-national journals, trade publications, technical articles, reports of seminars and international conferences on the various aspects of the fertiliser industry. In addition, MMTC has arranged with accredited and very highly reputed international agencies for supply of market intelligence on a confidential basis. MMTC has an Economic and Research Division which examines and analyses such information not only in regard to fertilisers but also to other commodities handled by the MMTC. The officers in the MMTC are also exposed to current literature and keep abreast of technical thinking of the people in the field during the course of handling fertiliser imports. MMTC has kept itself continuously informed of the contracts concluded by the Department of Supply from General Currency Areas.

Market intelligence, particularly in regard to availability and price of fertilisers is an extremely complex matter. A large number of factors affect both. Local production of fertilisers, local consumption, local laws, climatic conditions, world production, availability and requirement are only some of the important factors. Further, there is no standard such as the LME producer price in respect of non-ferrous metals, to determine contract prices. The violent fluctuations in prices in

the last 12 months, is something that the best market intelligence did not predict. Predictions regarding the immediate future are equally vague and divided.

Being net importer of fertiliser and without sufficient financial capacity to build up buffers against price fluctuations or to attempt market stabilisation operations, India has inevitably to buy each year irrespective of prices. Market intelligence and good business judgement have thus a somewhat limited role to play. In judging the performance of trading agencies, these constraints have to be appreciated. But it may be added that by and large, the Indian buying both by Supply Department and MMTC has been competitive and efficient."

2.27. Elaborating on this issue further during evidence, the Chairman of the Minerals and Metals Trading Corporation deposed:

"There are two types of intelligence which we get. One is from commercial attaches and embassies and consuls posted in embassies. Wherever there is fertiliser interest in a particular country we have stipulated that in their monthly letter they should give special information on fertiliser sales, contracts, price at which they are selling, general trends and other things."

He added:

"We get intelligence which is of a sophisticated nature. Many agencies give commercial information which is of a high order. We are paying them. They are able to give secret information which you don't get from others. In March 1972 I was able to get certain trends in the market. There are some such agencies having specialised espionage network in commercial establishments the world over. For example, there is one establishment in London with 200 people, economists, statisticians, operational researchers etc. and they collate information. They have secret funds with which they buy the information and sell to others."

He stated further:

"It is not as if we are not conversant with the western suppliers because, for making our purchases in Eastern Europe, we have been sort of dealing with the western suppliers and comparing the prices and comparing the modalities of operation in both the areas. Our intelligence sources are also not con-

fined to Eastern Europe because the information available from there is only about limited sales under bilateral agreements. For sales in free foreign exchange we have to rely heavily upon intelligence sources outside the area. So, we have made arrangements in the Corporation and we can furnish you with the literature we get—daily reports, monthly reports, quarterly reports and professional journals from all parts of the world. We get nearly 22 periodicals of this type which are published, of course, and there is an Economics Division in my Corporation which gives a weekly report to us. In addition to this, we are making arrangements with certain very well known agencies which give us special reports based on certain matters which we want to be looked into. We have got this arrangement in London and a similar arrangement in Japan and we are contemplating the setting up of another agency which is well known for giving commercial information in regard to fertilisers in U.S.A.

So, these give us a great deal of intelligence which we have to place at the disposal of the Fertiliser Purchase Committee for ordering fertilisers from other parts of the world.”

2.28. When asked whether the same techniques followed by the Corporation for purchasing intelligence could not be utilised to India's disadvantage, the witness replied:

“This is one danger which we cannot avoid in an open world, just as we get commercial secrets from the most privileged sources. Some commercial people have moments of truth when they come out with this information and we do not know the motivations. Some of this information comes out of spite for a rival. There are certain collection agencies like the British Sulphur Corporation which has a huge network of information. Many companies are not very secretive about the information; once a contract is concluded, they give out this information. They do it even on an exchange basis. For example, one of the big companies in the USA has an exchange basis with the British Sulphur Corporation passing on information on sales.

Therefore, it is very likely that by the same token that we are able to get information about other transactions, our transactions may also go out. But no harm is done after the transaction is concluded. What we are trying to do is to know what is happening in the world just now, in the last one week what

has happened, what are the sellings, what are the big contracts and so on. It is not at the stage when it is in gestation, when they are talking about it that we get the secret; it is only when the contract is concluded. But it is still useful to us as a guideline."

2.29. The Committee desired to know whether the Commercial Counsellors posted at various Missions abroad made available relevant economic information about market trends, prices, etc. A representative of the Ministry of Commerce replied in evidence:

"They do send us."

When asked whether this was done as a matter of regular routine, the witness replied in the affirmative.

2.30. To another question whether the Commercial Counsellors had been specially instructed to collect information relating to fertilisers, the witness replied in the affirmative and added:

"They respond regularly. That is part of their job. But they conduct market surveys through specialised agencies wherever they exist, and where such agencies do not exist, they themselves conduct skeleton market surveys."

2.31 The Committee desired to know whether any instance could be cited of the concrete, substantial assistance rendered by the Commercial Counsellors in regard to the trend of prices, market conditions, etc. The witness stated:

"I am not aware of this contribution that they made in this particular deal. But we can find it out."

2.32. The Committee asked whether the Commercial Counsellors or Attaches had any role to play in the negotiations held with the suppliers either abroad or in India. The witness replied in the affirmative and stated:

"They advise and assist the head of the Mission on this particular issue of trade, commerce and economic question."

The representative of the Department of Supply, however, stated:

"Only in Japan, the Commercial Counsellor or the First Secretary was there with us in every meeting. In London and Washington, we have our own staff and we mainly take their assistance."

When asked whether the Supply Missions in London and Washington were adequately equipped to render all necessary assistance in this regard, the witness replied:

“They are both equipped.”

2.33. Asked about the assistance rendered by the officials of Missions abroad in countries other than the U.K. and U.S.A., and the nature of coordination between the purchasing organisation and the aforesaid Missions, the representative of the Department of Supply stated:

“In Germany, I do not remember. But in Rome, we did have a long discussion with the Commercial Charge d’ Affaires as well as the Ambassador. We have normally to rely on our own. we did get help from the Ambassador. I am talking about the earlier years 1972-73 when we did not, except for Rome, take much help from the Embassies. But of course we had written to them that we were coming there and they made arrangements for our stay, and if they had information, they would have given it to us.”

2.34. The Committee, therefore, enquired whether this did not indicate that the Commercial Attaches had been rather indifferent in this regard. The witness replied:

“We did not get much help, except for Rome and Japan and, of course, our own office in USA and London. But about the last two years Mr. . . . would be able to tell you more.”

The representative of the Department of Expenditure stated in this context:

“In all the places that we went to, we associated the Commercial Counsellors on similar Embassy staff with the negotiations and whatever information they had proved to us quite useful. As regards the information—for rather, literature—that we get regularly from various sources, I find that the Supply Ministry has already furnished to the Committee a note on that.”

The representative of the Department of Expenditure also furnished to the Committee a note on the part played by the Commercial Counsellors and other Embassy officials in the fertilisers transactions abroad during the last two years which is reproduced below:

“A Fertiliser Delegation consisting of Shri, Secretary, Department of Supply and Shri, Financial Adviser, visited Belgrade, Zurich, London and Washington between 16th June and 5th July, 1974.

At Belgrade, discussions were held with the Ambassador before negotiations began with the Yugoslav suppliers. During negotiations, First Secretary to the Indian Embassy at Belgrade was present throughout. Mr. . . . of the State Trading Corporation was also present.

At Zurich, discussions were held with Shri. . . Indian Ambassador, who came from Bern for this purpose. No Embassy staff was, however, present during negotiations. The delegation had, however, briefing from Indian Supply Mission, London.

At London, the delegation was assisted in all discussions with the suppliers by the Director General, ISM, London and his staff.

A Fertiliser Delegation consisting of Shri. . . Secretary, Department of Supply and Shri. . . Financial Adviser, visited Dahrán (Saudi Arabia), Rome, Milan, Amsterdam, London and Washington from 29th November to 9th December 1974.

At Dahrán, the delegation was briefed and assisted by Shri. . . First Secretary of the Indian Embassy.

At Rome, Shri. . . Commercial Secretary of the Embassy briefed and assisted the delegation.

During discussions at Milan, no Embassy staff was present and it was not necessary even after the briefing at Rome.

At Amsterdam, the delegation had discussions with the Indian Ambassador and was assisted in its negotiations by the First Secretary of the Embassy.

At London and at Washington, the delegation was briefed and assisted throughout the negotiations by DG, ISM, London and DG, ISM Washington, respectively.

A Fertiliser Delegation consisting of Shri. . . Secretary, Department of Supply and Shri. . . Financial Adviser, visited Japan from 4th April to 15th April 1975.

The delegation had discussions with the Indian Ambassador at Tokyo and during negotiations, they were assisted by Messrs. . . . Commercial Counsellor and . . . Attache (Commercial).

A Fertiliser Delegation consisting of Secretary (Supply) and Secretary (Expenditure) visited Rome, Zurich and London for renegotiations of prices of fertilisers.

At Rome, Shri... held discussions as Secretary (Expenditure) could not join him on account of pressing work at Delhi. It is not clear from the tour Note to what extent the local Embassy staff was associated in the discussions.

At Zurich, Secretary (Supply) and Secretary (Expenditure) held discussions with the suppliers assisted by Shri... First Secretary (Commercial).

At London, the delegation was assisted by DG, ISM and his staff.

A Fertiliser Delegation consisting of Shri Secretary (Supply), Shri Financial Adviser and Shri Executive Director, MMTC visited New York and Washington for renegotiations of prices of fertilisers from 16th June to 27th June 1975. During discussions at New York, they were briefed and assisted by the Minister (Economics) and DG, ISM. At Washington, the delegation was assisted by DG, ISM and his staff.

A Fertiliser Delegation consisting of Shri Secretary (Supply) and Shri Financial Adviser, visited Kuwait on 5-7-1975 and 6-7-1975 for renegotiations of prices of fertilisers. The delegation was briefed and assisted by the Indian Ambassador at Kuwait and Shri Commercial Secretary."

2.35. In respect of negotiations held in India with foreign suppliers, the Committee desired to know whether information was obtained, prior to the negotiations and also on a regular basis, from the Missions abroad about the background of the suppliers, the prices, etc. The representative of the Department of Expenditure stated:

"We always collect that information about every supplier from our commercial attaches or other embassy staff in London as well as in Washington."

When asked whether such consultations were actually and purposefully taking place, the witness replied:

"On every occasion, as far as I am concerned, during the last year and a half, a tour report has been submitted after the delegation came back and in that report we generally mention the role that commercial counsellors and others play in the matter of negotiations."

2.36. Since this was apparently contradictory to what had been stated earlier by the representative of the Department of Supply that except in

Rome and Japan, the Embassy staff were not of any direct concrete assistance in the matter of making available commercial intelligence, the Committee desired to know the correct, factual position in this regard. The representative of the Department of Supply stated:

"I thought Mr. had already explained that he had been in touch with the foreign embassies for the last two years."

Clarifying the position, the witness added :

"I was talking of the year 1972-73 when I went abroad. Except for the mission in Japan, London, Washington and Rome, we have not got much assistance from the other embassies."

2.37. The Committee, therefore, asked whether this did not indicate that prior to 1973-74, the coordination between the Embassy officials and the purchase delegations was rather unsatisfactory. The representative of the Department of Expenditure replied:

"It depends also on the Supply Department as to how far they tried to assist actively the Commercial Counsellors etc. Where there are no Commercial Counsellors, the local embassy staff helped in the negotiations in collecting information and passing on that information to the supply Department. During the last two years, I have found that the Secretary, Supply Department, has been very particular in assisting in every country the local embassy people. Before he went abroad, he used to send several direct messages to get upto-date information and generally he used to get in touch with the embassies."

Asked whether this did not convey the impression that the Department of Supply had not consciously sought the cooperation of the Embassies till 1973-74, the witness replied:

"I would not be able to comment on it myself."

The representative of the Department of Supply stated in this context:

"On the 16th April 1973, Mr. who was the Additional Secretary in the Ministry of External Affairs had written to the Ambassadors and the High Commissions of Washington, London, China, Tokyo and Kuwait that monthly reports on market intelligence should be sent to the Department of Supply, the Department of Agriculture and the Ministry of Petroleum. This has already been followed up by the reminders from us as also from the External Affairs Ministry."

The Committee, therefore, desired to know whether coordination in this regard had been established only about two years earlier and that this letter itself was necessitated by the fact of there having been no coordination earlier between the Department of Supply and the officials of the Ministry of External Affairs. The witness stated:

“This letter itself refers to the earlier letter of 13th December, 1972, which evidently the External Affairs Ministry had sent to the various embassies. What I was trying to say was that although the embassies were asked to send us monthly reports, they did not send us regularly what we wanted. For example, from Paris, we have only one letter and that was on the 4th June 1975. We did not get anything earlier. But we have been getting regular letters from Tokyo, Kuwait and literature from Canada.”

2.38. The Ministry of Commerce furnished, at the Committee's instance, a note indicating the role played by the Commercial Counsellors and similar officials in the embassies abroad in assisting the delegations sent from India for the purchase of fertilisers which is reproduced below:

“Delegations for the purchase of fertilisers were sent by MMTC and the Department of Supply. MMTC's delegations were sent to East European countries while those from the Department of Supply were sent to other countries.

MMTC and Department of Supply have furnished the following information in respect of the assistance which they received from the Indian Missions in the countries which the Delegations visited.

M.M.T.C.

MMTC Delegations on their visits abroad invariably contacted the Ambassador and Commercial Attache of the Embassy to get the latest commercial information available with them. The Commercial representative was kept in picture during the negotiations.

In regard to the market intelligence/information about fertilisers the Embassies advised the MMTC on market situation, production problem, if any, and such other matters useful for the Corporation in concluding contracts and also planning deliveries. When commercial officers came to India preparatory to trade negotiations etc., with the East European countries MMTC consulted them on various matters including fertiliser position.

DEPARTMENT OF SUPPLY

This Department required assistance from the Missions abroad to collect and furnish periodical reports on fertiliser transactions

taking place in their respective areas. The Missions were required to communicate all important activities in this field as soon as anything came to their knowledge. This information was required to keep us constantly informed of the trend of the prices and availability of various types of fertilisers etc. and to keep us posted with the details of prices at which transactions of fertilisers were concluded throughout the world at a particular period.

With the above object in view we request the Ministry of External Affairs vide our letter dated 18-4-1967 to issue suitable instructions to all the Indian Embassies/High Commissions abroad to furnish monthly reports to this Department. In response to such instructions, this Department started getting reports from a few Embassies/High Commissions etc., w.e.f. June 1967. The reports were, however, not received regularly and as such standardised proforma was devised and was forwarded to the Ministry of External Affairs on 10-8-1967 for circulation to Missions and posts abroad instructing them to furnish monthly reports in the prescribed proforma. The Missions/posts etc., were also requested to furnish all extracts/cuttings of important news items appearing in the newspapers in the countries concerned.

The requisite information was, however, received from few Missions only and that too not regularly. Fresh instructions were again issued on 16-4-1973 by the Ministry of External Affairs to the heads of Missions in Washington, London, Paris, Tokyo, Ottawa and Kuwait to furnish every month a report on commercial intelligence pertaining to the availability and procurement of fertilisers by maintaining close liaison with the concerned Government Department/Organisation engaged in such activities.

We have been receiving reports from above Missions/posts abroad since 1973. From France, however, only one report was received in June 1973."

2.39. At the instance of the Committee, the Department of Supply furnished copies of the correspondence exchanged between the Department of Supply, the Ministry of External Affairs and the Missions as well as the copy of the letter dated 4 June 1975 received from Paris, referred to during evidence. The following statement indicates the details of market intelligence reports received (position as on 5 August 1974) in pursuance of the letter dated 16 April 1973 from the Additional Secretary, Ministry of External

Affairs to the Head of Missions at Washington, London, Paris, Tokyo, Ottawa and Kuwait:

Missions	Report received for the month of
1. Washington	May 1973 July 1973 October 1973 June 1974
2. Tokyo	October 1973 February 1974 March/April 1974 May 1974 June 1974
3. Kuwait	April 1973 September 1973 October-November 1973 December 1973 January-February 1974 March-April 1974

According to the Department of Supply, no report had been received during this period from London, Paris and Ottawa.

2.40. When the Committee pointed out in this connection that a general impression was that Indian embassies abroad, with the exception of one or two large embassies, were not equipped adequately to gather market intelligence on a commodity like fertilisers and as such the information supplied was often not useful, the representative of the Ministry of Commerce replied:

“We are trying to strengthen our Missions. We have a proposal now in hand; wherever there is shortage of staff, we are trying to convince the Ministry of Finance for more posts. I will give you the information as to what was the situation prevailing at that time.”

He added:

“I am not aware where our people actually failed. But, we are now having our people who can give the required information if they are approached in right time.”

2.41. The Committee asked in this context whether it was a fact that a job of a Commercial Counsellor was considered to be rather low in the hierarchy as a result of which few of the officials in the Indian Foreign Service preferred to take up the assignment. The witness replied:

“It is not true. IFS officers are actually eager to go in for such jobs.”

He added:

“Actually we are associated with appointments to such posts and we are aware that we have plenty of people who are equipped also for doing this job and they are available.”

2.42. A note furnished subsequently by the Ministry of Commerce indicating the steps taken to strengthen Indian Missions abroad by posting separate Commercial Counsellors as far as possible, is reproduced below:

“There are 177 Indian Missions in the world (as on 1st April 1975) and we have separate Commercial set-ups at 53 places.

As on 1st June 1972, we had Commercial set-ups at 54 places. In 1973 we added one Commercial set-up thereby raising the number of Commercial set-up to 55. In 1974, three Commercial set-ups were wound up leaving the number of Commercial set-ups at 52. In June 1975 the number of Commercial set-ups wound up was one and newly created were two, making a total of 53.

The guiding principle for setting up Commercial Wings in Indian Missions abroad is either the large volume of trade exchanges with that country or our export potential in that country. Based on this criteria the Ministry of Commerce has under consideration creating new Commercial set-ups at 8 places, augmenting the strength in the existing set-ups at 5 places and raising the status of the existing Commercial Officers at 2 stations. As no new posts can be created nor existing posts upgraded without the approval of the Cabinet, the proposals in this respect are presently under consideration of the relevant Ministries before being submitted to the Cabinet.”

2.43. The Ministry of Commerce also furnished to the Committee a note prepared, in consultation with the Ministry of External Affairs, explaining the basis on which Commercial representatives were selected and trained, which is reproduced in Appendix VI.

2.44. Since the methodology to be adopted for the purchase of fertilisers necessarily depends on a judgement of the market situation at a given point of time, it is absolutely imperative that the purchase agency is armed with all relevant data relating to international production trends, availability of fertilisers, behaviour of world prices, recent happenings on the world fertiliser front, etc. so as to be in a position to regulate imports in the best interests of the country. The Committee have been informed in this connection that apart from the information gathered from international journals and publications devoted to the fertiliser trade as well as from circulars received from certain international suppliers, the Department of Supply also

obtained monthly reports from the Supply Missions in London and Washington and consulted the embassies in Tokyo and Washington and the High Commission in London as to the appropriate time for making purchases. It has also been stated that reports were obtained from time to time from the embassies in Kuwait, Ottawa, etc. Relevant economic information relating to market trends, prices, etc. is also understood to have been made available by the Commercial Counsellors posted at various Indian missions abroad. It, however, appears on the evidence that these are only recent developments and that prior to 1973-74, the arrangements in this regard left much to be desired and the coordination between the embassy officials and the purchase organisation/delegations was rather unsatisfactory. As has been admitted by a representative of the Department of Supply, apart from making arrangements for the stay of the delegations, the officials of Indian Missions abroad, with the exception of Rome and Tokyo, were not of any direct concrete assistance earlier in the matter of making available commercial intelligence on a regular basis. The Chairman of the Minerals and Metals Trading Corporation also conceded that when shortages began to develop in 1972 in the international market pushing up world prices, the consequences of fertiliser availability and prices were still to be understood in India. A representative of the Department of Expenditure (who had been associated with various purchase delegations) also informed the Committee that though during 1973-74 and 1974-75, delegations were sent abroad or suppliers asked to come to India for negotiations only when the Indian Ambassadors advised that it was the proper time for making purchases, "there may have been a few exceptions in the past."

2.45. That there was no effective channel of communication between the Department of Supply and the Indian Missions abroad for a regular and continuous exchange of information prior to 1973-74 is also evident from the fact that though instructions had been issued in 1967 to all the Indian Embassies/High Commissions abroad to furnish monthly reports, in a standardised proforma, in regard to availability of various types of fertilisers, trend of prices, etc. the requisite information had been received from a few Missions only and that too not regularly, necessitating the issue of fresh instructions on the subject by the Ministry of External Affairs in April 1973. Even thereafter, during the period from May 1973 to August 1974, while only four reports from Washington, five from Tokyo and six from Kuwait had been received, no reports had been received from London, Paris or Ottawa and it was only in June 1975 that one report had been furnished by the Indian Embassy in Paris. It also appears that during this period the Department of Supply had not actively sought the cooperation and assistance of the Missions abroad and their inaction in this regard between 1967 and 1973 in spite of the fact that the requisite reports were not being received regularly needs to be explained satisfactorily. It is also regrettable that the question of non-receipt of reports even after the issue of fresh instructions in May 1973 had been taken up with the Ministry of External Affairs only

after a lapse of nearly fifteen months, in August 1974. As this was a period when there were violent fluctuations in the international market for fertilisers on account of the general transformation of the international economy into a seller's market, adverse weather conditions, etc., the Committee feel that the timely collection of market intelligence would have ensured better planning and regulation of imports.

2.46. All this brings into sharp focus the need for improving the system of timely collection of market intelligence and for strengthening the Commercial Wings in Indian Missions abroad. The general impression that Indian Missions abroad, with the exception of one or two large ones, are not adequately equipped to gather necessary intelligence, on a scientific basis, on a commodity like fertilisers also needs to be dispelled. The Committee have been informed in this context that efforts were being made to strengthen the Commercial Wings at five stations, raise the status of the existing Commercial Officers at two stations and create new set-ups at eight places. While they would like to be apprised of the progress made in this regard so far, the Committee would like the officers serving in the Country's Missions abroad to be well-trained and well versed in the nuances of gathering information of commercial value and feeding it back in time to the various government agencies at home. Now that the Minerals and Metals Trading Corporation has been entrusted with the responsibility of procuring fertilisers both from the Rupee Payment Areas and General Currency Areas, the Committee expect that more effective use would be made of commercial information and market intelligence collected from various sources and the system therefor placed on a more scientific and firmer footing.

C. Fertiliser Purchase Delegation

2.47. The Audit paragraph points out that despite a decision having been taken in May 1971 that no delegation need be sent to Europe for purchase of fertilisers and again in February 1972 that a departure from the policy of holding negotiations in India for purchases from abroad would be allowed only if it was in the national interest, eleven delegations had gone to Japan, West Europe, United Kingdom, United States of America, Canada and Kuwait during April 1971 to September 1973. The Committee also learnt from Audit that the Department of Supply had stated (January 1975) as follows in this connection:

“The contracts have been placed as a result of negotiations in India or mostly by sending delegations abroad as this system has been found to be effective as it gives an opportunity to the Delegation not only to meet the suppliers but also the producers. It also affords an opportunity to talking directly to the senior members of both the suppliers and producing organisations. If, however, a foreign team was invited to India, it did not always send

their top member of the producers. It has been found that discussions with the producers are very effective although it is correct that where they operate through their sole agents they do not talk of prices directly but they certainly use their influence on the selling organisations for allocation of larger quantities and better prices. It is also possible for the Delegations to have a better feel of the market.....

* * * * *

The visits of the Delegations abroad are approved by the Screening Committee for all foreign deputations to whom justifications for sending the Delegations are furnished. This Department, therefore, strongly feels that the best method of making purchases of fertilisers is by sending Delegations abroad. This is specially so as every effort is made to make purchases directly from the producers at the best possible price without bringing in the supplying agents to the extent possible."

2.48. The Department of Supply and the Minerals and Metals Trading Corporation furnished, at the instance of the Committee, statements indicating (i) the composition of the delegations which went abroad for the purchase of fertilisers from March 1971 to 1974-75, (ii) the countries visited, (iii) period of visit and (iv) the total expenditure incurred on each delegation, which are reproduced in Appendix VII. The following position emerges from an analysis of the information received in this regard :

Period	No. of delegations sent abroad
<i>I. Department of Supply</i>	
Between March 1971 and January 1972	2
During 1972-73	7
During 1973-74	2
During 1974-75	4
<i>II. Minerals & Metals Trading Corporation</i>	
Between March 1971 and January 1972	Nil
During 1972-73	2
During 1973-74	2
During 1974-75	Nil

While all the four MMTC delegations consisted of the Director (Fertilisers) and the General Manager, the Department of Supply delegations had always been led by the Secretary, Department of Supply, who was accompanied by the Deputy Secretary, Department of Supply on 11 occasions, by one representative of the Finance Ministry on 11 occasions and by two representatives of the Finance Ministry on one occasion. All the seven fertiliser purchase delegations sent abroad during 1972-73 was led by Shri., Secretary, Department of Supply and the duration of these seven visits and the countries visited are indicated below:

I.	16 April to 3 May 1972	Europe, U.K.	18 days
II.	15 May to 24 May 1972	Japan	10 days
III.	27 July to 13 August 1972	Europe, U.K., Kuwait	18 days
IV.	4 September to 20 September 1972	Japan	17 days
V.	24 November to 8 December 1972	Europe, U.K., Kuwait	15 days
VI.	28 January to 8 February 1973	Japan	12 days
VII.	17 March to 26 March 1973	USA, U.K.	10 days

2.49. Since a deliberate government decision had apparently been taken in February 1971 and reiterated in May 1971 that no delegation need be sent abroad for the purchase of fertilisers, the Committee desired to know why delegations had been sent despite this clear decision. The representative of the Department of Supply stated in evidence:

“What is narrated in the portion of the paragraph is correct. There were a series of decisions—first, in February 1971, the decision was that ordinarily suppliers should be invited to come to India if negotiations were necessary; in May 1971, it was decided that no delegation need be sent to Europe. In February 1972, another decision was taken. All these decisions were taken at what are called ‘high levels’ by the Committee of Secretaries and so on. But, subsequently, there was a departure. The Department of Supply, as a part of the Fertilisers Purchase Committee, felt that negotiations were necessary for which a team should go abroad. Then the procedure laid down by the Finance Ministry and others for this purpose was followed that requests for permission for the delegation to go abroad were sent after getting the approval of the Minister. They were sent to the Screening Committee and so on which included the Finance as well as the Cabinet Secretary. It was done after obtaining such a clearance. In each individual case, clearance was obtained. That is all I can say.”

When asked whether the same authority which had taken the earlier decision in this regard had revised the decision subsequently, the witness replied:

“Well, Sir, it is the same authority.”

He added that these decisions were taken by the Cabinet Secretariat.

2.50. In reply to another question as to why it had been decided to send delegations abroad despite an earlier decision of the Cabinet Secretariat, the witness stated:

“For each of these delegations, an appropriate request was made by the Supply Department to what is called the ‘Screening Committee’ which consists of the Finance and Cabinet Secretaries.”

Explaining the sequence of events leading to the different decisions, the witness stated:

“Here is an extract from the Cabinet Secretariat’s letter. It has been indicated that the decision not to send a delegation to Western Europe was influenced by the conclusion reached by the Secretaries Committees on Internal Affairs at their meeting held on the 20th February 1971 to the effect that ordinarily suppliers should be invited to tender for supplies and come to India for negotiations when such negotiations were necessary..... There is an extract that there was a proposal from the Supply Department for sending a delegation and, on that, a decision was taken by the Finance Minister on the 19th May 1971 that the delegation need not be sent. This is what the Cabinet Secretary conveyed to the Supply Secretary at that time.”

2.51. Drawing attention to the statement furnished by the Department of Supply indicating the composition of the different delegations, according to which the then Secretary, Department of Supply had led as many as 9 delegations abroad between March 1971 and March 1973, the Committee desired to know the principles, if any, on which the composition of the delegations was decided and whether it was always obligatory for the Secretary of the Department to accompany every delegation. The Committee also asked whether it would not be better to send experts in fertilisers instead of always selecting an eminent representative of the bureaucracy for the purpose, which looked somewhat odd, particularly in view of the fact that the Secretary had been abroad on as many as seven occasions in a year. The representative of the Department of Supply replied:

“I would submit that I am totally disqualified to comment on the observation which you have made just now for one thing which may not be relevant here, that I have never been on these tours. The procedure is that the Department concerned which wants to

send a delegation has to get the approval of the Screening Committee of higher officials which includes the Finance Ministry too. And they always take into consideration various aspects and then they give their decision."

2.52. When asked in this context whether it was necessary to spend foreign exchange for such trips abroad on so many occasions especially during 1972-73 when fertiliser prices were rising, the Additional Secretary, Department of Agriculture replied:

"If I may give a preamble, I appear before you because the Secretary is absent. I have not dealt with the subject; but having read all the files and having had discussions with the concerned officers, I would say that as far as the delegations—and decision to send them—are concerned, it is the exclusive responsibility of the Department of Supply. They have gone through certain rules; DGS&D is their chief instrument."

The representative of the Department of Supply stated in this context:

"DGS&D does not come into the picture. The supply of fertilisers has been kept outside it. If I am unable to satisfy the Committee, I am sorry. But I really do not know what I should say, because as I had said, this screening of delegations to be sent abroad is made by higher authorities."

Clarifying the position in this regard, a representative of the Department of Economic Affairs stated:

"The Secretary, Department of Supply is supposed to have considerable expertise in this matter because, as the head of that Department, he is making purchases to the tune of Rs. 1,000 crores every year for various government departments and public sector undertakings, which include purchases of fertilisers and other goods. About the composition of the delegation it is, first of all, decided by the Fertiliser Purchases Committee and then the approvals of the Minister concerned and of the Committee of Secretaries are obtained. This is the procedure for deciding the composition of delegations."

2.53. The Committee asked whether the Chairman of the Minerals and Metals Trading Corporation, as a member of the Fertiliser Purchase Committee, could enlighten the Committee on this point. The witness replied:

"In that committee we settle that it would be desirable for a delegation to go. We never specify that the Secretary should go or

that he should be accompanied by Mr. or it should be a three-member delegation or any such thing. We would have merely said that it would be in the fitness of things to send a delegation because the negotiations cannot obviously take place in India."

2.54. Since it had been stated earlier that the Secretary of the Department of Supply was considered to be an expert in purchases, the Committee desired to know whether the official who had succeeded the former incumbent as Secretary (Supply) in 1973-74 and had undertaken similar tours abroad for the purchase of fertilisers could be considered to have developed the necessary expertise almost immediately after assuming charge of the post. The representative of the Department of Expenditure stated:

"Before becoming Secretary of the Department of Supply, Mr. was for four years the Director General of India Supply Mission, Washington."

2.55. The Committee enquired into the reasons for the Deputy Secretary of the Department accompanying the Secretary on the visits abroad and the role played by him in the negotiations. The representative of the Department of Supply replied:

"In the negotiations with the various countries, somebody has to be present there all the time when the Supply Secretary is negotiating, by pointing out as to what are the price available with the other countries; and what are the world trends. It is not possible for one man alone to take that information and to remember each and every fact and keep it right in front of him. And it is also necessary to have consultations amongst one another as to how best we have to negotiate from time to time. That is why the Supply Secretary, myself and the Financial Adviser, 3 of us, have been travelling, after obtaining the approval, as explained earlier, first from the Fertiliser Purchases Committee and then from the Screening Committee of Secretaries."

He added :

"I have dealt with the purchase of fertilisers from 1966 and even prior to 1966. From 1973 fertiliser was my main subject. I am not doing any other work except purchase of fertilisers. So, for the purchase of fertilisers I am supposed to be conversant with all the market trends etc. and that is why perhaps I was included in this delegation."

When asked why it had not been considered necessary to include the Deputy Secretary in the delegations during 1974-75, the witness replied:

“It was for the Secretary, Supplies, to decide whether the Deputy Secretary should go with him or not. Whenever the Secretary, Supplies, wanted my services, I accompanied him.”

To another question whether there was anyone else who had specialised in the purchase of fertilisers from abroad, the witness replied:

“Secretary, Supplies is himself well-versed in this and there was also the Financial Adviser.”

He added:

“In the Ministry fertiliser purchase has been dealt with by the Secretary, Supplies and myself.”

2.56. The Committee desired to be furnished with a note indicating the procedure followed in deciding the composition of fertiliser purchase delegations, the principles and criteria on the basis of which such delegations were selected and the reasons for sending only certain officials every time. The representative of the Department of Supply stated in evidence:

“The note will be prepared and sent in a few days. But, I am afraid, the decisions regarding the composition of the delegation and so on would not contain such detailed reasons which perhaps the Committee now wants. All that happens is that all persons who are directly dealing with the matter, or the Fertiliser Purchase Committee, decide so and so should go and then the approval of the Screening Committee is taken. This is what we find from the paper. So, I am rather apprehensive whether any further information can be gleaned from the papers, because our speculation would not be of much use to the Committee”.

2.57. A note subsequently furnished in this regard by the Department of Supply is reproduced below:

“The purchase of fertilisers used to be handled directly by the Department of Supply (without the intervention of the DGS&D) and it was personally supervised by the Secretary of the Department. The Secretary of the Department, in the natural course used to draw up proposals for delegations which went abroad for the purchase of fertilisers. Proposals made by the Secretary, Department of Supply were duly got approved by the Minister (Supply) and were also referred to the Screening Committee of Secretaries, consisting of Secretary (Expenditure).

Finance Secretary and the Cabinet Secretary. No criteria are available on record for the selection of the personnel of these delegations, but obviously these who knew the work went."

At the instance of the Committee, the Ministry of Commerce also furnished a note on the subject, indicating the procedure followed and the criteria adopted by the Minerals and Metals Trading Corporation in determining the composition of various delegations sent abroad for the purchase of fertilisers and other commodities and products which is reproduced below:

"In view of the economy measures, usually a delegation going abroad for purchasing fertilisers and other commodities has been a one man delegation in the past. The delegation obtain necessary briefing from the Purchase/Sale Advisory Committee of the Corporation as well as the Chairman, MMTC prior to undertaking the tour abroad. The delegation has to work within the brief given and seeks instructions from the Head Office in case departures from the brief are necessary."

2.58. From the statement containing the details of various delegations, the Committee found that no Finance representative had been included in the delegations sent abroad by the Department of Supply during the period March 1971 to January 1972 and enquired into the reasons therefor. In a note, the Department of Supply replied:

"The files do not indicate the reason for the non-inclusion of the Financial Adviser who is normally associated in such delegations. The files show that no comment on non-inclusion of representative of Finance was made by the Expenditure Division of the Ministry of Finance."

2.59. The Committee also found that two representatives of the Ministry of Finance had been included in the delegation to Japan from 28 January to 8 February 1973 and desired to know the reasons therefor. The representative of the Department of Economic Affairs stated in evidence:

"On this specific case we will check up and give you a note. Except in this case, in all other cases, there is only one representative of the Ministry of Finance."

He added:

"These are big purchases involving large sums of money. Perhaps, it might have been considered that it is better to have the experience of two persons rather than one."

When asked in this context whether it was necessary to have two such representatives from Finance, the witness replied:

“From Finance it is very unusual; generally, there is only one representative. We will find out the reason in this case.”

In a note subsequently furnished in this regard, the Department of Supply informed the Committee as follows:

“For the delegation to Japan of 28th January 1973 to 8th February 1973, two representatives of the Ministry of Finance were included, viz. Financial Adviser (Expenditure) attached to Ministry of Supply, and Joint Secretary, Department of Economic Affairs. The only reason recorded in the file is a note saying that amendment may be made in the composition of deputation to include Shri. . . . Joint Secretary, Department of Economic Affairs, as per direction of Secretary (Supply). Department of Economic Affairs have intimated, on a reference made in the present context, that he was probably included on the ground that he was dealing with release of foreign exchange for fertilisers.”

2.60. According to a decision taken by the Committee of Secretaries on Internal Affairs in February 1971 and reiterated by the Finance Minister in May 1971 no delegation was to be sent abroad for the purchase of fertilisers and ordinarily suppliers were to be invited to come to India if negotiations were considered necessary. It had been further clarified in February 1972 that a departure from the policy of holding negotiations in India for purchases from abroad would be allowed only if it was in the national interest. The Committee are, however, concerned to find that the policy has been honoured more in the breach than in observance and that during the period from 1971-72 to 1974-75, as many as 15 purchase delegations of the Department of Supply and 4 delegations of the Minerals and Metals Trading Corporation had visited various countries of the world and an expenditure of nearly Rs. 6 lakhs had been incurred on these accounts. The Committee have been informed in this connection that clearance for a departure from the approved policy was obtained in each individual case from a screening committee, which included the Cabinet and Finance Secretaries, and that the system of sending delegations abroad had been found to be more effective for the following reasons:

- (i) This gives an opportunity to the delegation not only to meet the suppliers but also the producers, without bringing in, to the extent possible, the agents.

- (ii) Foreign teams invited to India did not always consist of the senior representatives of the suppliers and producers and therefore, by sending Indian delegations abroad it was possible to deal directly with the senior representatives.
- (iii) By going abroad it is also possible for the delegations to have a feel of the market.

2.61. Whatever may be the merits of these arguments, it is a moot point whether trips abroad by such delegations on so many occasions and at considerable expense were absolutely necessary and unavoidable, particularly in 1972-73 when as many as 7 delegations of the Department of Supply were sent to various parts of the world for negotiating purchases, and whether the same results could not have been achieved by inviting the suppliers/producers to India. While market conditions could have been assessed on the basis of regular and continuous market intelligence reports, India being one of the largest purchasers of fertilisers in the world it should have been possible to insist upon the suppliers/producers to send their senior representatives for negotiations in India. Besides, it would also be seen from a specific instance of purchase of ammonium sulphate which has been discussed later in this Report, that on account of the Secretary of the Department of Supply being away from the country on one such visit, negotiations with the suppliers from another country invited to India had to be postponed at a time when world fertiliser prices were rising, resulting in purchases at higher prices subsequently to the detriment of national interest. In these circumstances, the Committee have their reservations about the real utility of such visits abroad. They would, therefore, urge Government to review carefully the need for these frequent visits and approve them only after a thorough examination of their justification, which should be invariably recorded, and only on occasions when it is considered absolutely inescapable in the country's wider interest.

2.62. What, however, causes greater concern to the Committee is the absence of any clearly defined criteria for determining the composition of fertiliser purchase delegations and the lack of uniformity in this regard. While the Committee have been informed by the Commerce Ministry that, on grounds of economy, the Minerals and Metals Trading Corporation had been sending usually only one-man delegations in the past for purchasing fertilisers and other commodities, they find that the Department of Supply have been adopting different norms at different times in regard to their delegations. Thus, while the delegation comprised of only the Secretary of the Department on one occasion (November 1971 to Japan), the Secretary had been accompanied by the Deputy Secretary dealing with

fertilisers on two occasions (July 1971 and July-August 1972), by the Deputy Secretary and one representative of the Finance Ministry on seven occasions (April-May 1972, May, 1972, September, 1972, November-December, 1972, March 1973, August-September 1973 and September 1973), by the Deputy Secretary and two representatives of the Finance Ministry on four occasions (April 1974, May 1974, June-July 1974 and November-December 1974). Apart from informing the Committee that the composition of various delegations was duly got approved by the Fertiliser Purchases Committee, Minister of Supply and the Screening Committee of Secretaries, the Department of Supply have not been in a position to explain the criteria on the basis of which the selection of personnel for the delegations was made. The reasons for the non-inclusion of a Finance representative in the delegations sent abroad between March 1971 and January 1972 and for the inclusion of two representatives of that Ministry in the delegation sent to Japan in January-February 1973 have also not been satisfactorily explained. As regards the inclusion of the Deputy Secretary in some of the delegations, the Committee have been informed that as it was not possible for the Secretary to carry all relevant information with him and also in view of the necessity to have consultations as to how best the negotiations could be conducted, he had been included to render assistance in this regard. If this were indeed so, it is not very clear why the official, who is supposed to be "conversant" with market trends, prices, etc., had been excluded from the delegation to Japan in November 1971, which comprised of only the Secretary of the Department and also from the delegations that were sent abroad during 1974-75.

2.63. The Committee have also been informed by the Chairman of the Minerals and Metals Trading Corporation (who was also a member of the Fertiliser Purchases Committee) that the Fertiliser Purchases Committee only took a decision on the short point whether it was desirable for a purchase delegation to be sent abroad when negotiations could not take place in India and did not specify what should be the size and composition of the delegation. It would, therefore, appear, prima facie that this question had been decided often in an ad hoc or routine manner. The Committee recommend that well-defined and clear-cut criteria and principles should be prescribed in this regard and the size and composition of purchase delegations determined after a most careful consideration and scrutiny and expenditure thereon kept to the barest minimum. The delegations should also comprise only of persons possessing the requisite expertise and specialised knowledge of the commodity that is to be purchased.

D. SPECIFIC CASES

2.64. The Committee will now proceed to examine some of the individual cases of purchase of fertilisers noticed in test audit and highligh-

ted in the Audit paragraph, each of which deals with an important aspect of purchase.

- (a) *Purchases at higher prices in the domestic season of the foreign country.*

Audit paragraph.

2.65. Against a tender for 0.60 lakh tonnes of diammonium phosphate floated in February 1971, including 0.20 lakh tonnes for supply to a public sector undertaking, the rates (f.o.b.) accepted were between Canadian \$ 58.98 and \$ 64.48, the rate for delivery in April, 1971 was the highest (Canadian \$ 64.48) as that fell in the domestic season for fertilisers in the foreign country from which the fertiliser was to be imported. The Fertiliser Purchase Committee observed that the indent should have been placed by the public sector undertaking well in advance so as to avoid purchase in the domestic season of the foreign country. Out of 10,000 tonnes to be shipped in April 1971, 8,845 tonnes were shipped in that month and the rest was shipped in May 1971.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), P. 102, case (i)]

2.66. The Committee learnt from Audit that the Department of Supply had stated (January 1975) as follows in this regard:

“A tender for the supply of 60,000 tonnes plus 25 per cent of DAP was issued in February 1971 under Canadian Aid. The offers received ranged from C \$ 58.98 to C \$ 71.10. Contracts were placed at quotations ranging from C \$ 58.98 to C \$ 64.48.

It is correct that the Fertiliser Purchase Committee in their meeting on 6th March 1971 observed that the Department of Agriculture should place their indents well in advance to avoid purchases in the domestic season of the foreign country.”

2.67. The Committee asked whether it was a sound strategy to make purchases at higher prices in the domestic season of the foreign country. The representative of the Department of Supply replied in evidence:

“Let me explain it. If the demand was given in December, the delivery was required at so many thousand tonnes per month starting from February. So, a part of the delivery period ..

falls within the domestic season of that foreign country. This is an inescapable situation, unless of course the demand is placed very much in advance to enable us to buy and stockpile it here. If the demand comes 3 or 4 months earlier with a spread-out delivery period, there is no escape from the situation that a part of the delivery period falls within the domestic season of that country."

The committee, therefore, desired to know the difficulties in any, in placing the demand earlier. The witness stated:

"The Supply Department is concerned with purchases only. The demands come from other departments. The Secretary of the Supply Department presides over the Fertiliser Purchase Committee."

When asked in this context whether this implied that things were done mechanically without any genuine coordination between the relevant Ministries and that the Supply Department did not assist various Government departments in procuring commodities from abroad at the best possible time and prices the witness replied:

"Respectfully, I would not put it that way. What I meant was, the supply department has been acting only as a purchase organisation. It could not prod the indenting departments and say, 'You give us your requirements'. Perhaps they should have given us, but they did not do it."

The Additional Secretary, Department of Agriculture stated in this context:

"In respect of this particular item, our demand was with the supply department by 17th December 1970. I do not know what difficulties they had—genuine or otherwise—in acting in time."

2.68. The Committee enquired into the basic methodology followed by the Department of Supply so as to ensure purchases at the most advantageous time. The representative of the Department of Supply replied:

"The basic methodology is, when the indent comes, the Supply Department tries to arrange for the purchase in the best method possible. As I explained, if the delivery period falls in a certain month which is within the domestic season of a foreign country, it is an inescapable situation. In this particular case the delivery period was April for 20,000 tonnes. It is true the indent came to us in December."

When asked whether the Supply Department had ever pointed out to the indentor that the demands should have been placed in advance so that purchases could be made at the proper time, the witness replied:

“Initially, the Agriculture Department was not prodded to give the indent. After the indent came in December, from January onwards quotations were called and then the contract was finalised.”

The Additional Secretary of the Department of Agriculture, however, stated in this context:

“We always give advance requirement so that they can buy in the off-season of those countries. If we had given it by December, they could have contracted earlier and arranged the purchases much earlier.”

Another representative of the Department of Supply added:

“We have always seen that the requirements of the Department of Supply should be placed as early as possible and it is also our effort to make purchases which do not clash with the domestic season. But these are not always avoidable. If we require the fertiliser during their domestic season, we have to comply with our requirements. We recently made purchases in USA when there was domestic season.”

2.69. In view of the fact that purchases of fertilisers from abroad had to be resorted to almost continuously, the Committee asked whether the market intelligence obtained by the Department of Supply from Indian Missions abroad was not passed on the Department of Agriculture to enable that Department to place its demands at the proper time depending on market trends. The witness replied:

“Copies of market intelligence also go to the Department of Agriculture.”

2.70. When the Committee pointed out that it, therefore, appeared that the Department of Agriculture had not made adequate use of the market intelligence reports, the Additional Secretary of the Department replied:

“In this particular case, by December, the indent was available. Maybe, there were some procedural difficulties which they must point out.”

2.71. Explaining the circumstances in which a higher price had to be paid in this specific case of purchase of di-ammonium phoshate, the representative of the Department of Supply stated in evidence:

“The high price in this particular period of April had to be paid because a part of the quantity was required in April and so, there was no escape from it.”

The Chairman of the Minerals and Metals Trading Corporation, however, stated in this context:

“Actually, there is no harm in getting shipments during the domestic season but you have to procure it earlier.”

Clarifying the position, he further stated:

“I am a member of the Fertiliser Purchase Committee and from 1st August the entire work of Supply Department has been transferred to MMTC.

So far as rupee payment countries are concerned, we plan purchase during our bilateral negotiations with those countries and we are assured of certain supplies every calendar year. Urea, CAN, Amm. Sulphate and MOP, these are the four types that we get from socialist countries. As to whether shipment during the domestic season should necessarily push up prices, that is not quite correct because if you procure fertiliser in October and ship it out in April, you will still get it at price.”

The witness added:

“Time of procurement is important but time of shipment is not important.”

2.72. Since this statement appeared to contradict what had been stated earlier by the representative of the Department of Supply, the Committee desired to know the correct, factual position in this regard. The representative of the Department of Supply stated:

“It does not necessarily contradict. What Mr. . . . said was that if we had been able to go into the market in the slack season, for example in October in the USA, it would have been all right. As it happened, the indent came to us in the middle of December.”

In further clarification, the witness stated:

“The main point which is that although indents may have been placed during a certain period, maybe in the month of December or so, but a great deal depends on the delivery date. From our record, in fact, what Audit has picked up is really the observation of the Fertiliser Purchase Committee itself that the price was high because the purchases had to be made in April which really meant that purchases had to be made for delivery in April. Now, I read out the quotations which we had received against this tender. They read as follows:

‘For delivery in June, the CIF price in US Dollars was 75.37 and 76.69 from one source and from another 76.87. Then for July, it was 73.39 whereas the CIF price for delivery in April was 81.84’.

There was no other quotation for delivery in April. That is what our record indicates.”

He stated further:

“What I meant to say was that the observation made in the Audit Report is something which the Fertiliser Purchases Committee, consisting of members of various Departments, had themselves felt at that time and, therefore, it is not something which we can deny—because it is on record, it is in the file, it is in the proceedings of the Committee. And what I find from the records or contract or tender or the quotations that were received is that, as I had read out just now, the price for delivery in April was \$ 81.84 c.i.f. whereas for delivery in subsequent months the price was considerably lower. Therefore, what I meant to say was that as the indent had been received in December, even supposing we had finalised the contract in January, it might not have made much difference. We actually entered into the contract a little later. The tender notice was issued in February and the offers were considered by the Fertiliser Purchase Committee on 6th March 1971 and then the orders were placed. Therefore, between the first intimation about the requirement of the Agriculture Ministry and the finalisation of the decision regarding this purchase, there was a gap of about three months which was taken up in this way that initially the Agriculture Department wrote to the Department of Economic

to the Supply Department; then all the formalities regarding the financial part of it were cleared; then the Supply Department took steps for the actual calling of quotations. That was done probably in February and the tender enquiry was actually issued on 15th February 1971; offers were received on 2nd March 1971 and they were decided by the FPC on 6th March 1971 and the prices cited for delivery in April were the highest.

Mr. . . . had mentioned October. I do not know what is the proper season, but he said that October was perhaps the slack season. And we could not offer to buy in October, obviously because there was no demand in October. It came to us in December. Then there was some time taken and the tenders were decided in March."

2.73. The Committee, therefore, asked whether this did not indicate that there was an avoidable mistake in not placing the indents well in advance so as to secure an advantage of prices. The witness replied:

"I am not denying that."

2.74. Since this appeared to imply that the delivery period was also a vital point in determining the prices, the Committee again drew attention to the evidence of the Chairman, Minerals and Metals Trading Corporation and desired to know the reaction of the witness, who replied:

"I have looked into all the papers and the information available, but the opinion of Mr. . . . is something which I cannot explain; because, from the contract, I have found, as I have said, that the delivery being asked for in April had resulted in a higher price being demanded."

The Chairman, Minerals and Metals Trading Corporation intervened and stated:

"This is rather an exercise in semantics because the Fertiliser Purchases Committee only said that the public sector undertaking should place the indent well in advance so as to avoid purchases in the domestic season of the foreign countries. So, we were to avoid purchases in the domestic season or, in other words, the Spring season, and so we place it in December. The time of shipment does not play a big role. So, even the opinion of the FPC is the same as what I had stated."

2.75. The Committee asked whether it was not the responsibility of the Supply Department to advise other Ministries to act expeditiously in

the matter of appearing in the market at the most opportune time. The representative of the Department of Supply replied:

“The sequence of events is like this. On 17th December 1970 the Agriculture Ministry wrote to the Economic Affairs Ministry about the requirement of 60,000 tonnes and then the Economic Affairs people responded. Again, in the middle of December 1970 they added the requirements of a private company too, of 75,000 metric tons. Then, the Ministry of Agriculture asked the Ministry of Economic Affairs to allot funds and, as I have said, a copy of that was sent to the Supply Department. A meeting of the Fertiliser Purchases Committee was held on the 4th January 1971, when the Agriculture Department’s representatives said that their requirements were 120,000 tons—about 40,000 tons were required for Trombay and 80,000 tons for other States. A representative of the Economic Affairs Department stated that half of this quantity should be purchased from USA and half from Canada and therefore the Fertiliser Purchases Committee took a decision that tenders should be issued simultaneously both in USA and in Canada for the same quantities and delivery periods. Then, on 8th January 1971—that is, about four days after the FPC’s decision and about three weeks after the first intimation had come from the Agriculture Department, the Supply Department wrote to the Indian Supply Mission to consult both the USAID and Canadian AID Administrations about the date of issue of tender, and the Indian Supply Mission confirmed on the same day that delivery from Canada also was possible. On 11th January 1971 the ISM was told that the tender was proposed to be issued on 14th January with the opening date as 4th February 1971. But on the 2nd February 1971, after a further meeting of the Fertiliser Purchase Committee, the Supply Mission was asked to consult the Canadian Aid Administration and indicate finally the date of issue of tenders. The Supply Department particularly asked the Supply Mission to ensure that the time allowed for tendering should be kept within 15 days. Then, ultimately, on the 15th February, the enquiry was issued with opening date fixed for the 2nd March 1971. This is the sequence of all the formalities done.”

The Additional Secretary, Department of Agriculture stated in this context:

“I would like to just mention one thing here. The impression given is that had the Department of Agriculture come with

their requirements earlier and the Economic Affairs Department had given the funds earlier, more expeditious action would have been taken. I want to correct the information. Realising this, we told the Supply Department on the 17th December that procurement action should be initiated in anticipation so that we could take advantage of the slack season price. But we cannot avoid getting shipments during the domestic season. There are shipping difficulties, handling difficulties at the ports. We have to get requirements throughout the year. It is not possible to avoid any particular month for shipment."

2.76. The Committee desired to know when the Trombay Unit of the Fertiliser Corporation of India had intimated their requirements of di-ammonium phoshate to the Department of Agriculture. In a note furnished to the Committee, the Department stated.

"The communication in which the Fertiliser Corporation of India intimated their requirements of di-ammonium phosphate for Trombay plant is not forthcoming. It, however, appears from the note of the then Joint Secretary recorded on 9th November 1970 that at that time this Department was aware of the requirement by the Fertiliser Corporation of India, Trombay of 20,000 M/Ts DAP for kharif 1971 and of 20,000 M/Ts for rabi 1971-72."

2.77. The Committee desired to know when the Department of Supply had become aware of the high prices quoted for delivery during April 1971 and whether the Department had taken up the question of postponing the delivery with the indentor. The representative of the Department of Supply stated:

"As I mentioned earlier, these quotations were considered by the Fertiliser Purchase Committee itself on which the Departments of Agriculture, Finance and Supply were represented. The Committee as a whole took the decision to accept the price for April."

He added:

"The offers were received on 2nd March 1971. Four days later, the Fertiliser Purchase Committee considered the offers and the Committee, as a whole, took the decision."

2.78. At the Committee's instance, the Department of Supply furnished the relevant extract from the minutes of the meeting of the Fertiliser Purchase Committee held on 6 March 1971 relating to this purchase, which is reproduced below:

"Tenders had been invited for the purchase of 60,000 MT+25% of DAP for the period April to July 1971 and for NPK of various grades for a quantity of 70,000+25% MT required between April to July 1971. The purchase was to be financed out of the Canadian AID. The tenders were given wide publicity in India by the Ministry and in Canada by the ISM, Washington.

The tenders received were considered by the Fertiliser Purchase Committee and it was decided to accept the offers keeping in view the urgency of the requirements of the Department of Agriculture.

Di-Ammonium Phosphate	Delivery period indicated in the tender
	April 10,000 MT
	May 10,000 MT
	June 30,000 MT
	July 10,000 MT
	TOTAL 60,000 MT +25% = 75,000 MT

The representative of the Department of Agriculture stated that though his requirements for the months of April and May were very urgent, in view of the high prices for the earlier deliveries he would be satisfied with the purchase of only 10,000 MT. The Committee, therefore, decided to accept the following offers:

Name of the firm	Qty. MT	FOB price in US	C&F price in US\$	Month of delivery
1. MDPC/ESSO	10,000 + 25%	58.39	73.39	July
2. MDPC/ESSO	10,000 + 25%	60.37	75.37	June
3. MDPC/ESSO	10,000 + 25%	61.69	76.69	June
4. Shaw Wallace/Sherritt	20,000 + 10%	61.87	76.87	June—11,000 July—11,000
5. Albright/Belledune	10,000	63.84	81.84	April—10,000

Keeping in view the prices received, it was possible to purchase only a quantity of 69,500 MTs although under the terms of the tender a quantity of 75,000 MTs could have been purchased or subsequent to the issue of tender the Department of Agriculture had asked for the purchase of a further quantity of 30,000 MTs from Canada. The last purchase was made in August 1969 when the range of prices was Canadian \$ 59.16 to Canadian \$ 59.70 to FOB. The price was proposed to be accepted under the present tender ranged from C\$ 58.98 to C\$ 64.48. The price of C\$ 64.48 for delivery during the month of April was evidently higher because of clash of our requirements with the domestic season in Canada. On this point the Committee drew the attention of the representative of Department of Agriculture to the fact that efforts should be made for procurement to be made well in advance so that it did not clash with the domestic season. This was especially necessary in regard to the requirements of the public sector projects, where it was possible to anticipate in advance the requirements of the Project. In this connection the Committee had been informed earlier that at times it was not possible for the Department of Agriculture to forecast the requirements as the State Governments keep on changing their requirements from time to time. In this case, however, as the requirements were in respect of a public sector project viz. the Trombay Project, the Committee felt that the indents should have been placed well in advance to avoid purchase in the domestic season. The representative of the Department of Agriculture stated that every effort was made to avoid purchase in the domestic season. However, this was not possible at all times.

The Committee also examined and decided that it would not be advantageous to scrap the present tender and to go out for a fresh tender as it was not possible for the Department of Agriculture to defer the deliveries beyond the period asked for and reinviting tenders was not likely to yield better results."

2.79. The Committee desired to know whether the extra price paid by Government in this particular case by not placing the indent earlier could be quantified. The Chairman, Minerals and Metals Trading Corporation stated in evidence:

"I would say that it would be rather difficult to quantify it, except that the lowest price in the quotation was 58.98 for delivery in subsequent months. So we can only conjecture that if the order had been placed three months earlier we might have got the lowest price quoted against the tender."

The Department of Supply furnished, at the Committee's instance, a comparative statement of the prices obtained, during the period from 1969-70 to 1974-75, for supply of different varieties of fertilisers, from which the Committee found that in respect of another contract concluded in April 1971 for the supply of 90,000 MT of Di-Ammonium Phosphate (against USAID) during the June—August 1971, the f.o.b. prices ranged between US Dollars 53.49 and US Dollars 54.32.

2.80. When asked whether there was any particularly impressive reason for not placing the indents earlier in this case, the representative of the Department of Supply replied:

“The knowledge of the requirement first came to the Supply Department in December. Then, correspondence was going on between the Agriculture Department and the Economic Affairs Department about the provision of funds for this purpose. After that, some time was taken up, may be two months, which cannot be judged to be too long a period.”

A note subsequently furnished in this regard by the Department of Supply, indicating the reasons for the delay of about two months in floating the tenders in this case, is reproduced in Appendix VIII.

2.81. The Audit paragraph also points out that out of the quantity of 10,000 tonnes to be shipped in April 1971, only 8,845 tonnes were shipped in that month and the balance quantity in May 1971. The Committee, therefore, desired to know whether any price reduction was obtained in respect of the quantity delivered in May 1971 since the price of Canadian Dollars 64.48 had been quoted in respect of April deliveries. In a note, the Department of Supply stated:

“8,845 MT of material was shipped on 23.4.1971 by vessel ‘Black Knight’ and balance quantity of 1,148 MT was shipped by vessel ‘Vishva Pratap’ on 1.5.1971. This ship reported for loading on 29-4-1971 but sailed on 1-5-1971.

There was thus a delay of only one day in respect of 1,148 MT of the material.”

2.82. As pointed out earlier in this Report great care should be taken in planning for the import of a commodity like fertilisers, which is acutely sensitive to world demand, supply and price trends. In this context, the timely and most economical procurement by availing of the best market conditions assumes importance. The Committee, however, regret to observe that in this particular case, failure to anticipate the requirements of the seeding programme of a public sector undertaking and place the indent well in advance had resulted in avoidable purchases at considerably

higher prices in the domestic season of the foreign country. Though it has been contended by the Department of Supply that in this particular case the payment of higher prices was inescapable as part of the quantity was required in April 1971, which happened to be the domestic season of the foreign country, the Committee have been informed by the Chairman of the Minerals and Metals Trading Corporation that there was no harm in getting shipments during the domestic season if the contract had been concluded earlier and that while the time of procurement was important, the time of actual shipment was not very material. It has also been conceded by the representative of the Department of Supply that there was an avoidable mistake in not placing the indents well in advance so as to secure an advantage in prices.

2.83. In this context, the Committee find that the Department of Agriculture were aware of the requirements of di-ammonium phosphate for the public sector undertaking (Trombay Unit of the Fertilizer Corporation of India) in the beginning of November 1970 itself if not earlier. Yet it was only after a lapse of $1\frac{1}{2}$ months that the indent was placed, on 17 December 1970, on the Department of Supply. While the reasons for this delay need to be explained, a further delay of about two months occurred in floating the tenders. Explaining the reasons for this delay, the Department of Supply have stated, inter alia, that procurement action could be initiated by them only after allocation of funds, which was made by the Department of Economic Affairs on 4 January 1971, and that some delay also occurred because the Canadian Government had to be consulted about the timing of the issue of tenders. The Committee, however, find that the Supply Department had been asked by the Agriculture Department, on 17 December 1970, to initiate procurement action in anticipation so that advantage could be taken of the slack season price.

2.84. It is, therefore, amply evident that the handling of this purchase both by the Department of Agriculture and the Department of Supply has been rather unsatisfactory. Purchase at higher prices on a plea of urgency of requirement could have well been avoided in this case had the planning been done in advance and more effectively and the indents placed in time. As has been pointed out by the Fertiliser Purchase Committee, efforts should have been made for procurement well in advance so that the purchases did not clash with the domestic season, and this is especially necessary in regard to the requirements of public sector projects whose requirements can be anticipated in advance. The Committee need hardly emphasise the necessity for a well-coordinated timely, and concerted action in this regard and they expect that, benefiting from this experience, necessary steps will be taken to streamline the procedures for plan-

ning for the import requirements of public sector projects. The Committee would like to be apprised in some detail, of the remedial measures already taken or contemplated.

2.85. Incidentally, the Committee note that copies of market intelligence reports from Indian Missions abroad are also sent to the Department of Agriculture and it should have, therefore, been possible for that Department to have made use of these for placing the demand at the proper time taking into account the market trends. That this was not alone in this case would indicate that little or no use is made by the Department of the market intelligence received by it. As the agency mainly responsible for ensuring that fertilisers are procured and made available on time and for co-ordinating various activities in this regard, the Department should also constantly monitor the behaviour of the market, availability etc., and not leave it entirely to the procurement agencies.

(b) *Purchase of Ammonium Sulphate at higher prices*

Audit paragraph

2.86. The original import programme for 1971-72 provided for import of 1 lakh tonnes of ammonium sulphate from Japan and 0.70 lakh tonnes more from West Europe. The shipments were required to be during July to September 1971.

2.87. In May 1971, the Department of Agriculture intimated the final requirement to the Department of Supply as 4.50 lakh tonnes, 2 lakh tonnes by October 1971 and the balance 2.50 lakh tonnes by February 1972. The Department of Supply wanted (May 1971) to send a delegation to West Europe for this purpose before holding negotiations with the Japanese suppliers, whose prices were generally higher, so that purchase from them did not push up West European prices. Government, however, decided (May 1971) that no delegation need be sent to Europe for purchase of fertilisers.

2.88. In June 1971, an organisation representing most of the major West European producers of nitrogenous fertilisers (from whom bulk of the purchases from West Europe are regularly made), quoted \$ 13.00 (f.o.b.) per tonne for ammonium sulphate. On being requested to come over to India for negotiations, the organisation suggested that an Indian delegation should, as usual, go to Europe and, if that was not possible, it would send a delegation to India by 7th July 1971.

2.89. By then the Department of Agriculture (on 22nd June 1971) proposed that urgent action to meet emergent requirements should be taken by sending a delegation to Japan. This was approved on 30th June 1971 and a delegation left for that country on 8th July 1971. During negotiations the lowest price offered in that country was \$ 14.40 (f.o.b.) per tonne. This price having been considered high, the Department of Supply and the

Department of Economic Affairs requested the Department of Agriculture (August 1971) to consider whether the purchase could be postponed. The Department of Agriculture did not agree to this as ammonium sulphate was urgently required. Accordingly, in August 1971 orders were placed on Japanese suppliers for 0.41 lakh tonnes of ammonium sulphate at \$ 14.80 per tonne.

2.90. Negotiations with the West European Organisation mentioned above were held in India late in August 1971, when it raised its price to \$ 13.25 from \$ 13.00. An order for 0.40 lakh tonnes was placed on it in September 1971 at the enhanced price. In the same month, another order for 0.37 lakh tonnes was placed on an Italian supplier at the same price (\$ 13.25) on the ground that, that price had already been accepted for supplies by the West European organisation.

2.91. As the major portion of the demand still remained uncovered, another delegation went to Japan and placed orders (November 1971) for 1.36 lakh tonnes more of ammonium sulphate at \$ 14.15 per tonne (f.o.b.). Although world fertiliser prices started to rise from the latter part of 1971, this price was lower than the earlier price, at which orders had been placed three months ago on suppliers of the same country, by \$ 0.65 per tonne.

2.92. Had the offer of June 1971 from the West European Organisation been accepted there would have been saving of \$ 10,000 (Rs. 75,000 approximately) on 0.40 lakh tonnes ordered on it in September 1971. Since parity of price had been allowed to the Italian supplier, there could have also been a saving of \$ 9,146.25 (Rs. 68,600 approximately) on 0.37 lakh tonnes ordered on the Italian supplier.

2.93. It may also be mentioned that the acidity of ammonium sulphate (1.87 lakh tonnes) purchased in Japan was higher than that prescribed by the Department of Agriculture which, however, stated later on that this was acceptable.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), pp. 103—105, case(iii)]

2.94. The Committee learnt from Audit that the Department of Supply had stated (April 1975) as follows with reference to the postponement of the negotiations with the West European Organisation (Nitrex, Zurich), representing most of the West European producers of nitrogenous fertilisers, from whom bulk of the purchases from West Europe were regularly made, from July to August 1971:

“Previously the negotiations were to be held in July 1971. As the Secretary (Supply) was to come back from tour, the negotiations were postponed to 2-8-1971. But then the suppliers were

not free and, hence, the negotiations had to be postponed. During the interim period the suppliers had increased the price to \$ 13.50 from \$ 13.00. Subsequently, during negotiation, the suppliers were, however, persuaded to reduce the price to \$ 13.25. In this connection meetings were held with Nitrex on 20th August 1971 and a Fertiliser Purchase Committee meeting was held on the 29th August 1971. According to the suppliers they had increased price because they were completely sold out and even had to refuse an offer at \$ 20 from Brazil. According to Audit, had the offer of M/s. Nitrex made in June 1971 been accepted, this would have resulted in a saving of \$ 10,000. It had already been stated that during negotiations which were held subsequent to the offer made by the suppliers, the suppliers increased their price up to \$ 13.25. The holding of negotiations depends upon the convenience of both the buyer and the seller. It is not at the discretion of the buyer to hold negotiations at any time he likes. Further, the suppliers, in view of the position stated above, had every right to increase their price before a valid contract is concluded. On this right of the seller the buyer cannot be expected to exercise any control. Moreover, in such cases, it is dangerous to accept the offer if it does not specify the relevant details complete in all respects. For example, the present offer was also not a detailed one and naturally many clarifications are required in such cases before accepting the offer finally. Thus, if the offers of the supplier has been accepted without resorting to any negotiation etc. it might have led to many complications, *i.e.* the suppliers might have given sub-standard material. In view of the situation explained above there is no question of potential loss."

2.95. Explaining, during evidence, the circumstances in which it had been decided to accept the enhanced quotation of \$ 13.25 of Nitrex in August 1971, the representative of the Department of Supply stated:

"About this para, it could be said that the initial rejection of the offer of 13 dollars and the subsequent acceptance at a slightly higher price of 13.25 dollars involved an expenditure or loss. It was examined in some detail at that time. It was made out that the offer of Nitrex was a package deal which included ammonium sulphate, Urea and CAN. Urea, 53.60 dollars FOB for 38,000 tonnes; for CAN price was 33.65 dollars FOB. At the same time ammonium sulphate was offered at 13 dollars. Ultimately after negotiations the prices for the package deal

were: 49.50 dollars for urea, a reduction of 4 dollars 10 cents per tonne FOB, for CAN a reduction of only 15 cents per tonne; in any case it was a reduction from 33.65 to 33.50. At the same time for ammonium sulphate it has increased by 25 cents. The overall saving was 176,670 dollars as a package deal. That is the explanation for this."

A note furnished subsequently in this regard indicating the actual savings that accrued out of this transaction is reproduced below:

"The following statement would indicate the prices quoted and the final prices agreed to:

Sl. No.	Store	Quantity purchased MT	Initial price quoted per MT FOB	Final price FOB negotiated per MT	Diff. of price per MT	Savings
			\$	\$	\$	\$
1.	Urea (Bagged)	38,000 (France)	53.50	49.50	4.10	1,55,800.00
2.	CAN (Bagged)	18,600 (Holland)	33.65	33.50	0.15	2,790.00
		25,000 (W. Germany)	33.65	33.50	0.15	3,750
		11,630 (Belgium)	33.65	33.40	0.15	1,744.50
		19,640 (Italaseifa)	33.65	32.50	1.15	2,25,86,000
						1,86,670
	<i>Loss</i>					
3.	Ammonium Sulphate (Bulk)	40,000 (W. Germany)	13.00	13.25	(-)0.25	10,000.00
						Net Profit
						1,76,670.50

It will thus be seen that even after adjusting a loss of \$ 10,000 there was a total saving of \$1,76,670.50 in the 'package deal'."

2.96. The Committee desired to know why it had not been possible for the Department of Supply to buy only ammonium sulphate from Nitrex in June 1971 itself at \$ 13 per tonne instead of sending a delegation to Japan which resulted in the purchase of the fertiliser at Rs. 14.80 per tonne. The representative of the Department of Supply stated:

"This was considered to be a package deal. All the 3 were offered together. There is a letter by the Cabinet Secretary to the Secretary, Supply in which it has been argued out that this was a package deal; and as a result, the economy which I mentioned, had been achieved."

When asked whether Nitrex, on their part, had positively stipulated in June 1971, while quoting the price of \$ 13 per tonne for ammonium sulphate, that they would not supply ammonium sulphate at that price if Urea and CAN were not purchased as part of a package deal, the witness replied:

“Yes, Sir. I will read the relevant portion of the Cabinet Secretary’s letter:

‘You actually negotiated with Nitrex on 6, 9, 16 and 20 August 1971. On 16 August 1971 they changed their quotations of 22 June 1971 in regard to the price of Ammonium Sulphate by-product, Urea and CAN, but also stipulated that the sale of these fertilisers at the negotiated prices would be treated as a package deal. It is also seen from para 2 of the minutes of the meeting you had with Nitrex on 20 August 1971 when the negotiations were concluded that the entire quantities of fertilisers offered for sale by them were “to be treated as a package deal”’. They had repeated this stipulation regarding the package deal in their final and formal letter of offer of 20.8.1971 on the basis of which their offer was accepted on 28-8-1971.’”

2.97. Since this obviously related to the position prevailing in August 1971 and not June 1971 when the initial offer was made by Nitrex, the Committee asked whether there was a package offer in June 1971 or whether this offer had been made only subsequently after Nitrex had learnt of our own weaknesses and urgency. The witness replied:

“On the 15th June 1971 the Department of Supplies asked Nitrex to quote for ammonium sulphate, CAN and Urea, and they quoted accordingly next week, on the 22nd June. But there is no specific stipulation there that it must be treated as package.”

2.98. At the Committee’s instance, the Department of Supply furnished the relevant extracts from the minutes of the Fertiliser Purchase Committee relating to this transaction as well as a copy of the Report submitted by the delegation that went to Japan in July and November 1971 to negotiate the purchase of ammonium sulphate from that country.

2.99. The Committee found from the Report relating to the purchase concluded in Japan in July 1971 at \$ 14.80 per tonne that the initial offers made by the Japan Urea & Ammonium Sulphate Export Company,

representing the Japanese producers of Urea and Ammonium Sulphate were as follows:

	FOB	Freight	C&F
	\$	\$	\$
Ammonium sulphate (Bagged)	25.20	10.50	36.20.
Ammonium sulphate white and crystal line (Bulk)	20.73	10.30	31.00.

During discussions, the leader of the Indian delegation had pointed out that the prices quoted by Mr. . . . had come as a big shock to him and he could only say that the Japanese were not serious' and had stated that 'the producers had not taken a realistic attitude and had not taken note of the downward trend in the price of Nitrogenous fertilisers'. He had also drawn the attention of the Japanese team to the fact that 'before leaving India, he had invited offers from M/s. Nitrex and they had quoted a price of \$13.00 which was only an initial offer and that 'he was confident that he would be able to get a reduction of at least \$ 4 to \$ 5 when negotiations were held with Nitrex'.

2.100. In the meeting of the Fertiliser Purchase Committee held on 28 July 1971, the Secretary, Department of Supply had, *inter alia*, stated that 'the entire strategy of purchase had gone wrong this year' and had gone on to observe:

"In the past negotiations had always been conducted initially with the European suppliers and then with the Japanese suppliers. This year the negotiations started with the Japanese first. The Japanese Team had at one stage during the course of negotiations stated that negotiations should first be completed with Nitrex as in the past and then discussions should be resumed with them. This of course was not acceptable to the Indian Delegation as it was pointed out that the Europeans could have also said the same thing. However, the fact remains that over the past few years a certain procedure of discussions had been evolved and the same had paid dividends. Secretary stated that while it had been possible to bring down the offers for Ammonium Sulphate from the initial price of \$ 28.40 C&F for by-product to \$ 22.70 C&F, there was every possibility that this price could be further reduced by 40 cents as the freight element quoted by the Japanese was at \$ 7.90 but they had been told to either accept \$ 7.50 or in the alternative the shipping would be done by the Ministry of Transport. In quoting this price

the Japanese were evidently taking advantage of the great urgency of the Department of Agriculture for this type of fertiliser. The price of \$ 14.80 FOB when compared to the price of \$ 13 initially quoted by Nitrex was obviously very high as there was every possibility of obtaining a reduction in price from M/s. Nitrex over their quoted price of \$ 13. A reduction in price was also indicated due to the general downward trend in price of straight nitrogenous fertiliser."

2.101. Again, in his note dated 3 August 1971, a copy of which was furnished to the Committee by the Department of Supply, the Secretary had observed:

"As I mentioned at the last meeting of the Fertiliser Purchase Committee, I am not at all happy with the outcome of the negotiations held with the Japanese. The Japanese knew that our requirements of Ammonium Sulphate were most urgent and they took full advantage of this position. I had suggested about six weeks ago that, as in the past, negotiations should be held with Nitrex and ICI first before we talk to the Japanese. However, Government did not agree to my proposal with the result that now we have to pay much higher prices to the Japanese. Even now, if the Department of Agriculture could postpone the purchase of Ammonium Sulphate for about a month or so. I have not the least doubt that we could get a reduction of at least \$ 1 per MT in the price of Ammonium Sulphate resulting in a saving of about \$ 200,000. However, since it is not possible to defer this purchase and the Department of Agriculture insist on the shipments of the entire quantity to be completed by October, there is no option but to accept the price of \$14.80 per MT FOB for Ammonium Sulphate.

As regards freight, I hope the Japanese will agree to accept a firm freight rate of \$ 7.50 per MT. In case they do not accept this rate, then I suggest that we should ask Transchart to arrange for the shipment of this quantity. They are quite confident they would be able to fix all the ships at the rate of \$ 7.50 per MT. FA may see for concurrence."

The Committee were also informed in this context by the Department of Supply as follows:

"The file was shown to Secretary, Ministry of Finance, Department of Expenditure, who agreed that in view of the extremely urgent requirements of Ministry of Agriculture there was no choice but to accept the proposal for the purchase of Ammonium Sulphate

as suggested in Secretary (Supply)'s note of 3-8-1971 at the best prices he could obtain. Secretary (Expenditure) Finance, however, expressed his own reservations and doubts on the question of 'purchase strategy' which had been touched upon in the note of Secretary (Supply). Secretary (Expenditure) felt that there could be better advance planning of requirements, and also more confidential handling without making the urgency of our requirements known to the suppliers. At the meeting of the FPC on 23-8-1971 it was decided to accept the Japanese offer of 41,000 MT of Ammonium Sulphate at \$ 14.80 per MT."

2.102. As regards the purchases made by Nitrex, the relevant extract from the minutes* of the Fertiliser Purchase Committee meeting held on 23 August is reproduced below:—

"Secretary referred to the discussions held with M/s. Nitrex when, after detailed discussions, it had been possible to obtain a price of \$ 13.25 for ammonium sulphate bye-product. The suppliers had initially quoted a price of \$ 13 but increased it during the negotiations to \$ 13.50 and ultimately reduced it to \$ 13.25. The suppliers had stated that they had repeatedly requested that a Fertiliser Delegation should be sent to Europe as in the past and if that Delegation had come in May or even as late as July, their members would have been able to supply the full quantities of fertilisers required, particularly of Ammonium Sulphate and at that time it would have been possible to negotiate substantially better prices. At one stage of the discussions they had stated that it would have been possible for the suppliers to sell the material at \$ 7 at which price they had sold it to UAR. It was unfortunate that the purchase strategy suggested by the Department of Supply was not accepted with the result that the quantities now offered were limited and at prices higher by nearly \$ 6. Another advantage of negotiating with the European suppliers first would have been to use the price obtained from them as a base for getting comparatively cheaper prices from Japan. That advantage had now been lost. Last year when the negotiations were held with Japan for the supply of Urea, it was possible to effect a substantial reduction in prices and only \$ 2 more were paid on FOB basis over the price paid in Europe. Therefore, if it had been possible to establish a price of \$7 for Ammonium Sulphate in Europe, the Japanese suppliers would have had no case for asking for a price of more than \$ 9 to \$ 10 at the most.

*Not vetted in Audit.

F.A. mentioned that we had to bear in mind that the price that we finalised for Urea would have a bearing on negotiations with the Japanese suppliers. As regards Ammonium Sulphate, we would have liked the suppliers to have reduced the price to at least the initially quoted price of \$ 13 instead of the final offer of \$ 13,25 made by them in negotiations. There was an element of margin for reduction even in the initial price of \$ 13 quoted earlier. The C&F price was, however, still higher than the C&F price from Japan.

2.103. In view of this position, the Committee desired to know why the lower offer of Nitrex for ammonium sulphate had not been clinched in July itself when Nitrex had offered to send a delegation to India on 7 July, 1971 instead of postponing the negotiations to August to the detriment of the country's financial interests, particularly when the Secretary himself appeared to have been confident of obtaining a sizeable further reduction in price. The representative of the Department of Supply stated in evidence:

"I cannot say why we did not clinch the purchase of ammonium sulphate."

He, however, added:

"As I have tried to explain, ultimately it was found that in the overall we had not paid more. That is all I can glean from the file and submit. I find there was a difference of opinion about the strategy to be employed and I find no one can give a final view as to what should be the strategy at a particular time. Opinions differed and as a result of that, it was felt in certain quarters that the European price could have been brought down if dealings had been entered into. As it turned out, even after the purchase from Japan had been concluded when the package deal with Nitrex was put through, overall we could achieve a considerable saving."

Elaborating further, the witness stated:

"There was some disagreement about the approach to be adopted for this purchase. There was one school of thought that the negotiations should be held in Europe first and only after that discussions with Japan should be taken up. There was the other view that negotiations or sending a delegation to Europe was not immediately needed. So, in this kind of controversy, this seems to have happened. That is all I can say from the file."

2.104. At the instance of the Committee, the Department of Supply furnished a note detailing the areas of differences in regard to the purchase strategy to be adopted and how these were resolved, which is reproduced below:

“The Supply Department proposed in May, 1971, that a delegation be sent to Europe to negotiate purchase of fertilisers. The proposal was not accepted. It was suggested instead that quotations be invited and the suppliers requested to come to India for negotiations, if necessary, as that will facilitate prior consultation and approval within Government and generally result in better terms of purchase.

The Supply Department accepted this advice. The quotations were invited and received in June. The suppliers when requested to come to India for negotiations stated that they would like an Indian delegation to come to Europe as usual and if that was not possible, they would send their representatives by 7th July, 1971.

A proposal by the Department of Agriculture that a delegation be sent to Japan as fertilisers were in extreme short supply was approved on 30th June, 1971. The Department of Supply acted on this decision and sent a delegation to Tokyo on 8th July, 1971. Negotiations with the European suppliers had not then taken place.

The Supply Department later took the view that it may have been better if negotiations with the European suppliers had preceded negotiations with the Japanese suppliers. The other concerned departments did not share this view and held that it was debatable.

The guidelines of policy laid down since provide that the method of purchase to be accepted on a given occasion and in particular whether a delegation should go abroad and where and when would have to be decided on merits and circumstances. Ordinarily, the procedure should be to invite tenders and hold negotiations where necessary in India. Variation of this procedure may be considered if national interests so warrant.”

2.105. The Committee desired to know whether at the time of deciding to hold negotiations with Nitrex, the price trends in the international market were taken into account and the points on which negotiations were to be conducted settled. The Committee also enquired whether these points could not be settled through correspondence especially since Nitrex happened

to be a regular supplier in the past. In a note, the Department of Supply stated:

"M/s. Nitrex had given a combined offer for Urea, CAN and Ammonium Sulphate in their telex dated 22-6-1971. Secretary (Supply) had stated in his note dated 25-6-1971 as follows:

'We should inform M/s. Nitrex that we are very disappointed at the rates quoted by them, especially for Urea and CAN. In view of the fact that considerably lower prices for Urea have been quoted by some of the firms against our recent global tender, the price of \$ 53.60 FOB now quoted by M/s. Nitrex is not in keeping with the current world prices of Urea. In the case of CAN also, they have increased their last purchase price by nearly dollar per tonne'.

M/s. Nitrex, were accordingly informed on 26-6-1971 that this Department was disappointed at the rates quoted, especially for Urea and CAN. It will thus be observed that before entering into negotiations the price trends in the international market were taken into account. The purpose of the negotiations was to achieve reduction in prices of all the three commodities, viz. Urea, CAN and Amm. Sulphate. M/s. Nitrex had stated in their offer of 22-6-1971 that their Delegation was ready to travel to India in case our purchasing Mission was unable to visit the suppliers in Europe. In reply to this Department's telex dated 26-6-1971, M/s. Nitrex stated, in their telex dated 14-7-1971, that their rates were competitive on C&F basis and that freight rates paid by members of Nitrex for shipping fertilisers to India was slightly above US \$ 10.00. In the circumstances, it was difficult to settle the matter through correspondence and negotiations were therefore held. As a result of negotiations, in the 'package deal', it was possible to get lower prices for Urea and CAN, effecting a total saving of \$ 1,57,030.50."

2.106. Explaining in a note, at the Committee's instance, the circumstances in which the negotiations with Nitrex had been postponed to August, the Department of Supply stated:

"In their telexed offer dated 22-6-1971 Nitrex mentioned that their delegation was ready to visit India at short notice. In telex reply dated 26-6-1971, M/s. Nitrex were informed that their delegation should come as early as possible, but not later than 6th July, 1971. However, M/s. Nitrex in their telex received on 26-6-1971 stated that their delegation would be arriving on 7-7-1971. This was not convenient to the

Supply Department. Secretary (Supply) indicated at the FPC meeting on 30-6-1971 that Government had decided to send a delegation to Japan to finalise contracts for fertilisers. The delegation would leave India on 7-7-1971, reach Tokyo on 8-7-1971 and stay there for 10 days. In view of this decision of Government, M/s. Nitrex were informed on 30-6-1971 that due to certain unexpected developments they should postpone sending their delegation to a later date which would be intimated in due course. On 14-7-1971, in a telex message M/s. Nitrex suggested that an Indian delegation could come to Europe. On 26-7-1971, M/s. Nitrex were requested to send a delegation to India for discussion on 2-8-1971 or any date immediately thereafter. On 27-7-1971, M/s. Nitrex replied that their Delegation would arrive in India on 16-8-1971 and not on 2-8-1971. On 28-7-1971, a telex was sent to M/s. Nitrex that the date of 16-8-1971 for negotiations would be rather late and that they should send their team earlier. On 29-7-1971, Nitrex replied that their delegation would be available for discussions from August 3rd, 1971. The discussions with Nitrex were held on 6-8-1971 to 20-8-1971."

2.107. The Committee understood from Audit that the Secretary, Department of Expenditure had pointed out that there appeared to be 'something radically wrong' with the planning and procurement of fertilisers which placed the country at the mercy of the suppliers and allowed little leverage in negotiations. The Secretary has also, in this context, drawn attention to a minute recorded by the Minister of Agriculture on 22 June 1971 in which the Minister had observed that proper estimate regarding requirements of fertilisers, particularly ammonium sulphate was not made and no ammonium sulphate had been imported till the stock were liquidated. At the Committee's instance, the Department of Agriculture furnished copies of the extracts of these notes.

2.108. The minute recorded on 22 June, 1971 by the Minister of Agriculture with reference to the purchase of ammonium sulphate is reproduced below:

"It is very unfortunate that proper estimate regarding our requirements of fertiliser particularly Ammonium Sulphate was not made and we decided not to import any more Ammonium Sulphate till the stocks were liquidated. It is equally unfortunate that when a proposal to import 2 lakh tonnes of Ammonium Sulphate during June—December 1971 was submitted, it took the Associate Finance and the Department of Economic Affairs long time and our proposal was cleared only

towards the end of April. I feel very unhappy over this state of affairs and would suggest that we should take immediate action for import of Ammonium Sulphate as early as possible and thus avoid the shortage of this variety of fertiliser just before the next *Rabi* season. M. S. has discussed this matter with me. As I am leaving tonight on tour to some West Asian countries, he may discuss the matter with Finance Minister and get the necessary sanction for sending the delegation to Japan to settle the terms and entire procurement schedule so that we may not be in an embarrassing position towards the beginning of next cultivatory season."

2.109. In his Note dated 12 August, 1971, the then Secretary, Department of Expenditure had observed as follows:

"I have discussed this case with an officer of the Department of Agriculture, Shri and obtained additional information through JS(I&S) Shri I wanted to satisfy myself about the urgency and justification for purchase of ammonium sulphate at the prices which are considered by Secretary (Supply) as unduly high and put it to the Department of Agriculture whether it could postpone the purchase of ammonium sulphate as suggested by Secretary (Supply). The Department of Agriculture have re-emphasised the extreme urgency of the demand for ammonium sulphate. They have warned us against any complacency about the fertiliser consumption just because the food production in 1970-71 was upto the mark and have pleaded that ammonium sulphate has also to be made available for export-oriented crops like tea and tobacco. The prospects of getting ammonium sulphate from West Europe in adequate quantities are not bright and the only source is Japan. The Minister for Agriculture also in his minute of 22nd June, 1971 had emphasised the need for procurement of this fertiliser lest Government should be placed in an embarrassing position at the beginning of the next cultivating season and it was in that context that the purchase delegation was sent to Japan.

In view of the above, we have no choice but to agree to the purchase of ammonium sulphate as suggested in Secretary's (Supply) note of 3-8-1971 at the best prices he can obtain.

Secretary (Supply) has also observed that our purchase strategy was not correct in as much as the negotiations should have been held with Nitrex and ICI first before talking to Japanese. This is a debatable point and we have our reservations as to how far the purchase strategy adopted was correct or not.

Ministry of Finance would, however, like to point out that there appears to be something radically wrong with our planning and procurement of fertilisers which places us at the mercy of the suppliers and gives us little leverage in negotiations otherwise the question of our paying prices which we consider as commercially unfair or unreasonable should not arise keeping in view the volume and value of our purchases. It is not unoften that we have to concur in purchases being made because of our desparate need of a particular fertiliser such as CAN or ammonium sulphate. In this specific case of ammonium sulphate the Minister for Agriculture in his minute of 22-6-1971, had observed that proper estimate regarding our requirements of fertiliser, particularly ammonium sulphate, was not made and we did not import any ammonium sulphate till the stocks were liquidated. He had also commented upon the delay in Associated Finance and the Department of E. A. in processing the proposal of the Department of Agriculture to import 2 lakh tonnes of ammonium sulphate.

We feel that the entire procedure for estimating the requirements of the different types of fertilisers for the *rabi* and the *kharif* seasons and their timely procurement should be gone into in detail and a drill prescribed for the dates by which indents should be placed by the Ministry of Agriculture and procurement action initiated by the Ministry of Supply. This drill could be carried out by the Department of Agriculture in consultation with the Department of Supply, their Associate Finance and the Department of E. A. so that procurement is made before conditions of scarcity develop in which we perforce have to yield to the dictate of the suppliers.

I do not also see whether it is wise on our part to go on record as has happened in this case regarding our desparate need for ammonium sulphate. To say the least, this can only reduce our bargaining power as the suppliers, as is common knowledge, get to know these things. It would be desirable to evolve a procedure where by our emergent demand that may arise are handled in a manner which may not be exploited by the suppliers to our disadvantage.

The Agriculture Ministry should also take early steps to wean the agriculturists from the use of ammonium sulphate and CAN

which are going out of use all over the world and propagate the use of urea. This was also pointed out last year at the time of making purchases of CAN.

I have also discussed the matter with Finance Secretary who agrees. It is also suggested that, after necessary action has been taken on this purchase proposal, the Department of Agriculture should initiate action on other suggestions made in my note above and bring up a paper for discussion before the Cabinet Secretary."

2.110. When the Committee drew attention to these observations of the Minister and the Expenditure Secretary and pointed out that the matter appeared to have assumed serious proportions, the representative of the Department of Agriculture stated:

"I was not exactly dealing with it at that stage; but I would like to mention that we could later deal with the specific case of the indent for ammonium sulphate, because that is a specific item for discussion. We would be able to explain that. But on the main point on which the Chairman was reading a note of Mr. . . . viz. that our purchase strategy was defective, because indents were not available and that we had purchased at wrong seasons at prohibitive prices, I would say that the Ministry of Agriculture had been obliged to take recourse to such action. Our purchase strategy has been seriously affected, because we have not built up a market buffer; we have not tried to have a pipeline provision. We always tried to get our imports when the stocks had run down almost to the last tonne. This is very well known to the suppliers and they have exploited us year after year. We have, therefore, tried to persuade Finance and the Planning Ministries to allow us to have a provision of about 20 per cent towards pipeline provision. You must remember that we are dealing with 85 lakh tonnes of material; and, therefore, quite a substantial quantity of it remains in the pipeline i.e. at various stages like wholesale and retail points, railways, in ports, in docks and in transit sheds. So, for proper planning, we should make a provision for 20 per cent towards pipelines; and I must mention that this was agreed to by Finance in the Standing Committee; but they said that that particular year was not the most opportune year to start building up this pipeline provision, because prices were very prohibitive and international availability was also very low; but in principle, it was conceded that we should have 20 per cent pipeline provision. We have now a committee to consider this. We have also said that, apart from the pipeline

provision, we should have a market buffer, for the reason that India is about the single largest buyer in the international market; and our position certainly has an immediate impact on prices in international market. The reason why prices have crashed in the international market by 50 per cent of what it was a few months ago, is that they know that India today has a sizeable buffer; and that it is not going to make panic purchases. So, the prices have come down. That is why we have now suggested that if we build up this market buffer of 10 per cent and also make a provision of 20 per cent towards pipeline provision, India would be in a much better position when she enters the international market. We can afford to say that we will hold back, till prices have come to reasonable levels. Earlier, we were working on the basis of ship to field and factory to field, i.e. during the last 3 years; but now these two principles have been conceded. We cannot build up this much of buffer immediately because the total quantity utilised in this country is quite large and 20 per cent provision for pipeline and 10 per cent provision for market buffer would amount to a sizeable quantity. Hopefully, we will build up this buffer over a period of 2 to 3 years, in which case our purchase strategy will be such that we will be in a much better position to make international purchases."

2.111. Since the deficiencies in the planning for procurement of fertilisers had been pointed out as early as in August 1971, more than four years earlier and in view of the fact that the measures catalogued above largely related to the future, the Committee desired to know what concrete steps had already been taken in this regard. The witness replied:

"Apart from the two points which I mentioned already, other points which have an impact on purchase strategy are: timely placing of indents and realistic estimates of requirements. We have circulated to the members of the Committee and also to the State Governments a scientific formula; we have worked out a scientific formula for a realistic assessment of the requirements. Taking into accounts the recommendations of the Estimates Committee, if this formula could be improved upon to make it more realistic with reference to production targets, any suggestion would be welcome. Ours is a scientific and rational formula, linking requirements to the levels of application of fertilisers reached in different States. Secondly, about the timeliness of placing our indents which has been commented upon by the Department of Supply. Here, for the entire Fifth Plan period, our estimate of requirements had already been

made for every year of the Fifth Plan by a group of experts, with reference to production targets which have been laid down. And, therefore, taking into account the estimates of domestic production, one could plan in advance import purchases keeping in view the seasonal advantages. Apart from that, 18 months before the consumption season, we make a more detailed assessment of the requirements taking into account seasonal conditions, availability of irrigation etc. and see whether our earlier assessment requires downgrading or upgrading. The Finance Ministry now give advance block allotments of foreign exchange without trying to relate them exactly to final requirements."

2.112. The Audit paragraph also points out that as the major portion of the demand still remained uncovered, another delegation had gone to Japan in November 1971 and placed orders for 1.36 lakh tonnes more of ammonium sulphate at \$ 14.15 per tonne, as against the price of \$ 14.80 per tonne accepted three months earlier. The Committee desired to know the reasons for the Japanese offering a lower price in November although the world fertiliser prices had started rising from the latter part of 1971. The representative of the Department of Supply replied in evidence:

"When the Japanese delegation came to India, the price of 14.80 dollars was finalised. While leaving they said that the price may go down. Subsequently, they quoted a price of 14.40 dollars. When our delegation went to Japan, they got it reduced to 14.15 dollars. This reduction we got although the world prices were rising because of the fact that they were already committed while they were in India."

Since this appeared to indicate that better prices could be obtained by inviting delegations to India, the Committee enquired into the utility of sending delegations abroad to make purchases at higher prices. The witness replied:

"It was because the quantity purchased in the second lot was much larger. When the first negotiation was carried out, they did not have an idea of the quantity."

2.113. When asked whether this did not imply that the Japanese had presumably taken advantage of India's helplessness in the case of the earlier supplies, another representative of the Department of Supply replied:

"Regarding Japan, because of the difference in freight between Japan and India on the one hand and Europe and India on the other the final C&F price works out almost equal."

Explaining further, the witness stated:

“The freight from Japan is different from the freight from Europe. So it works out for 41,000 tonnes of ammonium sulphate which was purchased from Japan—the FOB price works out to 14.80 dollars while the CIF price works out to 22.70 dollars whereas the Nitrex price on CIF basis (that is including freight) came to 22.55 dollars (which included 9.30 dollars for freight) which is a little less than the Japanese price by 15 cents.”

2.114. Since the CIF price of the earlier purchase from Japan had been compared with the price of \$ 13.25 per tonne (f.o.b.) concluded with Nitrex, the Committee desired to know what would have been the price differential if the West European purchases through Nitrex had, in fact, been made at \$ 13.00 per tonne (f.o.b.) offered in June 1971. The witness replied:

“It will come to about 25 cents less per tonne . . . It comes to about 19,000 dollars.”

2.115. The Committee called for copies of the relevant proceedings of the Fertiliser Purchase Committee relating to the second purchase of ammonium sulphate made from Japan in November 1971. In a note, the Department of Supply informed the Committee that this purchase was made under an agreement dated 10 November 1971 entered into between the Government of India and Japan Urea & Ammonium Sulphate Export Co. Ltd. and furnished in this connection a copy of a letter dated 19 November, 1971 from the Secretary, Department of Supply addressed to the Secretary (Expenditure), Ministry of Finance, and copies endorsed to the Cabinet and Agriculture Secretaries, which is reproduced below:

“I returned from Tokyo on the night of the 12th November, after finalising the contract for an additional quantity of Ammonium Sulphate. As you are aware, we had placed an order for 41,000 MT of the slightly off-white Ammonium Sulphate, byproduct at \$ 14.80 FOB. For the white and crystalline material I was not at all satisfied with the price offered by the Japanese. I give below the successive stages of the discussions which have finally resulted in the Japanese climbing down from the FOB figure of \$ 20.70 per MT to \$ 14.15:

- (i) At the negotiations held in Tokyo in July 1971, the Japanese started off with a quotation of \$ 20.70. The price which finally emerged at the end of the negotiations was \$ 14.80 + \$ 1.50 for the white and crystalline material, i.e. \$ 16.30;

- (ii) On my rejecting the offer of \$ 16.30, the Japanese came over to Delhi for discussions in September 1971 and left after offering a price of \$ 14.60 which I did not accept;
- (iii) On return of the Japanese Delegation to Tokyo, they made overtures to us and reduced the prices to \$ 14.40 which we again rejected. Upon this the suppliers suggested that a responsible official of the Government of India should come over to Tokyo to explain the Indian-view point to the concerned manufacturers and the top management of the Association;
- (iv) I was deputed by the Government to Tokyo when I negotiated with the Japanese again from the 4th to the 12th November. The Japanese went back on the last price of \$ 14.40 and insisted on a price of \$ 14.80 instead. However, as a result of the negotiations which I held with them, I have been able to finalise the contract for 1,36,381 MT at an FOB price of \$ 14.15.

During my last visit to Tokyo the Japanese drew my attention to the FOB offers received by us from Canada at the rate of \$ 33.00 and from USA at prices ranging from \$ 21.97 to \$ 43.50. I told them that the prices received from Canada and USA were considered very high and therefore we had not taken any decision on those tenders. After protracted negotiations, I finally brought them round to accepting an FOB price of \$ 14.15 and also succeeded in persuading them to ship the entire quantity of 1,36,381 MT by March 1972. This price should be considered very satisfactory taking into consideration the present trend of world prices. On C&F basis this works out to \$ 22.05 as compared to the C&F price of \$ 22.55 from M/s Nitrex, Zurich.

These negotiations in Tokyo have resulted in a saving of \$ 34.095 or Rs. 2,55,712/- over the price of \$ 14.40 which was the last price offered by the Japanese before my visit to Tokyo. If, however, a comparison is made with the price quoted in Tokyo, viz. of \$ 14.80, the saving would be to the extent of \$ 88,647.65 or Rs. 6,64,857/-. This is for your information. The Japanese suppliers made a special request to me in Tokyo that we should not publicise this figure of \$ 14.15 as this was the lowest price at which they had sold Ammonium Sulphate to any foreign buyer including China. I should be glad if this price of \$ 14.15 is kept confidential for the present."

2.116. The conclusions of the Secretary, Department of Supply on the 'long drawn-out' negotiations with Japanese contained in his Report submitted to Government, in November 1971, on the 'Purchase of Fertilisers from Japan against the Tenth Yen Credit' are also relevant in this regard and are reproduced below:

*"As the foregoing three parts of this Report will indicate, the negotiations with the Japanese have been very long drawn-out and difficult on this occasion. It will, therefore, be useful to analyse the causes which led to this unsatisfactory situation so that negotiations can be carried out smoothly and to a satisfactory and speedy conclusion in the future.

The first conclusion to be drawn is that it is essential that our requirements be worked out in detail well in advance of the period during which the deliveries are required. It is also important that the suppliers should get no indication either of the urgency of our requirements or of the quantum of the requirements. On this occasion the Department of Agriculture finally intimated their requirements on 14th May 1971 and wanted the Department of Supply to ensure the arrival of 200,000 MT of Ammonium Sulphate by October 1971 and the shipment of 250,000 MT by February 1972. This was too short a notice to carry out meaningful discussions with the Japanese suppliers who sensing the quantum and urgency of the requirements, exploited the situation to their advantage.

So far as purchases from Japan are concerned, it is essential that we start the negotiations before China enters the market. It was not possible for us to do so on this occasion because of the late formulation of our requirements. China is the biggest buyer of fertilisers and once she has entered the market, the availability of the fertiliser gets reduced and the prices go up steeply. The second conclusion to be drawn, therefore, is that we should avoid a situation in which China has already entered the market for purchase of fertilisers. In fact, the Fertiliser Delegation in their Report for the year 1966 had also recommended that India should enter the market before China does.

The third conclusion that can be drawn is that it always pays to keep alive effective alternative sources of supply. In order to bring this about it is essential to purchase some quantities of the same fertiliser from more than one country. The Department of Supply could have obtained last year ammonium sul-

phate at a FOB price of \$ 2 per metric ton from the United States, but no demand was projected for this fertiliser on the Department of Supply in 1970. In fact, no purchase of ammonium sulphate was effected from the USA after July 1969 till the present proposals were finalised in May 1971. The result was that suppliers in the United States, as well as in Canada, turned their attention to other markets and when we floated tenders in those countries this year, the response was not at all satisfactory. Thus against the tender for 125,000 MT of ammonium sulphate in Canada we received on 21.10.1971 offers for 12,000 MT only and that too at a price of C\$ 33. From the USA from where we wanted a quantity of 150,000 MT, we were advised to float a tender for 60,000 MT only. When we went out on tender we got an offer of 70,000 MT only at prices ranging from \$ 21.97 to \$ 43.50 per metric ton.

Finally, it is most important that the Department of Supply should be allowed full freedom to adopt such purchase strategy as they consider most suitable for the occasion. Had they been permitted to negotiate with Nitrex in Europe before starting their dialogue with the Japanese, it would have been possible to obtain much larger quantities of Ammonium Sulphate and at considerably cheaper price resulting in substantial savings in foreign exchange."

2.117. According to the Audit paragraph, the acidity of the ammonium sulphate (1.87 lakh tonnes) purchased in Japan was higher than that prescribed by the Department of Agriculture which, however, stated later that this was acceptable. The Committee learnt from Audit that the Department of Supply had stated (April 1975) in this regard as follows:

"It may be stated that previously the Department of Agriculture had rejected the ammonium sulphate with acidity of 0.25 per cent maximum. Subsequently, the Department of Agriculture confirmed that the specifications as well as the procedure for submission of samples as indicated by the suppliers, were acceptable to them. It will be observed that this Department had acted only in accordance with the Department of Agriculture. The point is therefore to be answered by the Department of Agriculture."

2.118. During evidence, the Committee enquired into the reasons for accepting ammonium sulphate of higher acidity. The Additional Secretary, Department of Agriculture replied:

"After technical examination, we felt that because of the considerable price advantage there was no harm in taking that. It was felt that if sufficient precautions were taken to prevent absorption of moisture during transit by using polythene sheets to

cover the material and by using polythene inner liners, at the time of unloading there was little possibility of damage. Secondly, since ammonium sulphate was to be used immediately, the possibility of any bag rotting was considered as small. Thirdly, the import was made after the monsoon season and the time of transit from Japan was also not much and so there was little scope for absorption of moisture on the way. Even if due to unforeseen circumstances some damage was caused, it was felt it would be more than compensated by the price advantage."

In a note furnished subsequently in this regard, the Department of Agriculture stated:

"In the standard specifications of Ammonium Sulphate prescribed by this Department, the maximum free acidity had been mentioned as 0.025. The Ammonium sulphate obtained from Japan had 0.25 acidity, that is, much more than that provided in the standard specifications. Nevertheless, it was decided to accept this for the following reasons:

- (i) If sufficient precautions are taken to prevent absorption of moisture during transit by using polythene sheets to cover the material in the hatches and also by using polythene inner liners while bagging the fertiliser at the time of unloading, there is little possibility of damage as a result of free acidity.
- (ii) Since Ammonium Sulphate was to be used immediately, the possibility of any bag rot was very little.
- (iii) Since the import was made after the monsoon season and since the time of transit from Japan was small, there was little scope for moisture absorption.
- (iv) Even if some damage was caused as a result of moisture absorption, this would be more than compensated by the price advantage."

When asked whether all these precautions were actually observed, the Additional Secretary, Department of Agriculture replied in the affirmative.

2.119. The Committee are concerned to note that in this case, as a result of failure to make a proper and timely estimate of the requirements of ammonium sulphate and consequent postponement of imports till the stocks were exhausted, distress purchases of below-specific action fertiliser at higher prices than those prevailing in the market had to be resorted to on a plea of urgency. They find that while the original import programme for 1971-72 provided for the import of a total quantity of only

1.70 lakh tonnes (1 lakh tonnes from Japan and 0.70 lakh tonnes from West Europe), the final requirements intimated to the Department of Supply in May 1971 were more than two and a half times the requirements initially computed. Admittedly, no demand had been projected for this fertiliser on the Department of Supply in 1970 and, in fact, no purchase of ammonium sulphate was effected from the United States (where the f.o.b. price was only 2 dollars per metric tonne in 1970 as against the prices of 13.25 dollars per tonne and 14.80 dollars per tonne paid in August 1971 and September 1971 for purchases of ammonium sulphate from West Europe and Japan respectively) after July 1969 till the present proposals were finalised in May 1971. The representative of the Department of Agriculture also conceded during evidence that the purchase strategy had been seriously affected in the absence of a market buffer and pipeline provision and that they always tried to get their imports "when the stocks had run down almost to the last tonne" which was "very well known" to the suppliers who "have exploited us year after year." That such a situation should have been allowed to develop in spite of the fact that ammonium sulphate is known to be a preferred variety of fertiliser among the farmers is puzzling, to say the least. Even if the elementary precautions of taking into account the quantities in the pipeline and of building up of a market buffer had not been taken, the Committee fail to appreciate why the downward trend in prices of ammonium sulphate during 1970 had not been taken into account by the Departments of Agriculture and Supply and timely purchases at advantageous prices resorted to. The reasons for postponing purchases till the stocks were exhausted have also not been satisfactorily explained. It would, prima facie, appear, and this has also been pointed out in no uncertain terms by the Secretary, Department of Expenditure, that there was something radically wrong with our planning and procurement of fertilisers which placed us at the mercy of the suppliers and give us little leverage in negotiations.

2.120. The Committee find that even after the requirements of ammonium sulphate had been intimated to the Department of Supply, there was a difference of opinion between the Secretary, Department of Supply and the Ministry of Finance about the strategy to be employed for this purchase. While the Department of Supply wanted to send a delegation to West Europe for the purpose before holding negotiations with the Japanese suppliers whose prices were generally higher so that purchase from them did not push up the West European prices, a policy decision had been taken that instead of sending delegations abroad, quotations should be invited and the suppliers requested to come to India for negotiations, if necessary, as such a method would facilitate prior consultation and approval within Government and generally result in better terms of purchase. Accordingly, offers had been invited from an organisation (Nitrex, Zurich) representing most of the West European producers of nitrogenous fertilisers and from whom bulk of the purchases from West

Europe were regularly made, on 15 June 1971 and while communicating their offers by telex on 22 June 1971, Nitrex had also stated that their delegation would be ready to visit India at short notice in case the Indian purchasing mission was unable to visit the suppliers in Europe. This had been followed up by another message received on 29 June 1971 wherein Nitrex had stated that their delegation would be arriving on 7 July 1971. Yet, strangely enough, a proposal made by the Department of Agriculture that urgent action to meet emergent requirements should be taken by sending a delegation to Japan appears to have been approved a day later, on 30 June 1971, in spite of the fact that it was known by then that Nitrex were willing to come to India on 7 July 1971, resulting in the postponement of negotiations with the West European suppliers till August 1971, by which time Nitrex had increased their price to 13.50 dollars (f.o.b.) per tonne (as against the earlier June offer of 13 dollars per tonne) on the ground that they were completely sold out and even had to refuse an offer of 20 dollars from Brazil.

2.121. The Committee are unable to understand why the lower offer of Nitrex for ammonium sulphate was not clinched in July itself especially when the foreign suppliers themselves had agreed to come to India for negotiations. It would, prima facie, appear that these negotiations had to be postponed, much to the country's disadvantage, only on account of the Secretary of the Department of Supply having to proceed to Japan for emergent purchases of ammonium sulphate. It is surprising, to say the least, that the negotiations could not have been conducted as scheduled by other responsible Government officials, even if it had been considered absolutely inescapable for the Secretary to proceed to Japan. It is also significant that the suppliers themselves had pointed out, when negotiations were ultimately held with them in August 1971, that had the negotiations been held even as late as in July 1971, they would have been able to supply the full quantities of fertilisers required and that it would also have been possible to negotiate "substantially better prices". In these circumstances, the Committee have to regretfully conclude, despite all protestations to the contrary, that his deal had been handled in a thoroughly unsatisfactory manner and that the then prevailing trends in the international fertiliser market had not been properly taken note of and utilised to the country's advantage.

2.122. It has, however, been contended by the representative of the Department of Supply that as a result of a 'Package deal' for ammonium sulphate, urea and CAN negotiated with Nitrex in August 1971, while the price of ammonium sulphate was increased by 25 cents per tonne, a reduction of 4.10 dollars and 15 cents per tonne had been obtained respectively for urea and CAN and that there was thus an overall saving of 157,030 dollars from the deal as against the higher price of 10,000 dollars

paid for 0.40 lakh tonnes of ammonium sulphate. The Committee, however, find that while submitting their quotations, on 22 June 1971, for these three varieties, of fertilisers, Nitrex had not specifically stipulated that the offer should be treated as a package. Besides, it would also appear from the evidence made available to the Committee that even the initial offer of 13 dollars per tonne in respect of ammonium sulphate had little or no relevance to the market trends then prevailing. Admittedly, there was a downward trend in the prices of nitrogenous fertilisers at that time (June-July 1971) and in fact, the Secretary of the Department of Supply had also gone on record, during negotiations with the Japanese Suppliers in July 1971 that the price quoted by Nitrex was only an initial offer and that "he was confident that he would be able to get a reduction of at least \$4 to \$ 5 when negotiations were held with Nitrex." It is also significant in this context that Nitrex themselves had stated at one stage of the discussions subsequently held in August 1971 that had the purchase been negotiated in July, it would have been possible for the suppliers to sell the material at 7 dollars per tonne, the price at which ammonium sulphate had been sold to the United Arab Republic. Similarly, even in respect of urea which subsequently formed part of the package deal offered by Nitrex, the Secretary of the Department of Supply had observed in a note dated 25 June 1971, that the price of 59.60 dollars per tonne (f.o.b.) quoted by Nitrex was not in keeping with the then current world prices of urea. It is, therefore, amply evident that the suppliers had kept a cushion in their initial quotations and had successfully exploited the country's helplessness to their advantage and the Committee are unable to accept the Department's contention in this regard.

2.123. Admittedly, even in respect of the purchases made from Japan in August 1971 at 14.80 dollars per tonne (f.o.b.) the Japanese suppliers evidently took advantage of the urgency of the Department of Agriculture for ammonium sulphate, even though a reduction in price was also indicated by the general downward trend in prices of straight nitrogenous fertiliser. That the Japanese prices bore no relation to the prevailing international prices is also evident from their subsequent sale in November 1971 (when world fertiliser prices had started rising) at 14.15 dollars per tonne (f.o.b.) against the price of 14.80 dollars per tonne (f.o.b.) accepted only three months earlier. What is even more disconcerting is the fact that the acidity of the ammonium sulphate purchased from Japan was much more than that provided in the standard specifications (0.25 per cent as against 0.025 per cent specified), which necessitated precautions being taken to prevent absorption of moisture during transit and at the time of unloading. In regard to the acceptance of below-specification supplies, the Committee have been informed that it was felt that there would be no harm in accepting such supplies on account of the considerable price advantage offered. While this argument could perhaps be put forward in respect of the quantity of 1.36 lakh tonnes purchased in Nov-

ember 1971 at a price of 14.15 dollars per tonne (f.o.b.) when world prices had started rising, the Committee cannot, however, understand the rationale for accepting in August 1971 below-specification supplies at prices which were admittedly considered commercially higher. Besides, it is also not clear what precautions were taken to prevent damage to the fertilisers and bag rot after their receipt in India, particularly at the storage centres and distribution outlets. The Committee would, therefore, seek more specific clarifications in this regard and would like to be informed urgently whether any complaints were received after the fertiliser had been cleared from the port and till it had actually been sold and used in the field.

2.124. It would also appear that in spite of having gone in for emergent purchases at high prices, the fertiliser was not available in adequate quantities when it was actually required. Though the Department of Agriculture had indicated that they would require two lakh tonnes of ammonium sulphate by October 1971, orders for only 0.41 lakh tonnes could be placed by August 1971 and a further quantity of 0.77 lakh tonnes ordered in September 1971, leading to further purchases to cover the balance demand only in November 1971, actual shipments being completed only by March 1972. Besides, as would be seen from the discussions in the subsequent section of this Chapter, the supplies against the orders for 0.37 lakh tonnes placed on an Italian supplier at the same price as in the case of orders placed on Nitrex (13.25 dollars per tonne) commenced only as late as in October 1972 on account of delay in completion of various formalities. Admittedly, the time available was too short "to carry out meaningful discussions with the Japanese suppliers who sensing the quantum and urgency of the requirements, exploited the situation to their advantage.

2.125. This case, therefore, brings into sharp focus a number of glaring deficiencies in the planning and procurement of fertilisers and emphasises the need for evolving a more foolproof strategy. As has been rightly pointed out by the Secretary, Department of Expenditure, there could be better advance planning of requirements and also more confidential handling of purchases without making the urgency of our requirements known to the suppliers. The Committee note in this connection that the Secretary, Department of Expenditure, as well as the Secretary, Department of Supply had analysed the causes that led to the unsatisfactory situation in the present case and had suggested a number of remedial measures for the future. Action was also to be initiated by the Department of Agriculture on the suggestions of the former and a paper prepared for discussion before the Cabinet Secretary. It however, appears on the evidence, that some concrete steps, like a more realistic assessment of requirements, building up of a buffer stock, timely placing of indents, etc., have been taken only as late as in 1975. The Commit-

tee would, therefore, like to be informed in detail of the specific steps taken in pursuance of the suggestions of the Secretary, Department of Expenditure between August 1971 and June 1975, especially in the context of the rising trend in world prices of fertilisers coupled with non-availability during this period, and to ensure that procurement was made before conditions of scarcity developed and a situation, as in the present case, in which the country had to yield to the dictates of the suppliers was avoided.

(c) Increase in cost on account of delay in completion of formalities

Audit paragraph.

2.126. An order for supply of 0.37 lakh tonnes of ammonium sulphate was placed in September 1971 at \$13.25 (f.o.b.) plus estimated freight of \$9.30 per tonne. The date of delivery was stipulated as November 1971 or within 2 months from the date of completion of all formalities. The Department of Agriculture pointed out in November 1971 that these fertilisers were required for use in Rabi 1971-72 and that the supplies should not be delayed. There was, however, considerable delay in completing the formalities (*viz.*, making advance payments to the supplier, opening letter of credit etc.), with the result that the supplies commenced only in October 1972. In the meantime, freight rates went up considerably and the cost per tonne inclusive of freight became \$26.50 against \$22.55 estimated earlier. Due to this increase in cost, the credit allocation against which the contract had been placed was sufficient for purchase of 0.32 lakh tonnes only against 36,585 tonnes ordered. On this ground the supplier refused to make further supplies, although Government of India agreed to pay for the balance quantity in free foreign exchange. Subsequent *f.o.b.* prices of this fertiliser (1973) were very high (\$33.45 to \$45.30 per tonne).

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), p. 105, case (iv)]

2.127. The Committee understood that the Department of Supply had informed Audit (April 1975) as follows:

“The offer of M/s. Anic. Italy, for 36,585 MT Ammonium Sulphate bulk @US \$13.25 per MT was accepted on 25-9-1971. The shipment was to commence by November 1971 or within two months of the date of completion of all payment formalities under Italian credit. The Department of Agriculture wrote on 11-11-1971 to Ministry of Finance (EAD) to complete all formalities. The EAD expressed their inability to take action in absence of copies of contract which was

issued by ISM, London, on 17-11-1971. The copies of the contract were sent to EAD on 6-12-1971 by Agriculture. The delay in completion of various formalities became inevitable as the Italian Credit could become operative only after the Italian Government had given approval to the subject contract No. M. 16283. This approval was not accorded upto 3-5-1972. On 8-8-1972 ISM, London, informed this Department that the firm has been guaranteed credit insurance coverage and that the firm hopes to complete all formalities by September 1972. In the meantime, this Department had been writing to Agriculture to ensure that all payment formalities are completed in time so that the shipments are not delayed. By 11-9-1972 the Department of Agriculture had completed all formalities with the State Bank of India and the payment to suppliers was being delayed for want of authorisation by Reserve Bank of India to State Bank of India.

It is correct that the firm did not ship 4413 MT as funds provided under the contract had been exhausted due to higher freight rates. It was decided on 18-1-1973 to make payment for the balance quantity under FFE (free foreign exchange). This was not agreed to by the suppliers who were of the view that the contract was basically governed by payment under Italian Credit. It would thus be seen from the facts stated above that no delay of any sort can be imputed on the part of this Department or any other organisation in completing payment formalities as the Italian Government had not given its approval to the contract for an inordinate long period. However, the Department of Agriculture may be able to throw more light on this as it were they who were having all direct correspondence with Ministry of Finance (EAD)."

2.128. Explaining, at the instance of the Committee, the circumstances in which delay had occurred in the completion of formalities in this case, the Additional Secretary, Department of Agriculture, stated during evidence:

"We find that among all credits, the Italian credit involves most cumbersome procedures. We had to first go to the Italian Government. They take a month or so to clarify that we had to deposit ten per cent of this. This term is not in many other credits. We had to get the Okay from the Reserve Bank for this. The interest rate in this particular case was also raised while the transaction was being made and the Economic Affairs Department naturally were averse to any

increase. It would not be wrong to say that we would resort to Italian credit only as a last resort." In this connection the Committee found from the*

2.129. The Committee desired to know when the approval of the Italian Government to the subject contract was received. In a note, the Department of Agriculture informed the Committee that the Italian Government's approval was communicated to the Department of Economic Affairs on 4 July 1972.

2.130. According to the reply furnished in April 1975, to Audit by the Department of Supply, though the offer of the Italian firm had been accepted on 25 September 1971, the contract was, however, issued by the India Supply Mission only on 17 November, 1971 and copies of the contract were forwarded by the Department of Agriculture to the Department of Economic Affairs on 6 December, 1971. The Committee enquired into the reasons for the delay at these stages. The representative of the Department of Supply replied in evidence:

"The letter dated 25 September, 1971 placing the order on the firm was received in London on 29 September, 1971. On the same day the ISM London sent a telex to the firm to furnish payment schedules under the credit scheme. The firm replied on 12 October asking for some clarification of the interest calculations. After that the actual statement relating to interest credit details was received in the ISM London on 1 November, 1971. After that the ISM actually issued the contract on 17 November; there was about a fortnight's delay at that stage."

2.131. At the Committee's instance, the Department of Agriculture furnished a note indicating, in a chronological sequence, the reasons for the delays at various stages that had occurred in this case and the steps taken to expedite completion of the formalities, which is reproduced below:

"(1) Formal order for supply of ammonium sulphate was placed by the Department of Supply on suppliers on 25th September 1971.

(2) Contract issued by ISM, London on 17th November, 1971 was received in this Department on 2nd December, 1971.

*Information furnished by the Department of Supply in regard to purchases of various fertilisers made during the period 1969—75, that prior to this purchase commented upon by Audit, purchases of Urea and CAN had also been made earlier from Italy during 1969—71 on six occasions.

- (3) Letter dated 12-11-1971 received on 17-11-1971 from the Department of Economic Affairs asking this Department to consider in depth whether they would agree to the increased rate of interest of 6 per cent.
- (4) Letter dated 6-12-1971 enclosing a copy of letter dated 26-11-1971 from Rome Embassy addressed to the suppliers requesting them to reduce the rate of interest.
- (5) Letter dated 20-12-1971 from Department of Agriculture to ISM, London asking them to request the suppliers not to increase the rate of interest.
- (6) Letter dated 27-12-1971 from Department of Agriculture to Department of Economic Affairs requesting them to agree to the increased rate of interest provisionally.
- (7) Concurrence of Associate Finance and Internal Finance obtained on 28-12-1971 to the increased rate of interest.
- (8) Letter dated 28-12-1971 from Department of Economic Affairs seeking approval to the increased rate of interest.
- (9) Letter dated 31-12-1971/4-1-1972 to Department of Economic Affairs conveying concurrence to the increased rate of interest.
- (10) Letter dated 3-1-1972 received on 7-1-1972 in which Department of Economic Affairs suggested that it may be endeavoured to bring down to the rate of interest to 5.8 per cent.
- (11) First amendment to the contract which was issued by ISM, London on 1-2-1972 and received in this Department on 15-2-1972. was forwarded by the Department of Economic Affairs to Embassy of India in Rome on 1-3-1972.
- (12) Second amendment issued by ISM, London on 6-3-1972 and received in this Department on 20-3-1972 was forwarded to our Embassy in Rome on 1-4-1972.
- (13) Intimation was received from the Department of Economic Affairs that our Embassy had forwarded contract to Italian Government on 25-3-1972 but authorisation by the Italian Government was delayed as the suppliers did not submit the application for authorisation.
- (14) Cable sent to ISM, London on 12-4-1972 for contacting suppliers for expediting their application for authorisation to Italian Government.
- (15) On 24-4-1972, intimation was received from ISM, London that suppliers had submitted their application to Italian Government.

- (16) Deferred Payment Questionnaire received from the State Bank of India on 22-4-1972, were returned duly completed on 26-4-1972.
- (17) Necessary foreign exchange for making 10 per cent payment was released by Department of Economic Affairs on 27-4-1972.
- (18) Sanction by the Department of Agriculture issued on 3-5-1972 to State Bank of India for making initial 5 per cent payment to suppliers and opening Letter of Credit for second 5 per cent alongwith first instalment of interest and Pay and Accounts Officer was also requested to issue necessary authorisation to Reserve Bank of India in the matter.
- (19) On 17-5-1972, the Department of Economic Affairs was requested for obtaining approval of Italian Government expeditiously as without such approval, formalities would not be completed by State Bank of India.
- (20) Authorisation to Reserve Bank of India was issued by Pay and Accounts Officer on 19-5-1972.
- (21) The Department of Economic Affairs reminded our Embassy in Rome for obtaining approval from Italian Government on 25-5-1972.
- (22) The Department of Economic Affairs was requested on 31-5-1972 demi-officially to obtain approval of Italian Government so that completion of other formalities under the contract was not delayed.
- (23) The Department of Economic Affairs again reminded our Embassy in Rome for getting approval of Italian Government on 9th June, 1972.
- (24) On 28th June, 1972, the Department of Economic Affairs was again requested to expedite the approval of Italian Government to the contract.
- (25) The Department of Economic Affairs intimated on 7-7-1972 that Italian Government had approved the contract.
- (26) Approval of Italian Government was conveyed to State Bank of India on 13-7-1972 with the request to complete all formalities without any further delay.
- (27) Drafts etc. received from State Bank of India on 22-7-1972 were returned duly accepted on 31-7-1972. Exchange Control Officer of Reserve Bank of India was also requested for

issuing authorisation to State Bank of India for making 5 per cent remittance to the suppliers and for opening of Letter of Credit.

- (28) Reserve Bank of India issued authorisation to State Bank of India for payment of 5 per cent payment to the suppliers on 11th August 1972.
- (29) On 2-9-1972, SBI was requested for confirmation whether 5 per cent payment was made to suppliers and also to intimate steps taken for opening Letter of Credit for second 5 per cent with interest. Meanwhile RBI was also contacted informally for expediting their approval.
- (30) Clarifications desired by RBI were furnished to them on 5-9-1972.
- (31) On 16-9-1972, SBI informed that initial 5 per cent payment has been made to the suppliers. SBI also requested RBI for their approval for authorising them to execute deferred payment guarantee.
- (32) On 22-9-1972, the suppliers informed that Letter of Credit had been opened in a wrong bank and that error might be rectified.
- (33) On 23-9-1972, SBI was requested to open Letter of Credit in correct bank and necessary amendments etc. to sanction were issued.
- (34) Intimation was received on 21-10-1972 from suppliers that they had arranged one vessel 'Indian Strength' to lift first parcel of 7080 MT under the contract which actually sailed on 26-10-1972.
- (35) Thereafter two more vessels brought 25,672 MTs of material totalling 32,752 MTs against this contract.

The procedure of payment at present in vogue relating to import of fertilisers from Italy under Italian Suppliers Credit is a very complicated one entailing enormous delays in the completion of the various formalities. These delays result in shipments being delayed by the suppliers, thus dislocating our agricultural production programmes. Department of Supply was addressed in the matter suggesting simplification of the procedures in respect of Italian credits. The Ministry of Finance (Department of Economic Affairs) was also requested to simplify the procedures as supplies were unnecessarily delayed

on account of one or the other technical formalities in the case of Italian Suppliers Credit. The matter was discussed by the officials of this Department with their counter part in the Department of Economic Affairs on 13th April, 1972 who advised that there was no immediate solution to the problem of the Italian Suppliers Credit. Meaningful discussion with the Italians could be held only after June 1972 Italian elections."

2.132. In another note indicating the reasons for the delay in the issue of necessary authorisation by the Reserve Bank of India, the Department of Agriculture stated:

"On receipt of copies of contract dated 17th November, 1971 from ISM, London on 2nd December 1971 in this Department, the Ministry of Finance was requested on 6th December, 1971 to release foreign exchange amounting to 10 per cent of the total value of the contract for completing other formalities. As the rate of interest was indicated as 6 per cent in the contract against 5.8 per cent being charged in the earlier contracts under Credit, ISM, London was requested on 20th December, 1971 to persuade the suppliers not to charge higher interest against these contracts. (The Department of Economic Affairs would not release the necessary foreign exchange unless the higher rate of interest was accepted by this Department). The matter was also examined in consultation with the Associate Finance and the Ministry of Finance were requested on 4-1-1972 to agree to the payment of interest at a provisional rate of 6 per cent if the efforts being made by the India Supply Mission, London and the Indian Embassy at Rome for a lower rate of interest are not successful. Thereupon the Ministry of Finance through letter dated the 7th January, 1972 requested the Indian Embassy in Rome to persuade the suppliers to maintain the rate of interest quoted earlier. The Ministry of Finance were reminded by this Department on the 6th March 1972. Sanction for release of foreign exchange was received from the Department of Economic Affairs on 27-4-1972. The rate of interest of 6 per cent was also agreed to. Thereafter sanction was issued by the Department of Agriculture on 3-5-1972 to the State Bank of India for making initial 5 per cent payment to the suppliers and opening L/C for second 5 per cent along with first instalment of interest. The Pay and Accounts Officer was also requested to issue necessary authorisation to Reserve Bank of India, New Delhi.

Department of Economic Affairs was also requested on 17-5-1972 for obtaining the approval of Italian Government as without such approval, formalities would not be completed by State Bank of India. Approval of Italian Government received on 7th July, 1972 was conveyed to the State Bank of India, who was further requested to complete formalities without any delay. From the above facts, it will be seen that there was no delay on the part of this Department in the completion of the formalities and that the delay in this case had occurred due to the tedious and cumbersome procedure to be followed under Italian Suppliers Credit."

2.133. The Committee enquired into the action taken to expedite the Italian Government's approval. In a note*, the Department of Agriculture informed the Committee as under:

"Intimation was received from Department of Economic Affairs that Embassy in Rome have forwarded contract to Italian Government on 25-3-1972 but authorisation by Italian Government had been delayed as the supplier had not submitted the application for authorisation.

Cable was sent on 12th April, 1972 to ISM, London for contacting suppliers for expediting their application for authorisation to Italian Government.

Cable was received from ISM, London on 21-4-1972 that required application had been submitted by suppliers to Italian Government.

Department of Economic Affairs was requested on 17-5-1972 to obtain approval of Italian Government expeditiously.

Department of Economic Affairs reminded our Embassy in Rome on 25-5-1972 for obtaining approval from Italian Government.

Department of Economic Affairs was again requested on 28-6-1972 for expediting approval of Italian Government to the contract."

2.134. The Committee regret to note that as a result of the delay of nearly a year in completing the necessary payment formalities for making purchases against Italian Suppliers Credit (obtaining approval of the Italian Government arranging advance payments to the supplier, opening of Letter of Credit, etc.) supplies of ammonium sulphate, orders for which had been placed on grounds of urgency in September 1971 and required by November 1971, could commence only in October 1972, thereby dislocating the procurement programme. Besides, on account of the increase in the C&F

*Not vetted in Audit.

cost of the fertiliser following the considerable increase in the freight rates in the meanwhile, only 0.32 lakh tonnes as against 0.37 lakh tonnes initially contracted for could be procured, which must have obviously affected availability of the fertiliser for the country's agricultural production programmes. While the Committee are not unwilling to concede that some of the delay might be attributable to factors beyond the Indian Government's control, they cannot, however, help feeling that the time taken for the completion of the formalities in this case was somewhat abnormal. They are also of the view (after an analysis of the chronological sequence of various events relating to this purchase) that much of the delay could well have been avoided by more effective coordination between the agencies involved and better follow-up action, particularly when it was not unknown that among all credits the Italian credit involved the most cumbersome procedures in the context of earlier purchases made from Italy. For instance, the Committee find that though the Italian firm's offer had been accepted on 25 September 1971, the contract was issued by the India Supply Mission, London, only on 17 November 1971, and amendments to the contract issued respectively on 1 March 1972 and 1 April 1972. There also appears to have been some dispute over the rate of interest payable which took over five months to be resolved. It is not clear to the Committee why this question could not have been settled in September 1971 itself, when the terms and conditions of the offer must have presumably been gone into before acceptance thereof, and why it should have taken nearly two months for the Department of Economic Affairs to ask the Department of Agriculture, on 12 November 1971, to "consider in depth" whether they would agree to the increased rate of interest of 6 per cent as against 5.8 per cent charged in the earlier contracts under credit. Action to obtain the Italian Government's approval also appears to have been initiated only as late as in May 1972 and it required further protracted correspondence between the Departments of Agriculture and Economic Affairs and the Indian Embassy in Rome before the necessary approval was obtained on 4 July 1972. What is more surprising is the fact that even after all the formalities had been completed after a considerable lapse of time, further delay should have occurred on account of the Letter of Credit being opened in a wrong bank.

2.135. This case, therefore, underlines the need for streamlining and rationalising the procedures with a view to eliminating avoidable delays in the completion of formalities relating to purchase from abroad. The Committee note in this connection that the question of simplification of procedures in respect of Italian credit was discussed with the officials of the Department of Economic Affairs on 13 April 1972, who had then advised that there was no immediate solution to the problem of Italian Suppliers' Credit and the meaningful discussions with the Italians could be held only after the Italian elections in June 1972. They would, therefore, like to know whether these discussions were held subsequently and if so, what specific steps were taken in this regard. The Committee would also like Government

to undertake a selective case study of purchases from various countries with a view to assessing the time taken at various stages from the placing of the indent to the commencement of supplies and determining what improvements could be effected in the procedure for the processing of purchase proposals. An attempt should also be made to eliminate all non-essential stages and to reduce the time taken for processing the proposals at each stage. The Committee would like to be informed of the measures taken in pursuance of these recommendations and the improvement actually effected.

(d) *Increase in price on account of delayed negotiations*

Audit paragraph.

2.136. Against a tender enquiry made in March 1972 for purchase of 0.75 lakh tonnes of urea in free foreign exchange, the prices offered were \$56.80 to \$60.50 (f.o.b.) per tonne as compared to the previous purchase price of \$ 46.40 (f.o.b.) in July 1971. Offers for 0.62 lakh tonnes were accepted on 24th April 1972 at \$56.80 to \$60.50 (f.o.b.) per tonne. At that time (from 16th April 1972 to 5th May 1972), a delegation was in Europe negotiating purchase of urea against credits offered by foreign Governments. The prices accepted in negotiations in Europe in May 1972 ranged between \$57.20 and \$ 57.40 (f.o.b.) for 0.83 lakh tonnes. It would be seen that while the minimum of these prices was higher by \$0.40 per tonne than that for free foreign exchange purchase, the maximum price was lower by as much as \$ 3.10 per tonne.

2.137. The Fertiliser Purchase Committee at its meeting held on 6th May 1972 observed that "the position of supply had changed so fast that a few weeks' delay in sending the delegation to Europe had meant among other things at least a short supply of 30,000 to 40,000 M.T. and an increase in price by at least \$ 1. On account of delay in sending the delegation it had become necessary to take a decision on the F.F.E. (free foreign exchange) tender lest the stocks already depleted with the Agriculture Department should reach a dangerously low level. Consequently, a price of \$ 60.50 (f.o.b.) had to be accepted during the validity of the F.F.E. (free foreign exchange) tender before the delegation had made much headway in their tour in Europe. This price proved an inhibiting factor in conducting the negotiations by the delegation with the suppliers in Europe and the task of price reduction became all the more difficult on account of this."

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), pp. 105-106, case (v)]

2.138. The Committee desired to know when the Department of Agriculture had become aware for the first time of the 'dangerously low level

of the stocks of urea' and whether the Department did not monitor periodically the stock position vis-a-vis actual requirements. The representative of the Department of Agriculture stated in evidence:

"The purchase relates to Kharif 1972 and Rabi 1972-73. We had finalised our requirements by November 1971 and communicated it to the Department of Supply in February 1972. As you will see from the first sentence of the item, the tender enquiries were made in March 1972. It was not a question of delay in placing a particular indent, but, after the tender enquiries were made and the negotiations took place, they said that there was delay in sending the delegation. The indents were placed sufficiently in time by the Agriculture Ministry."

2.139. Since the indent in this case had been placed on the Department of Supply only in February 1972, even though the Fertiliser requirements for Kharif 1972 and Rabi 1972-73, to which the purchase related, had been finalised in November 1971 itself, the Committee enquired into the reasons for the delay of about three months in placing the indent in this case. In a note, the Department of Agriculture replied:

"The import requirement for Kharif, 1972 and Rabi 1972-73 were worked out on the 4th Standing Fertiliser Committee meeting held on 27-10-1971 and the minutes of the meeting forwarded to the members on 4-11-1971. A copy of the minutes was endorsed to the Joint Secretary, Department of Economic Affairs on 6th November 1971. At its meeting held on 7th December 1971, the Committee of Economic Secretaries felt that the present situation warranted a fresh assessment of the fertiliser supply position vis-a-vis demand and that the import strategy should be worked out carefully. A Working Group was constituted under Shri for doing this. The Working Group in its report dated the 13th December 1971 recommended the authorisation of import of fertiliser for 52 million dollars from Rupee Payment Area and the import of DAP for 5 million dollars from USA. The Committee also recommended a further review at the end of January 1972. At its meeting held on 28th December 1971, the Committee of Economic Secretaries approved these recommendations and decided that the Working Group should immediately reassemble and do a complete review of demand. Accordingly the Working Group had three meetings in January 1972 and recommended the release of foreign exchange of 46 million dollars. Accordingly the Department of Economic Affairs was requested by the Department of Agriculture on the 4th February 1972 for authorising the import as decided by the Working Group."

2.140. According to the Fertiliser Purchase Committee, which met on 6 May 1972, on account of the delay in sending the delegation to Europe in April-May 1972 for negotiating the purchase of urea against credits, it had become necessary to take a decision on the free foreign exchange tender floated in March 1972, lest the stocks already depleted with the Agriculture Department should reach a dangerously low level. The Committee, therefore, desired to know whether the depletion of the stocks could not have been foreseen. The Committee also desired to know the intervals at which Government collected data in regard to stocks of fertilisers. In a note, the Department of Agriculture stated:

“The import requirements for Kharif 1972 and Rabi 1972-73 were communicated by this Department to the Department of Economic Affairs in November 1971, as follows:

Season	(In lakh tonnes)		
	N	P	K
Kharif 1972	2.25	0.75	0.05
Rabi 1972-73	6.36	3.31	2.91
TOTAL	8.61	4.06	3.04

Following this, on the 30th December 1971, the Department of Economic Affairs authorised the import of 7.5 lakh tonnes of urea from Rupee Payment Areas and released foreign exchange of \$ 47 million for these imports and for the import of other fertilisers from the RPA. It was further decided that MMTC should procure at least 3 lakh tonnes out of the above to reach India before the end of May 1972. Subsequently, the Department of Economic Affairs released free foreign exchange to the tune of \$ 46 million on 4th February 1972. Accordingly, after getting the concurrence of Associated Finance, the Department of Agriculture requested the Department of Supply demi-officially on the 15th February 1972 to arrange for the import of 4 lakh tonnes of urea.

In the meantime, the stocks of fertilisers with the State Governments were getting depleted and a series of meetings had been held by the Department of Agriculture with the MMTC and Supply Department to get procurement expedited. The Secretary (Agriculture) also addressed the Secretary (Supply) and the Chairman, MMTC, demi-officially on the 22nd February 1972

bringing to their notice the scarcity of fertilisers developing in the States and expressing concern about the fertiliser supply situation. These items were also discussed by the Secretary (Agriculture) with the Secretary (Supply) and the Chairman, MMTC in a meeting held on the 6th March 1972. On the 7th March 1972, the MMTC intimated that they would not be in a position to procure more than 70,000 tonnes of urea by June 1972 against their earlier indication of 3 lakh tonnes. The domestic production estimates of nitrogen were downgraded from 18.2 lakh tonnes of nutrients to 14.05 lakh tonnes of nutrients. This figure was later on once again revised downward to 12.3 lakh tonnes of nutrients. These developments reduced the availability of urea in the country considerably. The urgency of importing fertilisers was also emphasised by the Department of Agriculture in the meetings of the Fertiliser Purchase Committee. In the meeting of the FPC held on the 25th March 1972, recognising the urgency of the requirements, the Committee unanimously recommended that a delegation should immediately go to U.K., Europe and Japan for purchase of fertilisers. The Department of Economic Affairs was also pressed to release more foreign exchange. Since the Department of Agriculture was not aware of the possibility of supplies from RPA failing to a considerable extent before the 7th of March 1972 and since the Department of Agriculture was not aware of the drastic downward revision in the domestic production from 18.2 lakh tonnes of nutrients to 14.05 lakh tonnes of nitrogen before December 1971, the shortage of urea could not have been anticipated earlier.

Six-monthly Zonal Conferences are held twice every year in each of Zones. The Zonal Conferences for the Kharif season are held in January and the Zonal Conferences for Rabi season are held in July. At these Zonal Conferences information is obtained from the State Governments and the Union Territory Administrations about the stocks of fertilisers available with them. Apart from this, information is obtained once a month regarding the stocks of pool fertilisers available with the Food Corporation of India, Central Warehousing Corporation, State Warehousing Corporation and the Indian Potash Ltd. Information is also obtained once a month from the domestic manufacturers regarding the stocks of fertiliser held by them. Once a quarter the availability position of pool fertilisers is assessed with reference to the requirements from Pool and suitable adjustments in the allotments and distribution plan made. This is in addition to the six-monthly assessment of availability and requirements done at the Zonal Conferences, refer-

red to above, at which a coordinated supply plan for meeting the estimated requirements of each State/Union Territory, taking into account the domestic production and the estimated imports is prepared."

2.141. The Committee enquired into the reasons for the delay in sending the delegation to Europe. In a note, the Department of Supply replied:

"A meeting of the Fertiliser Purchase Committee was called at short notice on the 25th March, 1972. The Finance Ministry (Department of Expenditure) was not represented at this meeting. The meeting had been called by Secretary (Supply) at short notice to consider the strategy to be adopted for making purchases of fertiliser from the U.K., Europe and Japan. The Committee took into account the urgency of the requirements indicated by Agriculture Department, the limited availability of foreign exchange and the reported rising trend of prices. The Committee unanimously recommended that in order to enter the market before any other major indenter, the best strategy would be to send a delegation immediately to U.K., Europe and Japan. In the Committee's view, past experience had shown that better prices and the required quantities could be obtained only by personal discussion with the producers. The Committee emphasised the immediate need for negotiations lest further delay should jeopardise procurement of fertilisers.

In pursuance of the recommendation of the FPC, proposals for sending a delegation first to the U.K. and Europe and then to Japan, were formulated in the Supply Department, and the approval of Minister (Supply) was obtained before sending the proposals to the Ministry of Finance (Department of Expenditure) on the 28th March, 1972. Government conveyed their decision to the Department of Supply on 13-4-1972, that a delegation should go to Europe and then to Japan and the delegation left for Europe on 16th April, 1972."

2.142. This is yet another instance of lack of foresight in planning for imports and of failure to initiate timely action for procurement from abroad after taking into account the developments on the domestic as well as on the international fertiliser front. The Committee are perturbed to note that considerable delay had occurred at various stages in arranging for the imports of fertilisers to meet the requirements of Kharif 1972 and Rabi 1972-73, resulting in the postponement of purchases till the already depleted stocks had reached "a dangerously low level". To begin with, the Committee find ~~that~~ even though the fertiliser requirements for Kharif 1972 and Rabi

1972-73, to which the present purchase of urea related, were finalised on 4th November, 1971 itself and had also been communicated to the Department of Economic Affairs on 6th November, 1971, it was only a month later, on 7th December, 1971, that a working group was constituted by the Committee of Economic Secretaries for making a fresh assessment of the fertiliser supply position vis-a-vis demand. While on the recommendations of the working group (13th December, 1971), the Department of Economic Affairs authorised, on 30th December, 1971, imports of 7.5 lakhs tonnes of urea from Rupee Payment Areas and released foreign exchange of 47 million dollars for these imports as well as imports of other fertilisers from Rupee Payment Areas and the Minerals and Metals Trading Corporation was also asked to procure at least 3 lakh tonnes of urea to reach India before the end of May 1972, it took another six weeks for the release of free foreign exchange for purchases from General Currency Areas and placing indents therefor on the Department of Supply. It appears that this delay was on account of the Committee of Economic Secretaries asking the working group to do a complete review of the demand. However, as has been pointed out earlier in Chapter I of this Report (vide paragraphs 1.63 and 1.64), the outcome of this elaborate exercise was not very much different from the projection made earlier, in October 1971, by the Standing Committee on Fertilisers of the Department of Agriculture. It is also seen from the report of this working group, that the import requirements for 1972-73 had been worked out by the Group on the assumption that the indigenous production of nitrogenous fertilisers would amount to 14 lakh tonnes of nutrients as estimated by the Department of Fertilisers and Chemicals even though the Department of Agriculture appear to have expressed reservations about these estimates. (As against these estimates, actual indigenous production of nitrogenous fertilisers during 1972-73 amounted to only 10.60 lakh tonnes of nutrients). It should have also been apparent even before 7th March, 1972 when the Minerals and Metals Trading Corporation formally intimated that they would not be in a position to procure more than 70,000 tonnes of urea by June 1972 against the earlier estimation of 3 lakh tonnes, in view of the fact that though it had been estimated in December 1971 that 7.5 lakh tonnes of urea would be available from Rupee Payment Areas, only a quantity of 4.5 lakh tonnes had been agreed upon in the trade plans actually concluded. Besides, it should have been possible, by timely collection of market intelligence, to anticipate that, on account of adverse weather conditions in Europe in the beginning of 1972 and the consequent upsurge in demand for fertilisers in East and West Europe, the quantities actually available in the international market would be far less than the initial estimates made in this regard.

2.143. The Committee are, therefore, of the view that these factors should have been adequately taken note of and arrangements made to enter the market as expeditiously as possible. It is, however, fairly obvious, that

the developments on the international fertiliser front in the beginning of 1972 had not been properly understood in India and that timely remedial measures were not taken in the context of the likely shortfalls in the indigenous production and in the scheduled imports from Rupee Payment Areas. That such a situation should have been allowed to develop in spite of the existence of a high level Fertiliser Purchases Committee for coordinating imports is regrettable. The Committee would urge the Fertiliser Purchases Committee to have a firmer grip on the import programme and assess its progress continuously so that timely remedial action could be taken in the event of a likely setback to the scheduled imports from any country on anticipated steep increase in prices or shortfalls in indigenous production. This case also points to the need for improving the machinery for the timely collection of market intelligence on production and price trends in the international market and other factors likely to have an impact on availability of fertilisers. In this connection, the Committee would invite attention to their observations/recommendations contained in paragraphs 2.44 to 2.46 of this Report.

(e) *Distress purchase of below-specification NPK*

Audit paragraph

2.144. An offer for NPK grade 15-15-15 at \$ 65.45 per tonne (c. & f.) received against a global tender was rejected in May 1972 as technically unacceptable to the Department of Agriculture in view of moisture content being 2 per cent instead of 1.5 per cent and only part of the phosphorous being in water soluble form. A higher offer of \$ 73.14 per tonne (c&f) was therefore, accepted for 0.10 lakh tonnes in May 1972. In July 1972, however, the Department of Agriculture stated that NPK of the specification rejected in May 1972 would be suitable. This revised decision was based not on any fresh technical consideration but due to shortage of complex fertilisers (with completely water soluble phosphates) and di-ammonium phosphate/ammonium phosphate. From market reports prepared by the India Supply Mission, London, it appears that shortage of phosphatic fertilisers had developed from the middle of 1971, if not earlier. Had, on the basis of market reports, the decision of July 1972 been taken two months earlier, the offer of May 1972 could have been accepted and there would have been saving of \$ 86,900 (Rs. 6.52 lakhs approximately).

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), p. 106, case (vi)]

2.145. The Committee learnt from Audit that with reference to this case, the Department of Agriculture had stated (February 1975) as follows:

“The import of NPK grade 15—15—15 was made in 1972 to meet two different purposes. One was for distribution to cultivators.

through State Governments. The second was for the seeding programme of the fertiliser factories. For the first purpose, this Department has always insisted that from the technical point of view purchase should be made of NPK 15—15—15 having a moisture content of not more than 1.5 per cent and having not less than 80 per cent phosphorous in water soluble form. For the second purpose, the specifications of the NPK naturally have to correspond to those of the fertiliser proposed to be manufactured by the fertiliser factories. Accordingly this department had initially indicated these specifications of the NPK grade 15—15—15 which included *inter alia* that the moisture content should be 1.5 per cent or less and that at least 80 per cent of the phosphorous should be in a water soluble form. The fact that a fertiliser of these specifications would cost more was known to the Department. Nevertheless, preference was expressed for such fertiliser from the agronomic point of view. Subsequently, when it was not possible to get fertiliser of such specifications even by offering a higher price, this Department had agreed to the purchase of NPK grade 15—15—15 having a moisture content of 2 per cent and having only 40 per cent of phosphorous in water soluble form. The fertiliser was, however, diverted for use as seeding material by the fertiliser factories.”

2.146. Explaining, at the Committee's instance, the facts of the case, the representative of the Department of Agriculture stated:

“The Ministry of Agriculture does not go in for import of NPKs, because they are dilute fertilisers, except for two reasons. One is, if it is required for the seeding programme of specific manufacturers. Second is, if no other form nitrogenous or phosphatic fertilisers are available. Even if Urea and DAP are available, for instance, we would certainly prefer them to NPK. The first order which we placed was for a seeding programme manufacture NPK grade 15—15—15 where the solubility of its $P^2 O^5$ was 82 per cent and more, requiring a maximum moisture content of 1.5 per cent. Therefore, there is no point in purchasing NPK grade for a seeding programme with lower water solubility because it will not approximate to the product which they propose to manufacture. Since they could not get it for the lower price, we had to take the higher-priced NPK of the same grade, but with higher water solubility of $P^2 O^5$ because it was meant for a seeding programme manufacturer. In the second half of 1972, a situation developed where the nitrogenous and phosphatic fertilisers became more difficult to

obtain and we had also received demands from State Governments saying that they will take dilute fertilisers. We had also asked them and they were willing to take dilute fertilisers and they were willing to take NPK with lower water solubility of $P^2 O^5$ because they had nothing else. So, we had stated that we would be accepting the same grade which we had earlier rejected because that was for a seeding manufacturer."

2.147. The Committee learnt from Audit that the producers of phosphatic fertilisers, which had been generally available in recent years under a pricing policy, had increased the prices of these fertilisers from the middle of 1971. For instance, the US export prices for super-phosphate had been raised from 40 dollars per tonne in May 1971 to 77 dollars per tonne by the end of the third quarter of 1972. When asked in this context whether Government were not aware of the shortage of phosphatic fertilisers in the world market when the lower offer was rejected in May 1972 and whether the decision subsequently taken in July 1972 was not applicable to NPK for use in agriculture, the representative of the Department of Agriculture stated:

"In May 1972, we were not aware of the difficulty in obtaining the higher analysis nitrogen."

She added:

"Prior to May 1972, we had no need for this fertiliser for general purposes. . . . The situation was that we were getting whatever fertiliser was wanted. After May 1972, we were not able to get. After that, there was an offer saying that that was the only available material and we agreed to take that one."

2.148. The Committee are concerned to note that in this case after having rejected in May 1972 an offer for NPK grade 15-15-15 at 64.45 dollars per tonne (C&F) on the ground that its moisture content was 2 per cent instead of the stipulated 1.5 per cent and only part of the phosphorus was in water soluble form (which, therefore, made it unsuitable for the seeding programme for which it was required), a revised decision had been taken only two months later, in July 1972, not on any fresh technical consideration but on account of shortage of fertilisers, to accept NPK of the specification rejected earlier for distribution to the cultivators for general agricultural purposes, and that the postponement of this purchase resulted in an extra expenditure of 86,900 dollars (about Rs. 6.52 lakhs). Explaining the reasons for not accepting this fertiliser in May 1972, the Department of Agriculture have stated that NPK fertilisers were not normally imported, on account of their being dilute fertilisers, unless they were required for the seeding programme of specific manufacturers or when other

higher analysis varieties of nitrogenous and phosphatic fertilisers (e.g. urea, di-ammonium phosphate, etc.) were available and that in the instant case, they were not aware in May 1972 of the difficulty in obtaining higher analysis fertilisers. According to the Department, a situation developed in the second half of 1972, when the availability of nitrogenous and phosphatic fertilisers had become more difficult and whatever fertiliser was available had to be accepted after consulting the State Governments to meet their demands

2.149. The Committee, however, find that the market reports received from the India Supply Mission, London, had indicated that shortages of phosphatic fertilisers had begun to develop from the middle of 1971 itself, if not earlier and that their prices in the international market were also known to be on the increase. It would also appear from the discussions in the preceding section of this Report, relating to the purchase of urea in the beginning of 1972, that the Department of Agriculture had been aware in February 1972 itself, if not earlier, that the stocks of fertilisers with the State Governments were getting depleted and a scarcity situation was developing. Besides, on 7 March 1972, it was known to the Department that there would be a heavy shortfall in imports from the East European countries by the Minerals and Metals Trading Corporation and that alternate arrangements would, therefore, have to be made. In these circumstances, the Committee are unable to accept the Department's contention and are of the view that prudent use had not been made of the information already available with the Department and adequate steps had not been taken to regulate imports in the best interest of the country. They are inclined to take a serious view of this failure and would urge fixation of responsibility therefor.

(f) *Payment of higher prices for credit purchases.*

Audit paragraph

2.150. A contract for 0.25 lakh tonnes of NPK grade 15—15—15 against a foreign loan was executed in May 1972 at \$ 79.80 (c & f) per tonne for half the quantity to be shipped in July 1972 and \$ 84.75 (c & f) per tonne for the remaining half to be shipped in August 1972. In a contract, executed in June 1972, for purchase of 0.10 lakh tonnes NPK of the same grade against free foreign exchange, the rate accepted was \$ 73.13 (c & f) per tonne for delivery in June and July 1972. Thus, the price paid for the loan financed purchase was very much higher than that paid for in free foreign exchange. The Department of Supply stated (January 1975) that the

purchase at higher rate against credit had to be made for meeting urgent requirements.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), p. 106, case (vii)].

2.151. The Committee were informed by Audit in this connection that the entire quantity due for delivery in July and August 1972 was actually shipped only in September 1972 and that the Department of Supply had stated (January 1975) as follows:

“...it is correct that under the Credit, contract was at a higher price but...purchase had to be approved by the Fertiliser Purchase Committee as the Agriculture Ministry insisted on the purchase being made to meet their urgent requirements. This point, therefore, does not concern Department of Supply. At the time of placing the contract it could not be foreseen that material would not be shipped in terms of the contract.”

2.152. The explanation furnished in this regard by the Department of Agriculture to Audit, in February 1975, was as follows:

“...after considering the availability of fertilisers in foreign countries and after taking into account the requirements of the fertiliser factories in the country for their seeding programmes, it was decided to import 1,22,000 tonnes of N.P. & K of various grades. Out of this, 35,000 tonnes were required for the seeding programme of FACT, which was expanding its capacity with the assistance of a loan from the World Bank. Under the terms of the loan, the FACT was under obligation to carry out the seeding programme to establish a market for the fertiliser proposed to be manufactured by them. This fertiliser was to be made available in June 1972 and July 1972 so as to enable its use by the cultivators during the kharif 1972 season. A firm demand for this amount of fertiliser could not be placed before the 14th March 1972 since an additional foreign exchange of \$ 15 million was made available only on that date, owing to very tight foreign exchange situation. The requirement for import of the fertiliser for the seeding programme of the FACT was also of an urgent and pressing nature in view of the obligation of the factory to the World Bank. Accordingly, this Department requested for the early action for the supply of the fertilisers in the months of June and July through letter dated the 14th March 1972 addressed to the Department of Supply. At the time the request for the fertiliser was made, it was not and it

could not have been anticipated that the shipments and delivery would be delayed. Hence the fact that the fertiliser was shipped only in September 1972 would be irrelevant to the consideration of the issue whether the requirement was urgent or not. Nevertheless, the fertiliser was put to use for the seeding programme of the factory during the rabi 1972-73 season."

2.153. Since it had been stated by the Department of Agriculture that part of the quantity represented the requirement of FACT for its seeding programme which was of an urgent and pressing nature, the Committee desired to know when the Department had come to know of this requirement of FACT. In a note, the Department informed the Committee that FACT had intimated their requirements of seeding material for the year 1972-73 on 21 July 1971.

2.154. To another question as to why the planning of the demand could not be done well in advance so as to avoid a situation where Government had to pay a higher price on the plea of urgency, the Department replied:

"The agronomic requirements of fertiliser for the Kharif 1972, as worked out by this Department were as follows:

N	..	8.15 lakh tonnes
P	..	2.70 lakh tonnes
K	..	1.54 lakh tonnes.

Taking into account the closing stock and indigenous production, this Department was required to import 2.25 lakh tonnes of N and 0.75 lakh tonnes of P_2O_5 for Kharif 1972. Against this, the Department of Economic Affairs agreed to make available foreign exchange only for purchase of 3 lakh tonnes of Urea from Rupee Payment area and \$ 5 million in free foreign exchange to meet our requirements of P_2O_5 for Kharif 1972. Keeping in view the limited availability of foreign exchange, it was decided to import DAP in preference to NPK complex fertilisers because of the following reasons:

- (i) As DAP was required by the State Governments for their production programme and NPK by indigenous manufacturers for their seeding programme, a decision was taken to prefer the import of DAP which was required by the State Governments for their production programme.
- (ii) The seeding manufacturers were only trying to popularise certain products which could wait for some time till foreign exchange availability ceased.

- (iii) In terms of economics, per unit price of nutrient in DAP was lower than in NPK complex fertiliser.

The foreign exchange of \$ 46 million released by the Ministry of Finance (Department of Economic Affairs) on 31st January 1972 for meeting the requirements of Rabi 1972-73 was not considered sufficient by this Department to import our full requirements. The matter was, therefore, taken up with the Department of Economic Affairs on 5th February, 1972 for making available additional foreign exchange. Simultaneously M/s. FACT was also informed on 3rd February, 1972 that it was not possible for this Department to import their seeding requirements unless additional funds were made available either by the World Bank or by the Ministry of Finance (Department of Economic Affairs).

*The Ministry of Finance, however, reconsidered the position and informed this Department on 11th February, 1972 that the seeding material requirements of M/s. FACT had to be accommodated from within the foreign exchange allocation already made to this Department. This matter was again considered in detail in this Department and it was finally decided and communicated to the Department of Supply on 14th March, 1972 to purchase 47,000 MTs of complex fertiliser with free foreign exchange and 75,000 MTs under CID. loan which included 27,000 MTs and 25,000 MTs respectively of complexes for meeting the seeding requirements of M/s. FACT.

From the above, it will be observed that this Department was not initially in favour of importing NPK complex fertilisers due to limited allocation of foreign exchange made available by the Ministry of Finance (Department of Economic Affairs) even though this Department was aware of the seeding requirements of various manufacturers. It was possible for this Department to include certain quantity of NPKs in our revised import programme when additional foreign exchange was made available by the Ministry of Finance (Department of Economic Affairs)."

2.155. Explaining, during evidence, the circumstances in which the purchase at higher prices had been made, the representative of the Department of Agriculture stated:

"The FACT communicated its requirement in December. But at that time we did not have enough foreign exchange and the purchase

*Not vetted in Audit.

of the NPK fertiliser had to be made by reducing the foreign exchange in the case of other activities. So, we did not go in for the seeding programme of the fertiliser. After that, they released additional foreign exchange for this purpose. After getting it, we had intimated that there was no need to purchase that."

She added:

"It was meant for the seeding programme for the kharif. But the shipment arrived much later and therefore it was put to use for the seeding programme during the rabi."

2.156. Since it had been stated that when additional foreign exchange was subsequently released for the purpose of purchasing fertilisers for the seeding programme of FACT, the Agriculture Department had intimated that there was no need to go in for the credit purchase of NPK, the Committee enquired into the action taken by the Department of Supply on receipt of this information. In reply, the Department furnished to the Committee a copy of the letter dated 4th November 1975 from the Department of Agriculture which, according to the former, 'explained what exactly the Agriculture Department had said in 1972,' which is reproduced in Appendix IX.

2.157. In view of the fact that this particular case appeared to indicate that higher prices had to be paid for credit purchases, the Committee desired to know the Government's experience in this regard. The representative of the Department of Supply stated in evidence:

"Generally, by and large, there is not much difference in prices between purchases made on credit basis and those on regular payment of foreign exchange. But this example quoted here is one peculiar instance in which the utilisation of credit did result in a higher price."

The Chairman of the Minerals and Metals Trading Corporation stated in this connection:

"Our own experience in MMTC is that we make many credit purchases, but they are not suppliers' credit, they are mainly government to government credit like the Yen Credit or the CID, which is a Canadian credit. Our own experience is that there has been absolutely no difference in pricing because it is credit. We are buying nickel from Canada on producer price which is the lowest, and if CID credit is available, we debit it to that credit. It has no influence directly upon the pricing

pattern. In USAID this element was there, but we have not noticed this in Yen Credit or in the Canadian Credit."

2.158. The Committee thereupon drew attention to this particular case commented upon by Audit and desired to know the reaction of the witness who replied:

"This is a good case in point. I was only speaking from my experience of items other than fertilisers. I would not be able to comment on fertiliser prices. But there is one thing. I would say that, in case we find there is such a difference in price, if we have the bargaining strength which we reckon on with buffer stock and with our non-anxiety to buy it at any cost, we can hold out and say that we will not buy. In the long-term contract also, conclusion of price every six months or even three months is an essential provision of the contract, and if the price is high in comparison to free foreign exchange, there is no obligation to buy."

2.159. The Committee enquired into the position in this regard in so far as purchase of equipment for fertiliser plants were concerned and asked whether it was a fact that sometimes arbitrary prices were charged by the suppliers of equipment against credit-tied purchases, particularly the western cartels, the price differential being 80 to 100 per cent more as compared to the prices charged for free foreign exchange purchases. The Secretary, Department of Fertilisers and Chemicals replied in evidence:

"We have to make a qualitative difference between purchase of fertiliser and purchase of fertiliser equipment. Fertiliser, as such, is an internationally traded commodity; fertilisers are standard products coming out of the fertiliser plants all over the world; for example, the urea produced in India does not differ in any way from the urea produced in Western Europe or USA. Therefore, there is such a thing as international selling prices for fertilisers. It is, therefore, possible—and I do support what Mr. . . . says—to check at any given point of time whether the prices being quoted by a particular source of credit are ruling above the international prices or not. But in the case of fertiliser equipment, the situation is slightly different. We do not have such a thing as standard equipment produced for fertiliser plants. We have diverse technologies, diverse sources of equipment, some of these are proprietary equipments, some tied up with brand names and reputations and, therefore, one cannot *ab initio* say that things are strictly comparable. What we have been urging on Government is this that when we put up fertiliser

plants, if we have free foreign exchange we have enormous flexibility in choosing the kind of technology we want and the equipment which suits that technology and also in selecting the producers and suppliers whose order book position enables them to deliver faster to us. This helps to put together a package of equipment which is relevant to the kind of technology selected and helps us to select from the sources which can deliver the fastest. It is for this reason that we did experience some difficulties when we were told that we had to plan a plant based on equipment to be purchased entirely from the U.K. or France or Germany. I believe the Ministry of Finance, Department of Economic Affairs, has now recognised this and we are today getting for more flexibility in the matter of choice of foreign exchange. We also pay for engineering services apart from the equipment.

Secondly, we did go through a period when for very good reasons the Department of Economic Affairs, which was negotiating various loans and credits, often had to change the package to us. In the case of planning of fertiliser projects, even at the planning stage there is quite a time gap in deciding the kind of fertiliser plant you want and the basis of the technology. If you are told that it is tied to a particular source, you make your adjustments. If after a few months this is changed, you begin all over again and this was the intention of the comments we have made that the sources are changed. Since it is not a standard item, I repeat that you cannot merely switch on to another country for buying identical goods. You may have to change your entire concept of the technology and the process which you are contemplating in that particular project.

2.160. In a note furnished to the Committee subsequently in this regard, the Department stated:

“Adequate data is not presently available on the basis of which a definitive conclusion could be taken on the issue that purchase of fertiliser equipment against suppliers’ credit is considerably more expensive than against free foreign exchange, and that the price differential could be anything between 60 per cent to 100 per cent. However, if the Committee so desires, a detailed study would be commissioned to go into this matter in all its aspects.”

2.161. In this connection, the Committee drew attention to certain press reports that in one case of purchase of equipment against credit, the price differential was as high as 800 per cent and desired to know the factual

position in this regard. The Secretary, Department of Fertilisers & Chemicals stated in evidence:

"I doubt the validity of the story that in one case there was an 800 per cent higher cost. This sounds too extraordinary. There have been some cases where higher amounts have been paid.

In recent discussions with Economic Affairs they have indicated to us that even if we pay rates which are marginally or reasonably higher, they would still prefer a tied credit because of the overall foreign exchange position. As to what exactly is a reasonably higher price or marginally high price, we decide on the merits of each individual case. I must mention that in our committee Economic Affairs is represented.

Secondly, we are trying out a specific experiment now which, I think, will bring this to a very sharp focus. In the case of the Trombay V which project now going through, we have issued an invitation to tender on a dual basis. We have asked the tenderers in Western Europe and America to give us two alternative tenders; one based on availability of free foreign exchange and the other based on tied credits from France and UK. Now we are going to get these tenders open in a few months' time. Normally we give three months' time for bidding; they are fairly complicated. But this is the very first time, to my knowledge, that we have asked bidders to give alternative tenders which will throw an immediate light on whether the package based on tied credit is in fact substantially higher-priced than the other. We still maintain with the full support of Economic Affairs that if it is marginally higher, we would still prefer to go in for the tied credit because of the country's foreign exchange position."

2.162. The Committee desired to know whether the full implications of credit purchases had been examined by Government with a view to ensuring that the country was not a loser in the process. In a note furnished in this connection, in consultation with the Ministry of Finance, the Department of Supply stated:

"It is easier to make purchase out of free foreign exchange as the procedure involved is the simplest. But the resources being limited the Government has to resort to purchases under credit. For any particular import the first priority is given to purchase under credit available or under Rupee Payment

arrangements. In case it is not possible to adopt any of these two courses, Ministry of Finance sanctions funds under FFE. The purchase of fertilisers, voluminous as it is, involves huge amounts of foreign exchange. To meet it, judicious mixture of credit, rupee payment arrangements and free foreign exchange is employed, after, of course, striking a balance between optimum procurement and the least strain on resources of the Government.

Except in the case of West Germany, Swedish, IDA and USAID credits generally under most of the credit the procurement is confined to the source country. There is no doubt that Global Tender under FFE may result in an advantageous purchase from the point of view of prices. Nevertheless, the constraint on its availability necessitates confining the purchase to a single source and thereby utilising the credit allocation available from that country. Should such a course not be adopted and FFE is made available for the purchase the result would be non-utilisation of credits as well as straining the resources of the Government. Although the credit financing may involve payment of a slightly higher prices yet the differential generally is marginally taking into account the terms of the credit which is repayable by the Government over a period of time.

In the case of purchase of items like equipments some difference in price may be there depending upon source to source and various other reasons. On the other hand our experience reveals that in case of commodities like fertilisers, foodgrains, news prints etc., a certain international price level is maintained and it is a rare experience to find the price of a commodity in a particular country at point of time above the international level more than marginally.

The rates in different countries generally tend to conform to a level of international price prevailing at a particular period. The marginal variations may of course be there. Normally, the source of financing does not effect the purchase. Fortunately, the instances where the variation in price was not marginal have been very few. But when the soft terms of the credits are taken into account vis-a-vis FFE, the differential is not much and it cannot be said to have resulted in a loss to the Government. Moreover, even in such cases it is possible that the price may not have been lower, had the purchase been made against FFE (if available) instead of credits. Government does bear in mind the possible price differential in making purchases and where, for any reason substantial variation is found, necessary steps are always taken to ensure that we are not the ultimate losers.

In the case of imports from RPA countries a position similar to that of imports under credits, holds good. In this case there is a separate trading and payment arrangements. Here also, while there is generally a common level of prices, even if there is any increase in the case of one country, it gets normally adjusted as a result of the increase in our exports to balance the trade. Therefore, no ultimate loss is involved.

As far as para (vii) of the Audit Report is concerned it may be stated that it refers to purchases of NPK made in May 1972; one under the Canadian Credit and the other under FFE. The Canadian Credit is being extended to the Government of India on the softest terms possible and contains a grant element of as much as 92 per cent. Considering the terms of this credit and the small price differential in the subject case it cannot be said that we had paid a considerably higher price. In other words the difference in price in this instance is only apparent and not real. Moreover, it became necessary to pay higher prices under Canadian Credit as the Department of Agriculture stated that their requirements were urgent. This point was taken note of by the FPC in their meeting on 9-5-1972. In this connection, an extract from the minutes of the FPC meeting held on 9-5-1972 is reproduced below:

'FA had strongly advised against purchasing the second lot of 10,000 tonnes plus 25 per cent from MDPC/ICEC/ESSO for delivery in August 1972 on the ground that the price quoted was very high, viz. Canadian Dollars 74.75 FOB, which was substantially higher than their price for delivery in the first lot in July 1972, and the payment of such a high price likely to have adverse effect on future purchases. The representative of the Department of Agriculture, however, contended that the purchases were of a very urgent requirement and they could not forego this purchase merely on price consideration. In that context, the Committee had agreed to this purchase.'

2.163. The Committee observe that though the Fertilisers and Chemicals Ltd., Travancore, had intimated their requirements of seeding material for the year 1972-73 as early as on 21 July 1971 and the material was also required for use during the Kharif 1972 season, a firm demand for the purchase of NPK grade 15-15-15 for the purpose had been placed only nine months later on 14 March 1972, owing to the "very tight foreign exchange situation" at that time and the consequent necessity to give preference first to the imports of fertilisers required by the State Governments for their agricultural production programmes. As a result of this delay,

apart from paying higher prices for the purchase subsequently on the ground that the requirement of FACT was "also of an urgent and pressing nature" in view of the factory's obligation to the World Bank, the fertiliser could also be shipped only in September 1972 (although it was required in June and July 1972) and could be put to use for the seeding programme of the factory only during the Rabi 1972-73 season. Since the requirement of FACT had admittedly been intimated in July 1971 itself and its urgency should also have been known by then, it is not clear to the Committee why by proper planning this requirement could not have been included in the import programme for 1970-71, when availability of fertilisers was comparatively easier and prices were also lower. The Committee find in this context, from the information furnished in this regard by the Department of Supply that considerable quantities of NPK fertilisers had, in fact, been ordered during November 1971 at prices ranging between 72.15 dollars and 73.14 dollars (C&F) and they would, therefore, seek a more specific clarification in this regard. The delay of over a month between 11 February 1972, when the Department of Economic Affairs informed the Department of Agriculture that the seeding material requirements of FACT should be accommodated within the foreign exchange allocations already made, and 14 March 1972, when the firm demand was placed on the Department of Supply, also needs to be explained more satisfactorily.

2.164. This particular case also appears to indicate that higher prices have to be paid for purchase financed out of loans as compared with the prices paid for purchases in free foreign exchange. Though the Department of Supply have informed the Committee in this connection that generally, by and large, there was not much difference in prices between purchases made on credit and those in free foreign exchange, they have, however, added that while most of the credit purchases were confined to the source country, there was no doubt that a global tender under free foreign exchange might result in an advantageous purchase from the point of view of prices. A similar position also appears to hold good in respect of purchases of fertiliser plant equipment and the Committee understand that there have been some cases where higher amounts have been paid for credit purchases. It has, however, been brought to the Committee's notice that even if prices which are marginally or reasonably higher have to be paid for credit purchases, Government would still prefer purchases against tied credit on account of the need to conserve the country's scarce foreign exchange resources and that while Government bears in mind the possible price differential in making purchases against credit and in free foreign exchange, necessary steps are always taken, when for any reason substantial variation is found, to ensure that the country was not a loser in the process. While the Committee note that assurance given in this connection that the decision whether a particular purchase should be made against credit or in free foreign exchange was taken after considering the merits of each individual case and that in planning for the purchases of fertilisers, involving as it

does large amounts of foreign exchange, a "judicious mixture" of credits, rupee payment arrangements and free foreign exchange was employed after striking a balance between optimum procurement and the least strain on Government's resources, they nevertheless feel that a critical study of the entire question, in all its aspects, with particular reference to the present comfortable position of foreign exchange reserves so as to effect the desired improvements should be undertaken in the purchase strategy in the broader national interest. The Committee would like to be informed of the action taken in pursuance of this recommendation within three months.

2.165. The Committee are informed that as a specific experiment traders for the supply of plant and equipment for the Trombay V project have been invited on a dual basis, one based on the availability of free foreign exchange and the other based on tied credits from France and UK which would indicate whether the package based on tied credit was in fact substantially higher-priced than the other. They would like to be apprised of the outcome of this experiment as well as the conclusions drawn by Government therefrom.

2.166. The present case of purchase of NPK commented upon by Audit as well as the preceding two cases of purchase of urea and NPK also appear to indicate that the present system in which tenders/enquiries are floated periodically after every few weeks has not led to imports on an assured basis and at the most economic prices. The Committee need hardly point out that India being the single largest buyer of fertilisers in the World market, it should be possible to devise most suitable import arrangements, after careful study, which would ensure timely imports at most competitive prices of fertilisers of the requisite quantity and chemical properties. The Committee would like to be informed of the action taken.

2.167. The Committee have also been informed by the Chairman of the Minerals and Metals Trading Corporation that there was indication of tremendous possibilities of imports from the East European countries and that long-term purchases could be made from them under 5-year trade plans. It should be possible to persuade producers/suppliers in the General Currency Areas also to have the similar long-term arrangements in the interest of ensuring that imports are made on an assured basis and at the most competitive prices for meeting the country's fertiliser requirements adequately and in time.

(g) *Purchase by tender as well as negotiations*

Audit paragraph

(i) 2.168. Tenders for 0.50 lakh tonnes of di-ammonium phosphate were invited in July 1972. The rates offered were between \$ 103.50 to \$ 122.50 per tonne (c&f). In August 1972 orders were placed for 0.31

lakh tonnes at the lowest rate of \$ 103.50 per tonne (c&f). The Fertiliser Purchase Committee decided on 17th August 1972 that negotiations should be conducted with other tenderers for reducing the prices for purchase of the balance quantity. According to the tender notice, the total quantity could be increased by 25 per cent, i.e., in all about 0.63 lakh tonnes could be purchased. In other words, the maximum to be purchased by negotiations was 0.32 lakh tonnes. During negotiations in which the tenderers were represented by their Indian agents, in addition to revised offers against the original quotations, some of the agents also submitted new offers. One firm that had not quoted against the original tender enquiry also participated in the negotiations. During the meeting of the Fertiliser Purchase Committee held on 29th August 1972, the representative of the Department of Agriculture stated that it had been indicated earlier that one lakh tonnes should be purchased, but the Department of Agriculture would be happy if further additional quantities could be purchased. After negotiations, 2.44 lakh tonnes more were purchased at rates between \$ 105.25 to \$ 111.50 per tonne (c&f) as against the maximum of 0.32 lakh tonnes which could be purchased by negotiations.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), pp. 106-107, case (viii)]

Audit paragraph

(ii) 2.169. Tenders for di-ammonium phosphate were invited in January, 1973 with the stipulation that on receipt of the offers Government would, if necessary, enter into negotiations. Why this stipulation was made is not easy to understand. Further, neither the quantity nor the period of delivery was mentioned in the tender. The prices quoted were considered to be high. The Director General, India Supply Mission, Washington, stated (January 1973) that, since the tender had indicated the possibility of post-tender negotiations, the suppliers would have kept a cushion in their prices. One of the members of the Fertiliser Purchase Committee stated before that Committee during discussions of the purchase proposal on 13th March, 1973 that, according to information obtained by him during his recent visit to U.S.A., the tenderers had kept a cushion of \$ 3 to \$ 4 per tonne in their quotations and that it should be possible to get reduction to that extent. Against a tender floated by another foreign country about that time (February 1973) prices quoted were between \$ 99.50 to \$ 106.28 per tonne. As a result of negotiations, contracts for 2.63 lakh tonnes were executed in March, 1973, at the rates of \$ 101.75 to \$ 104.50 (f.o.b.) per tonne with suppliers who had quoted earlier \$ 102.00 to \$ 109.80 (f.o.b.) per tonne.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), p. 107, case (ix)]

2.170. With reference to the first case of purchase of di-ammonium phosphate in August, 1972 the Committee were informed by Audit that the Department of Supply had stated (January 1975) as follows:

“As against tenders invited for 0.50 lakh tonnes in July 1972 prices received ranged between \$ 103.50 to \$ 122.50 per MT, C&F. Against this tender . . . orders were placed for 0.31 lakh tonnes at the lowest rate of \$ 103.50 per tonne and subsequently a quantity of 2.50 lakh tonnes was purchased at the rates ranging from \$ 105.45 to 111.50. It is correct that the tenders were issued for a quantity of 50,000 tonnes of di-ammonium phosphate and 50,000 tonnes of Ammonium phosphate with an option to buy an additional quantity of 25 per cent in July 1972. But this large quantity was brought on the basis of negotiations within the ceilings prescribed by the FPC. It became necessary to buy such a large quantity as in the meeting of the FPC held on 29th August, 1972, the representative of Agriculture had indicated the requirement of the Department of Agriculture as 3 lakh tonnes. This purchase was even justified as the subsequent purchase was made at higher price. The industry knew that the Indian delegation was negotiating for the purchase of these items and it was difficult to imagine that any suppliers who had any quantity to offer would not have come forth with the same.”

The Department had further stated:

“It is correct that some of the agents submitted new offers and that one firm who had not quoted against the original tender had also participated in the tender. This was evidently to bring in larger competition . . . It is correct that no uniform date or time for submission of revised new offer was prescribed.”

2.171. The Committee enquired into the reasons for purchasing an additional quantity of 2.44 lakh tonnes when the decision taken in the meeting of the Fertiliser Purchase Committee was only for the coverage of the balance quantity for which tenders had been called for initially. The Committee also desired to know the reasons for increasing the quantity during the period when the tenders were under consideration. The representative of the Department of Agriculture replied in evidence:

“The Agriculture Ministry had indicated its import requirements for Rabi 1972-73 at 4.06 lakh tonnes which amounted to 8.9 lakh tonnes of ANP. But, because of the very tight foreign exchange position, only 5 million was allocated under free foreign exchange for purchase of this. This was adequate for the

purchase of 0.50 lakh tonnes. Subsequently, the Department of Economic Affairs authorised the purchase with an option to buy an additional quantity under free foreign exchange. So, the total quantity from this subsequent piece-meal allocation which we could have purchased came to 2.50 lakh tonnes. So, this is all against the annual requirement of 8.8 lakh tonnes. So, at the time when the tender was opened, it was found that more quantity was available and for this more foreign exchange was made available. We should be glad to inform you that we would be happy if more quantity could be purchased."

The representative of the Department of Supply stated in this context:

"As regards the planning, she has explained what their demand was and how it increased. But, as far as the Purchase Committee is concerned, I will indicate the sequence of events. Tenders were invited for a quantity of 50,000 tonnes of di-ammonium phosphate and 50,000 tonnes of Ammonium Phosphate with an option to buy an additional quantity of 25 per cent. Tenders were issued on 17th July, 1972 and opened on 8th August, 1972. They were considered by the Fertiliser Purchase Committee on the 17th August, 1972. The decision was as follows:

The Committee then took up for consideration the global tenders invited for the purchase of Ammonium Phosphate and Di-Ammonium Phosphate and for urea. It was pointed out by Shri. that the offer for Ammonium Phosphate was considerably higher than the offers received for DAP on the basis of cost per nutrient. It was, therefore, decided that while no A.P. should be purchased, a quantity of 100,000 tonnes of DAP might be purchased. The lowest offers for DAP were from the following three firms which were accepted:

Name	Quantity	FOB C&F Price
1 M/s. Shaw Wallace/Sheerritt Corden-Canada	6,000 + 10%	92'00/103'50
2 M/s. Shaw Wallace/Cominco, Canada	12,000	92'00/103'50
3 Mitsubishi/Korea	10,000 + 25%	96'25/103'50

These offers would make up a quantity of 31,100 M.T. For the balance quantity it was decided that in addition to the above

three suppliers, all the other suppliers may be called for negotiations and an effort made to persuade them to reduce the prices to the extent possible'.

This was the decision taken, to buy 1 lakh tonnes of DAP and, for that purpose, to call all the tenderers and negotiate with them. Because the three lowest had already accounted for 31,000 and odd tonnes, for the balance it was decided that negotiations should be held. This was the decision of the Committee. After that, there was some noting on the file which also I would like to read out.

The Fertiliser Purchase Committee in its meeting on 17th August decided that all the firms which had quoted against tenders should be asked to come for negotiations. The negotiations were conducted with all the firms on 28th August. The results of the negotiations were discussed in the meeting on 29th August 1972 when the Committee decided that the offers received upto the price of 111.50 dollars c & f should be accepted.

At the same meeting of the Committee, the representatives of the Department of Agriculture agreed that they would have no objection to the purchase of more quantities than 1 lakh tonnes which they had decided to purchase earlier.

The representative of the Department of Agriculture also confirmed that although in the tender they had asked for deliveries upto February 1973, they would have no objection if the deliveries were extended further by 2-3 months.

Then, there is the list of offers received within the ceiling of 111.50 dollars. After discussion, this was an interim sort of note put up to the Secretary and seen by the Financial Adviser."

A note subsequently furnished in this regard by the Department of Supply is reproduced below:

"Tenders were invited for purchase of 50,000 MT of Ammonium Phosphate and 50,000 MT of DAP. However, after opening of tenders, the FPC in their meeting on 17th August, 1972 had decided that while no Ammonium Phosphate be purchased, a quantity of 100,000 tonnes of DAP might be purchased as it was pointed out by Department of Agriculture that offer for Ammonium Phosphate was considerably higher than the offers received for DAP on the basis of cost per nutrient. It was decided by the FPC that the three lowest offers for DAP for a total quantity of 31,100 MT be accepted and for the balance

quantity in addition to these three suppliers, all the other suppliers may be called for negotiations and an effort made to persuade them to reduce the prices to the extent possible. The decision of the FPC to 'purchase balance quantity by negotiations' pertained to the balance quantity of 68,900 MT *i.e.* one lakh MT minus 31,100 MT covered on lowest tenderers, and not to 0.32 lakh MT. Later, at the FPC meeting held on 29th August, 1972 (para 6) the representative of the Department of Agriculture stated that any additional quantity over one lakh MT earlier indicated by them would be welcome and that for this purpose deliveries could, if necessary, be extended beyond February 1973 which had been indicated in the tender notice. A requirement of 3 lakh MT was also mentioned, *vide* para 3 of the minutes of the FPC meeting of 29th August, 1972. The Department of Agriculture later, *vide* D.O. dated 13th September, 1972 indicated that they required 8 lakh MT of DAP to be shipped by September 1973, at the latest. Thus the actual requirements progressively increased, and the quantity ultimately purchased in fact fell short of the 8 lakh MT which was indicated by Agriculture Department in September 1972."

2.172. At the instance of the Committee, the Department of Supply have furnished a statement showing details of the firms, quantity ordered, rates originally quoted, rates accepted as a result of negotiations, dates on which orders were placed, delivery schedule stipulated and dates on which actual deliveries effected (specifying the quantity) relating to the purchase of di-ammonium phosphate during August-September, 1972. The statement is at Appendix X.

2.173. As regards contracts executed by negotiations for purchase of 2.63 lakh tonnes of di-ammonium phosphate in March, 1973 at rates varying between 101.75 and 104.50 dollars per tonne (f.o.b.) with suppliers who had quoted earlier 102.00 to 109.80 dollars per tonne (f.o.b.), the Department of Supply has furnished a statement giving details of firms, quantity ordered from each of them, rates originally quoted, rate accepted finally as a result of negotiations, date(s) on which orders were placed, delivery schedule stipulated and actual deliveries effected, specifying the quantity in respect of this purchase (Appendix XI).

2.174. At the instance of the Committee, the Department of Supply furnished the relevant extracts of the minutes of the meeting of the FPC held on 17th August, 1972 and 29th August 1972 relating to this purchase as well as the extracts of the relevant notes in the Department's files referred to during evidence, which are reproduced in Appendix XII. The Committee found from the Department's Note dated 1st September 1972, that including

the quantity of 31,100 tonnes accepted earlier on 17th August, 1972, a total quantity of 1,15,100 tonnes was proposed to be purchased as a result of the subsequent negotiations. A further quantity of 32,000 tonnes (15,000 tonnes at 110.24 dollars per tonne C&F and 17,000 tonnes at 110 dollars per tonne (C&F) had also been accepted subsequently on 2 September 1972 as these offers were within the ceiling of 111.50 dollars per tonne C&F agreed to by the Fertiliser Purchases Committee and had been received within the validity period of the tender. The Committee also found from the information furnished separately by the Department of Supply that further quantities of 75,750 tonnes (at prices ranging between 106.75 to 111.50 dollars per tonne C&F) and 55,000 tonnes (at prices ranging between 110.00 to 111.50 dollars per tonne C&F) had also been ordered in September 1972, to be shipped respectively during September 1972 to March 1973 and September 1972 to January 1973. Thus, in all a total quantity of 2.82 lakh tonnes of di-ammonium phosphate appears to have been ordered in August-September, 1972. According to the information furnished to the Committee by the Department of Supply, the ruling domestic price of DAP in USA in March 1972 ranged between 71 and 77 dollars per tonne f.o.b. and was 85 dollars per tonne f.o.b. in Canada, when a quantity of 1,27,200 tonnes had been ordered at prices ranging between 78.17 dollars to 85.90 dollars per tonne f.o.b.

2.175. The Committee enquired into the reasons for entering into negotiations after the opening of tenders as, by this process, the tenderers would have known the rates quoted by others. The representative of the Department of Supply replied:

“I would submit that conducting negotiations with all the tenderers for the purpose of reducing the price is not altogether unusual.”

When the Committee pointed out that the tenderers were competitors to each other, the witness replied:

“Yes. But that kind of negotiation is done by the DGS&D. If they find that the general level of quotation is very high, they call all the people and negotiate with them.”

2.176. Since the Fertiliser Purchase Committee had decided on 29th August 1972 that offers upto \$ 111.50 C&F should be accepted, the Committee desired to know the basis on which this ceiling was arrived at. In a note, the Department of Supply stated:

“Secretary (Supply) mentioned in the FPC meeting on 29th August 1972 that negotiations had been held with the local representatives of the firms who had quoted for DAP. While some of them had offered interim reduction, most of them had stated that the final position would be intimated within the next day or two. The FPC after some discussion decided that offers

upto a ceiling of \$ 111.50 should be accepted. The figure of \$ 111.50 itself is not mentioned in the minutes of the FPC, apparently in order to keep it confidential. No reasons to justify this 'ceiling' are on record."

2.177. Since a larger quantity than had been originally envisaged had been purchased through negotiations, the Committee asked whether it would not have been possible to obtain lower offers by calling for fresh tenders. In a note, the Department of Supply replied:

"It is observed from para 1 of the minutes of the FPC meeting held on 17th August 1972 that assessment of the availability/price pattern for fertilisers in the international market was given by the Secretary (Supply) as a result of Fertilisers Delegation's discussions in U.K., Europe and Kuwait. In this assessment, the Secretary mentioned fast disappearance of fertilisers in general and increase in prices out of all proportions during the previous few weeks. It was presumably in this background that the FPC decided that negotiations should be held to cover the balance quantity."

2.178. Since, in the second case of purchase (January 1973), a some what unusual stipulation that negotiations would be entered into, if necessary, on receipt of the offers had been included in the tender enquiry, the Committee enquired into the reasons therefor and desired to know who had taken the decision. The representative of the Department of Supply stated in evidence:

"This decisions was taken in the meeting of FPC on 17th January 1973, and I will read out the relevant portion:

'As regards the purchase of DAP, Secretary read out the cable received from ISM, Washington in which the DG had advised that the purchased of DAP should be by floating a tender. Shri mentioned that it had come to his knowledge that some firms had cornered the stocks. Some firms had also advised him that while they would be prepared to enter into negotiations, they were reluctant to quote against a tender. Secretary (Supply) stated that he had also received overtures and indications had been given to him that if a tender was floated, very high prices would be quoted. Secretary (Supply) felt that normally he would have preferred to float a tender and then negotiate. In view, however, of the prevailing situation, it was decided that instead of floating a public tender, all the firms known to us should be invited to submit offers which could be followed by negotiations'.

2.179. The Committee desired to know by whom and at what level the decision to incorporate the situation that negotiations would be entered into on the receipt of the offers, in the tender enquiry itself was taken. In reply, the Department of Supply have furnished the following note:

“A stipulation was made in the Tender Enquiry that on receipt of offers the Government of India would, if necessary, enter into negotiations. This was done with the approval of Secretary (Supply) and Financial Adviser (Supp'y Wing).”

2.180. The Committee are surprised to note that somewhat unusual procedures had been adopted in these two cases of purchase of di-ammonium phosphate. While in the first case relating to purchases made during August-September 1972, apart from increasing the quantity to be purchased from 1 lakh tonnes to 3 lakh tonnes after the offers had been considered and post-tender negotiations had also been concluded, the negotiations had been conducted not only with these suppliers who had initially responded to the tender enquiry but also with two other firms (Interore Occidental and Mitsui/National Phosphates) who had not quoted against the original enquiry and no uniform date or time for submission of revised/new offers had also been prescribed. In the second case of purchase (January 1973) for some inexplicable reason, an unusual stipulation that there would be negotiations on receipt of the offers had been included in the tender enquiry itself.

2.181. Explaining the reasons for increasing the quantity to be procured when the offers were under consideration, the Department of Agriculture have stated that the foreign exchange of 5 million dollars initially authorised by the Department of Economic Affairs was adequate only for the purchase of 0.50 lakh tonnes of di-ammonium phosphate and 0.50 lakh tonnes of ammonium phosphate in respect of which tenders were invited in July 1972 (this had been revised later to 1.00 lakh tonnes of di-ammonium phosphate only by the Fertiliser Purchase Committee on 17 August 1972), and that when additional foreign exchange was authorised subsequently, they had informed the Fertiliser Purchase Committee that they would have no objection if quantities in excess of 1 lakh tonnes could be purchased. It, however, appears from the sequence of events relating to fertiliser purchase during 1972-73, which have been discussed in some detail in the earlier sections of this chapter, that though the foreign exchange of 5 million dollars had been authorised by the Department of Economic Affairs on 30 December 1971 and additional foreign exchange of 46 million dollars and 15 million dollars had been made available respectively on 31 January 1972/4 February 1972 and 14 March 1972, the increased requirements had been communicated only on 29 August 1972. It is, therefore, not very clear to the Committee why procurement action could

not have been initiated in respect of the entire quantity of 3 lakh tonnes earlier than July 1972. Even of some delay in this regard had been inescapable, at least the additional demand could have been placed in July 1972 itself, if not earlier, when tenders for 0.50 lakh tonnes were invited. It is also significant in this context that in March 1972, the ruling domestic price of di-ammonium phosphate ranged between 71 dollars and 77 dollars per tonne f.o.b. in USA and was 85 dollars per tonne f.o.b. in Canada as against the lowest offers of 92 dollars per tonne f.o.b. and 93.45 dollars per tonne f.o.b. obtained respectively from Canadian and US suppliers in August 1972. It would, prima facie, appear that by better planning and market intelligence and by more effective coordination between the Department of Agriculture and Supply, it should have been possible to place demands for the entire quantity ab initio and also to expedite the procurement action so as to take advantage of the more favourable market conditions prevailing earlier. Besides, in view of the fact that normally smaller quantities command higher prices and the larger the quantity the more competitive the offers would be, this might have also resulted in better offers than what were obtained by resorting to piece-meal purchases. Stressing, therefore, once again the importance of proper planning of imports, the Committee would urge the Department of Agriculture to streamline the procedure in this regard.

2.182. The Department of Supply have sought to justify the decision on hold negotiations with the suppliers after the opening of the tenders on the ground that the adoption of such a procedure for the purpose of reducing the price was not "altogether unusual" and was resorted to even by the Directorate General of Supplies & Disposals if the general level of quotation was very high. The Committee are, however, unable to appreciate the rationale for accepting without negotiations the offer of 103.50 dollars per tonne (C&F) quoted by three of the firms, which was also considerably higher than the prices prevailing earlier and confining the negotiations only to the balance quantity of 68,900 tonnes (1 lakh tonnes minus 31,100 tonnes ordered on three of the firms). If at all the quotations had been considered high, the logical course would have been to negotiate with all the suppliers. The reasons for accepting the subsequent offers of two firms who had not responded initially to the tender enquiry are also not easy to understand. In this connection, the Committee find from the minutes of the meeting of the Fertiliser Purchase Committee held on 17 August 1972 and the notes dated 1 September 1972 in the relevant file of the Department of Supply that the post-tender negotiations for the balance quantity of 0.69 lakh tonnes were to be held only with those suppliers who had quoted in response to the original enquiry and that the offers of these two firms had not been referred to the Fertiliser Purchase Committee but had been approved at the level of the then Secretary, Department of Supply.

2.183. In the absence of any recorded reasons, the Committee have also not been able to satisfy themselves about the reasonableness of the ceiling of 111.50 dollars per tonne (C&F) decided upon by the Fertiliser Purchase Committee on 29 August 1972.

2.184. Similarly, in respect of the second case of purchase, the Committee find that at the meeting of the Fertiliser Purchase Committee in January 1973, the Secretary (Supply) read out a cable received from ISM, Washington, in which the Director General had advised that purchase of Di-Ammonium Phosphate (DAP) should be by floating a tender. Shri Ramachandran, the then Chairman, Minerals and Metals Trading Corporation, mentioned that it had come to his knowledge that some firms had cornered the stocks. Some firms had also advised him that while they would be prepared to enter into negotiations, they were reluctant to quote against a tender, Secretary (Supply) had stated that he had also received overtures and indications had been given to him that if a tender was floated, very high prices would be quoted. The Committee note that the Fertiliser Purchase Committee thereupon decided that instead of floating a public tender, all the known firms should be invited to submit offers which could be followed by negotiations. To a specific enquiry of the Committee as to at what level the decision was taken to incorporate the stipulation that negotiations should be entered into on the receipt of the offers, the Department of Supply have stated that "this was done with the approval of the Secretary (Supply) and Financial Adviser (Supply Wing)". Even conceding that this decision was justified in view of the then prevailing situation, the Committee consider it strange that, as decided by the Secretary (Supply) Financial Adviser this stipulation should have been made known to the suppliers in the tender enquiry itself by the Department of Supply. Admittedly, since the tender had indicated the possibility of post-tender negotiations, the tenderers had kept a cushion in their quotations. This is also borne out by the fact that while rates ranging between 102.00 dollars and 109.80 dollars per tonne (f.o.b.) had been quoted against this enquiry, prices ranging between 99.50 dollars and 106.28 dollars per tonne were quoted against tenders floated by another foreign country about that time (February 1973)

2.185. Since the manner in which these two purchases were handled has given rise to serious misgivings in their mind, the Committee desire that Government should conduct a thorough probe into these cases with a view to ensuring that no mala fide intentions were involved. Lessons should also be drawn for the future and necessary improvements brought about in the purchase strategies and procedures.

(h) *Purchase through a single tender.*

Audit paragraph

2.186. After negotiations with only one foreign supplier, in April 1973 a contract for supply of 5,000 tonnes of sulphate of potash (SOP) required

for tobacco crops was placed on that supplier for supply from foreign country 'A'. Published statistics show that upto 1966-67 this fertiliser had been purchased from four other foreign countries including country 'B'. Thereafter, during 1969-70 and 1970-71, this fertiliser was purchased from country 'B' only. Thereafter purchase was made from country 'A' in 1973 as mentioned above. The purchase in 1973 was in free foreign exchange. Time available was also sufficient, as the tobacco season for which this fertiliser was required was to begin in September-October 1973. The stock position also was comfortable, as the stock in hand at the end of 1972-73 was 7,633 tonnes as against the average annual distribution of 6,716 tonnes during the preceding three years (only 3,737 tonnes in 1972-73). Thus, instead of purchase after negotiations with only one supplier, tenders could have been called and competitive rates obtained.

2.187. Department of Supply has stated (January 1975) that the producers of countries 'A' and 'B' are represented by a certain firm to whom reference is made for quotations.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), pp. 107-108, (x)]

2.188. With reference to the Audit paragraph, the Department of Supply was understood to have informed Audit (January 1975) as follows:

“The two main producers are France and Germany. Both these countries are represented by M's. Potash Fertilisers to whom reference is made for quotations. When they quote from only one country, it is implied that other country has no material to offer. It was only in this background that only one offer was received and an order was placed on it accordingly”.

The Department had, in April 1975, further stated:

“If an offer of S.O.P. from one country is submitted by Indian Agent (M's. Potash Fertilisers have got a branch in Bombay), it is presumed that the other country has no material to offer. In view of this, the observation of Audit that in order to obtain competitive prices, tenders could have been called in this case does not appear to be sound.”

2.189. The Committee enquired into the reasons for the Department of Supply issuing a single tender enquiry when Sulphate of Potash was available with other countries also and purchases had also been made from other countries in the past. In a note, the Department replied:

“According to the information available with this Department, Sulphate of Potash was available in Europe from France, Germany,

Belgium and Italy. There was only one selling agent for all the four manufacturers i.e., M/s. Potash Fertiliser Ltd., London who had a branch office in Bombay under the same name. SOP mined in France was processed in Belgium and it could be sold against the French Credit and negotiations applied automatically to the Belgian product. Italian Sulphate of Potash mined in the Province of Sicily used to be exported through M/s. Seifa, Italy whose agents were Potash Fertilisers Ltd., London.

It will be seen from the above that advertised tender enquiry for Sulphate of Potash would not have yielded any better results."

2.190. The Committee desired to know the reason for resorting to single tender purchase when the time available for purchase was sufficient and the stock position was also comfortable. The representative of the Department of Agriculture stated in evidence:

"Sulphate of potash is a particular production which is required only for one crop in one area in the country, i.e. Virginia Tobacco grown in Andhra Pradesh. We estimated our requirements. The annual distribution was about 7,000 tonnes during the preceding three years, but as this Virginia tobacco was going out, we wanted about 10,000 tonnes. Of course, in October we had 7,623 tonnes, but we wanted another four or five thousand tonnes. This was a particular product required for curing."

2.191. When asked why special concern had been expressed over tobacco, which was, in any case, a non-food item, the witness replied:

"Because it is an export item."

She added:

"This was a foreign-exchange earner, i.e., Virginia tobacco, for which this was required."

2.192. The Committee note that though the purchase of sulphate of potash required for use in the tobacco season commencing in September-October 1973 was to be made in free foreign exchange and there was also adequate time for making the purchase with the stock position being comfortable, a contract for 5,000 tonnes had been placed after negotiations with only one foreign supplier, instead of obtaining competitive rates through tenders. It has, however, been contended by the Department of Supply that an advertised tender enquiry would not have yielded any better results in view of the fact that all the four manufacturers of sulphate of potash in Europe (located in France, Germany, Belgium and Italy) were re-

presented by one single selling agent (Potash Fertilisers Ltd., London) and that if an offer of the fertiliser from one of the countries was submitted by the agent, the presumption was that the other countries did not have any material to offer. Such a presumption without actually testing the market or verifying the actual position does not appear to be prudent and the Committee would, therefore, like to know whether in fact any independent enquiry in this regard was made by the Department of Supply through the Indian Missions abroad or from the producers themselves and if so what was the response thereto.

2.193. Since the selling agent appears to have a complete monopoly of sales of sulphate of potash and could, therefore, dictate his own terms and conditions, the Committee see no reason why Government cannot deal directly with the producers thus eliminating the middleman agent and ensure better terms, as has already been recommended by the Committee in paragraphs 1.60 and 1.61 of their 160th Report (Fifth Lok Sabha). Now that all imports of fertilisers, both from Rupee Payment and General Currency Areas, have been entrusted to the Minerals and Metals Trading Corporation, the Committee would like concrete steps to be taken in this regard. Besides, with a view to reducing our dependence on imports of potassic fertilisers, efforts should also be directed towards finding newer methods of potash recovery from all available sources within the country

(i) *Purchase of Ammonium sulphate.*

Audit Paragraph.

2.194. Certain offers for supply of ammonium sulphate were received by the Department of Supply in the later half of 1972 and the first half of 1973. No tenders had been invited from them and the offers were allowed to lapse. Subsequently, on 18th July 1973, it was decided to negotiate with those of the suppliers who had offered delivery during 1973. Their representatives were accordingly called on 19th July, 1973 for ascertaining the availability and prices. As against 14 offers covering about 7 lakh tonnes received originally (out of which 8 offers covering about 2.6 lakh tonnes were for delivery during 1973), only the following four offers were received on that occasion:

Country of origin	Tonnes offered	Rate per tonne
'P'	30,000 (bulk)	\$35.00 approximately (f.o.b.)
'Q'-Offer No. 1	10,000 (in polypropylene bags)	\$72.45 approximately (C&F)
'Q' Offer No. 2	10,000 (bulk)	\$65.80 approximately (c&f)
'R'	10,000 to 15,000 (bulk)	\$41.75 (f.o.b.)

2.195. It was decided in July 1973 to accept the offer of 'P' and the second offer of 'Q'. One of the earlier offers that had been allowed to lapse was for 50,000 tonnes (bulk) at the price of approximately \$ 32.33 (f.o.b.) valid upto 10th April 1973. Had 40,000 tonnes ordered on 'P' and 'Q' (against the second offer) in July 1973 been purchased against this earlier offer, there would have been saving of about \$ 3.27 lakhs (Rs. 24.5 lakhs approximately).

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), p. 108, case (xi)]

2.196. The Committee learnt from Audit that the position in regard to the purchase of dilute fertilisers in 1972 and 1973 had been explained as follows by the Department of Agriculture, in February 1975:

"The policy of this Department has been to avoid the import of dilute fertiliser as far as possible. However, there has been constraints which necessitated the import of dilute fertilisers in the past. Some times dilute fertilisers are offered against gifts or credits. Such offers have had to be accepted owing to the very tight foreign exchange position. During the year 1973-74, there was a world-wide shortage of fertiliser. Efforts were made to import as much of the fertiliser as possible in the form of concentrated fertilisers. There were also shortfalls in imports from Rupee Payment Areas. The shipment schedules were also not adhered to in some cases. As a result, it became necessary to import dilute fertilisers, to an extent greater than that envisaged originally. It may also be mentioned that the import of fertilisers were dependent upon the availability of foreign exchange, which is released in instalment from time to time."

2.197. In regard to this specific case commented upon by Audit, the Department of Supply had stated (April 1975) as follows:

"The facts stated by the Audit are correct. In this case it is a fact that the suppliers who offered ammonium sulphate originally were asked a number of times to extend their offers. Many suppliers refused to extend their offer finally after they have done so once or twice. The basic issue involved here is as to why the material was not purchased against the offers. In this connection, this Department have following comments to offer:

'A meeting of the Committee of Economic Secretaries was held on 4th January 1973 in which it was decided that suit-

able varieties of dilute fertilisers could be imported, if necessarily, within the allocation of funds already made available by the Department of Economic Affairs. But by that time all the funds made available had been utilised for the import of higher content fertilisers. Therefore, the question of importing any dilute fertilisers did not arise even when the requirements of the Department of Agriculture could not be fully met.

However, a number of offers for the supply of Ammonium Sulphate and CAN had been received and the Department of Agriculture were therefore requested to examine whether they were interested in the import of any quantity of these fertilisers to make up the short-fall in the import of N. Against this background the Department of Agriculture took up the matter with the Cabinet Secretariat and a meeting was held on 9th May 1973 with them. The intention of the Department of Agriculture was that in order to meet the requirements additional funds should be made available for the purchase of dilute fertilisers like ammonium sulphate, CAN etc. In the minutes of the meeting of the Committee of Secretaries held on 9-5-1973 it has been recorded that additional requirements for Rabi 1973-74 should be clubbed together with the allocation for Kharif 1974 so that there could be greater scope for manoeuvrability in arranging the purchases as also the delivery schedule. This Department took this to mean that the allocation of funds to be made by the EAD for the procurement of fertilisers for 1974 would include a cushion for the procurement of certain quantities of dilute fertilisers to be delivered during 1973. In view of this decision the question of considering the offers already received for Ammonium Sulphate and CAN etc. did not arise. Thus it will be clear that the offers already received by this Department could not be considered as the necessary funds required for the purchase of fertilisers (dilute) had not been made available. In view of this it cannot be said that any offer was allowed to lapse by this Department. On the contrary this Department tried its level best to persuade the supplier to keep their offer open for as much period as possible, so that necessary action regarding their acceptance could be taken in case necessary funds were made available to this Department for the purchase of dilute fertilisers."

2.198. The Committee desired to know the circumstances in which it had not been possible to arrive at an earlier decision in regard to the purchase of dilute fertilisers keeping in view the world market conditions. In

a note, the Department of Supply stated as follows:

“It is correct that certain offers for supplies of Ammonium Sulphate were received in this Department in the later half of 1972 and 1st half of 1973. At the time this Department received these offers no funds were available for purchase of dilute fertilisers. However, this Department tried its best to persuade the suppliers to keep their offers open till such time as funds could be made available. Many suppliers extended their offers two or three times but refused further extension after that. From the note dated 27-3-1973 of Sri. . . . it is observed \$ 46.795 million were available with us and it was not known as to what amount had been utilised by the Delegation for purchase of DAP and TSP. In his note dated 28-3-1973 ShriSecretary (Supply) stated that ‘At present no funds are available for the purchase of dilute fertilisers, since the entire unspent amount was utilised by us for the purchase of DAP’.

On 15-1-1973, the balance of allocation for purchase of fertilisers was \$ 64.58 million under FFE and \$ 8.5 million credit from Japan, Italy, Belgium. Upto 28-2-1973, this Department placed contracts for S 17.785 million under FFE and S 8.5 million under credit. Therefore, balance FFE on 28-2-1973 came to S 46.795 million. Between 17-3-1973 and 28-3-1973, the Delegation finalised purchases of 260,000 MT of DAP from USA and 50,000 MT urea from Kuwait and 40,000 MT urea from Saudi Arabia. The total value of the purchases made by Delegation was S 45.49 million. Thus the balance FFE left after the delegation came back was only S 1.305 million, which was evidently kept for miscellaneous adjustments.

FPC considered the various offers and decided that suppliers be asked to extend their offers as it would take some time to decide. Meanwhile, Agriculture Department had to process the case for allocation of funds for purchase of dilute fertilisers.

On 27-4-1973, Secretary (Supply) wrote a d.o. letter requesting Secretary (Agriculture) to arrange allocation of funds for purchase of dilute fertilisers, and also to indicate the quantity of

Ammonium Sulphate required. In d.o. dated 24-5-1973, Secretary (Supply) wrote to Secretary (EAD) that this Department had received a number of offers of ammonium sulphate and CAN but could not consider these offers as there was no allocation of funds. Some of these offers had already lapsed. D.O. dated 21-6-1973 received from Director (AC), Department of Economic Affairs, Ministry of Finance revealed that Finance Minister had agreed that from 1973-74 allocation of \$ 280.45 million, \$ 15 million could be utilised for the import of dilute fertilisers.

After getting this information, the suppliers' representatives were called for negotiations on 19th July, 1973. A decision to purchase dilute fertilisers totalling 30,000 MT from Italy and 10,000 MT from Kuwait was taken on 20-7-1973".

2.199. The Committee regret to note that purchases could not be made against certain attractive offers for the supply of ammonium sulphate received in the later half of 1972 and the first half of 1973 mainly on account of paucity of foreign exchange at the relevant time, and that when purchases were subsequently made possible on release of additional foreign exchange by the Department of Economic Affairs in June, 1973, only lesser quantities at considerably higher prices could be procured. Though it has been contended by the Department of Supply that the offers earlier received by them could not be considered as the necessary funds required for the purchase of dilute fertilisers like ammonium sulphate, CAN, etc. had not been made available, the Committee find that some concrete steps to press for the allocation of additional funds had been taken by the Department of Agriculture only on 9 May, 1973 when this question was taken up with the Cabinet Secretariat in spite of the fact that the decision to import suitable varieties of dilute fertilisers to meet the shortfalls in the procurement of higher analysis nitrogenous fertilisers by the Minerals and Metals Trading Corporation had been taken by the Committee of Economic Secretaries on 4 January, itself. That the imports from East European countries would be far less than estimated earlier had also become evident as early as in June, 1972 itself. Besides, as has also been pointed out earlier in paragraph 2.142, it should have been possible to anticipate the shortage of fertilisers in the international market and take timely remedial measures. It is unfortunate that proper advantage was not taken of the offers received and expeditious action taken to process the case for allocation of additional funds for the purchase of dilute fertilisers. Now that the procedures for the allocation of foreign exchange for imports of fertilisers are stated to have been stream-

lined, the Committee expect that purchases from abroad would be planned properly keeping in view the world market conditions and instances such as have been highlighted by Audit would not recur.

(j) *Purchase of Dilute Fertilisers*

Audit Paragraph

2.200. Government of India has been reluctant to import dilute fertilisers like calcium ammonium nitrate and ammonium sulphate on the ground that the cost of such fertilisers per unit of plant nutrient is higher than that of urea, which is a concentrated fertiliser. According to the assessment of the Ministry of Agriculture, in terms of nitrogen these dilute fertilisers cost about 25 per cent more than urea. Moreover, in view of the lesser bulk because of its concentrated nature, use of urea in lieu of calcium ammonium nitrate or ammonium sulphate entails lesser expenditure on handling, transport, storage, etc.

2.201. On a number of occasions since 1970 Government has reiterated that use of calcium ammonium nitrate should be discouraged and it should be substituted by urea. Nevertheless, imports of calcium ammonium nitrate progressively increased upto 1972-73 and only in the next year there was a sharp decline as will be seen from the following table:

Year	Tonnes imported
1969-70	83,394
1970-71	2,79,842
1971-72	3,14,195
1972-73	3,18,113
1973-74	1,83,435

2.202. Quantities of calcium ammonium nitrate received as gift, and purchased against free foreign exchange and credits during 1969-70 to 1973-74 were as follows:

(Lakh tonnes)

Year	Gift	Free foreign exchange	Credit	Total
1969-70	0.32	..	0.51	0.83
1970-71	0.35	..	2.45	2.80
1971-72	..	..	3.14	3.14
1972-73	..	..	3.18	3.18
1973-74	0.27	0.10	1.46	1.88

2.203. The principal reason for continuance of import of calcium ammonium nitrate, it has been stated, is the Indian farmer's preference for it.

2.204. When the matter was discussed in the meeting of the Committee of Economic Secretaries in December, 1971, it was stated on behalf of the Department of Agriculture that import of this fertiliser would be completely phased out in the next five or six years, but in the intervening period there was no escape from imports so that together with indigenous production the consumer preference could be matched.

2.205. A foreign commercial concern, which is a combine of most of the major West European producers of nitrogenous fertilisers, had done over the years considerable work in India for promoting use of this fertiliser by Indian farmers. Ultimately, under directions of Government of India the foreign commercial concern stopped its promotional work in India in 1972. Whether adequate efforts are being made by Governments in India to wean farmers away from use of this fertiliser merits consideration.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), pp. 111-112]

2.206. The Committee were informed by Audit that with reference to this Audit comment, the Department of Agriculture had stated (February, 1975) as follows:

"The entire import of Calcium ammonium nitrate during the period 1969-70 to 1971-72 was against gifts and credits. During the year 1972-73...there was an acute shortage of fertiliser all over the world. As a result, it became necessary to import Calcium Ammonium Nitrate when no other suitable nitrogenous fertiliser was available to bridge the gap in the availability of CAN. Even now, efforts are being made to keep the import of CAN as low as possible."

2.207. According to the Department of Supply, the following quantities of CAN were contracted for during 1974-75 and 1975-76:

(In lakh tonnes)

Year	Free Foreign Exchange	Credit including RPA	Gifts	Total
1974-75	1.93	1.75	0.30	3.98
1975-76	0.51	1.77	..	2.28

2.208. As regard the consumer preference for CAN, the Committee were given to understand that the Department of Agriculture had informed (February, 1975) Audit as follows:

“As regards the consumer preference for Calcium Ammonium Nitrate this has not been merely due to the promotional work done by a European concern (The reference is presumably to M/s. Nitrex). Calcium Ammonium Nitrate is being produced by the Nangal Fertiliser Factory, the only unit in Punjab State manufacturing fertilisers. Calcium Ammonium Nitrate is also being produced by the fertiliser factory of Hindustan Steel factory at Rourkela. The production figures of these two factories during the period from 1969-70 to 1972-73 are given below:

Production (actual of Calcium Ammonium Nitrate).

(In thousand tonnes)

	1969-70	1970-71	1971-72	1972-73
1. Nangal	317	215	223	214
2. Hindustan Steel, Rourkela	122	96	186	194

The indigenous production of Calcium Ammonium Nitrate has also resulted in a definite consumer preference for this fertiliser. However, efforts are being made to substitute the import of this fertiliser by that of more concentrated nitrogenous fertilisers as far as possible.”

2.209. The following table, furnished at the Committee's instance by the Department of Agriculture indicates the domestic production of CAN at Nangal and Rourkela in 1973-74 and 1974-75:

Year	Domestic production
	(In lakh tonnes)
1973-74	4.31
1974-75	4.06

2.210. The Committee enquired into the reasons for purchasing CAN during the period from 1969-70 to 1975-76, if Government's intention was to discourage its use. In a note, the Department of Agriculture replied:

“During 1969-70 to 1972-73 the entire import of CAN was against gifts and credits including rupee payment areas on the terms of the bilateral trade agreements with the countries in the Rupee Payment Area. During 1973-74, a very nominal quantity of 0.10 lakh tonnes of CAN was purchased under Free Foreign Exchange as there was an acute shortage of fertilisers all over the world and as it was not possible to import adequate quantities of urea. It, therefore, became necessary to import CAN when no other suitable high analysis nitrogenous fertiliser was available to bridge the gap in the availability of N. In the circumstances, a decision was taken that limited import of dilute fertilisers could be considered if available at reasonable rates so that agricultural production in the country did not suffer for want of fertilisers.”

2.211. The Committee desired to know the steps, if any, taken by Government to wean away the farmers from the use of dilute fertilisers. In a note,* the Department of Agriculture stated:

“While deciding the future product pattern, the production of high analysis fertilisers like urea and NP/NPK complex fertilisers has all along been recommended by this Ministry for any new plant proposed to be set up. Since the introduction of high yielding varieties which lead to an increase in fertiliser consumption, the State Government have been advised to use higher analysis fertiliser like urea and NP/NPK fertilisers. They have been specifically advised to do away with the use of dilute fertilisers like ammonium sulphate and CAN. Extension agencies have, in the past, been advised to advocate the use of urea, promote the balanced use of nutrients through the use of NPK complex fertilisers. In the Zonal Conferences the State Governments have been advised to use high analysis fertilisers like urea and NP/NPK fertilisers.

Promoters of the use of dilute fertilisers like CAN were asked to stop demonstrations to promote use of CAN. They were also asked to stop the mention of CAN and ammonium sulphate in their extension literature and other kinds of exposures. They were asked to carry out demonstrations

*Not vetted in Audit.

with the balanced use of fertilisers and including urea a high analysis fertilisers as a source of nitrogen in their demonstration programme. Even tea plantations which prefer acid creating fertiliser like ammonium sulphate, have been advised to take to the use of urea in their plantation. States growing mulberry crops which prefer use of CAN, have also in the past been advised to use urea in place of CAN and take to liming where lime is required."

2.212. The Committee note that though Government had been reluctant to import dilute fertilisers like calcium ammonium nitrate and ammonium sulphate on the ground that the cost of such fertilisers per unit of plant nutrient was higher than that of urea (which is a concentrated fertiliser) and had also reiterated, on a number of occasions since 1970, that the use of calcium ammonium nitrate should be discouraged and substituted by urea, considerable quantities (17.44 lakh tonnes) of calcium ammonium nitrate had been imported during the period 1969-70 to 1975-76. It has been stated by the Department of Agriculture that while the entire imports during the period from 1969-70 to 1972-73 were against gifts and credits (including purchases against credit from Rupee Payment Areas in terms of bilateral trade agreements), imports against free foreign exchange had to be resorted to in the subsequent periods on account of acute shortage and non-availability of other high analysis nitrogenous fertilisers all over the world and that efforts were being made to keep the imports of CAN as low as possible. Now that the availability of fertilisers in the international market has improved considerably and other measures like lump-sum release of foreign exchange, building up of buffer stocks, etc. have been taken to ensure better planning of purchases from abroad, the Committee trust that the need for distress purchases of calcium ammonium nitrate would be altogether eliminated.

2.213. In this connection, the Committee find that of the total quantity of 17.44 lakh tonnes of calcium ammonium nitrate imported during this period, only 1.24 lakh tonnes had been received as gifts and 1.94 lakh tonnes purchased in free foreign exchange and that bulk of the imports (14.26 lakh tonnes) were against credit. The Committee are doubtful whether it was advisable to have utilised the scarce credit facilities made available by foreign governments for the purpose of low analysis fertilisers at higher prices, in terms of nitrogen, particularly till 1972-73 when other varieties of high analysis fertilisers were easily available. While they would like to know the reasons therefor, they would also urge Government to ensure that as far as possible only high analysis fertilisers are purchased against credit.

2.214. Another reason for the continued imports of calcium ammonium nitrate is stated to be the Indian farmer's preference for it and it appears

that the promotional work done in this field by an European concern has contributed in no small measure to this situation. While the Committee note that the foreign concern has now stopped its promotional work and a number of steps have also been taken to wean away farmers from the use of dilute fertilisers, they are of the view that a lot more still needs to be done in this regard. They would like Government to review urgently the adequacy of the steps so far taken in this direction and take necessary remedial measures. Greater emphasis should also be laid on the educational aspects in various promotional programmes for the use of high analysis fertilisers and concrete steps taken to strengthen the extension services in the villages so that information in regard to the proper use of fertiliser can be disseminated over a wider front than at present.

II. CONTRACTS

Audit Paragraph

2.215. A test check of 186 contracts (placed abroad from 1971 to 1973) disclosed the following:

- (i) Out of the total of 39.70 lakh tonnes (against which the actual shipment was 38.10 lakh tonnes) only 15.82 lakh tonnes, representing about 40.73 per cent of the total, was shipped within the stipulated period. The extent of delay in shipment of the rest was as follows:

	Lakh tonnes	Percentage of the total
Upto 1 month	12.89	33.83
Beyond 1 month upto 3 months	7.19	18.88
Beyond 3 months upto 6 months	1.75	4.60
Beyond 6 months upto 1 year	0.62	1.62
Beyond 1 year	0.13	0.34

- (ii) Despite the loss or inconvenience owing to delay in shipments, no liquidated damages or penalty have been levied in any case even where delay was attributable to suppliers. The contractual provisions for imposition of liquidated damages or penalty for non-adherence to the delivery schedule are as follows:

- (a) The fertiliser contracts executed by the Director General of Supplies and Disposals are governed by the General

Conditions of Contract which provide for levy of liquidated damages for late delivery, apart from penal provisions for any breach of contract.

- (b) The contracts executed by the Director General, India Supply Mission, London, stipulate levy of liquidated damages for delay in delivery in addition to, and distinct from, any other remedy for breach of contract.
- (c) No provision for levy of liquidated damages or penalty for late delivery exists in the contracts executed by the Director General, India Supply Mission, Washington, who purchases more than 40 per cent of the total purchases of fertilisers from abroad.

2.216. While clause 10 of the conditions of the contracts executed by the Director General, India Supply Mission, Washington, relates to late delivery and provides that claims for extension of time on account of "force majeure" shall be granted there is no mention about the remedy available to the purchaser in cases extension of time is granted for reasons other than "force majeure". Further, the expression, "force majeure" has not been precisely defined or delimited by setting forth the particular eventualities that would constitute it. Two instances in which the suppliers could take advantage of this are given below.

2.217. In respect of a contract executed in April, 1973 for 55,000 tonnes of di-ammonium phosphate (against which only 8,856 tonnes, were supplied within the contractual period and the balance was delayed by periods ranging from 11 days to 3 months and 8 days), the supplier invoked "force majeure" on account of a breakdown in the manufacturer's plant and also silting of Mississippi river. The Ministry of Law and Justice considered (September, 1973) that these reasons could not be construed as falling within the purview of the "force majeure" clause. The Legal Adviser of the India Supply Mission, Washington, however, advised (December, 1973) that whenever "force majeure" is not defined, it may imply that the situations covered would be those which in fact constitute acts of God and was of the view that incidents like silting of rivers due to flood or accident at the plants would constitute such acts.

2.218. In respect of contracts (March, 1971) for 69,500 tonnes of di-ammonium phosphate, only 8,845 tonnes were shipped within the stipulated time. The supplier invoked "force majeure" clause of the contracts on the ground of a brief rail strike. The Legal Adviser to the India Supply Mission, Washington, was of the opinion that "force majeure" as used in clause 10 of the conditions of contract did not cover strikes and, thus, extension of time was not contractually admissible.

2.219. The Department of Supply stated (January, 1975) that if liquidated damages are levied, the supplies may get diverted and the suppliers may keep a cushion in their prices and that in case there is delay in chartering vessels and conducting inspections, the suppliers may demand storage charges. The Department of Supply further stated (January, 1975) that the matter was reviewed by the Fertiliser Purchase Committee on 14th November, 1974 and it was decided by that Committee not to levy liquidated damages.

[Paragraph 41 of the Report of the Comptroller and Auditor General of India for the year 1973-74, Union Government (Civil), pp. 108—110]

2.220. The Committee desired to know the reasons for not providing for the levy of liquidated damages in the contracts executed by the Director General, India Supply Mission, Washington. The Department of Supply informed the Committee, in a note, that the ISM, Washington started incorporating a clause regarding liquidated damages by an Appendix to the contracts for fertilisers with effect from 24 March, 1972. The revised Special Conditions of Contract provide as follows:

“In the event of failure of delivery any of the material/equipment within the time specified for delivery, it is agreed that the purchaser reserves the option.

- (a) To recover as liquidated damages and not by way of penalty for the period after this material/equipment was due until actual delivery or until the purchaser secures the material/equipment from others, a sum equivalent to 2% of the contract value of the undelivered material/equipment for each month, or part of month's delay.
- (b) To purchase elsewhere, without notice to the contractor on the account and at the risk of the contractor the plant and/or stores not delivered or others of a similar description (where others exactly complying with the particulars are not, in the opinion of the purchaser, readily procurable, such option being final) without cancelling the contract in respect of the consignment(s) not yet due for delivery; or
- (c) to cancel the contract or a portion thereof and, if so desired, to purchase the plant and/or stores at the risk and cost of the contractor.”

“Extract from India Supply Mission, Washington Conditions of Contract (ISM 826. Rev/70).

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10. DELAYED DELIVERIES: Subject to the operation of 'Force Majeure' time is of the essence. Claims for extensions of time on account of 'Force Majeure' shall be granted subject

only to the prompt notification to India Supply Mission of the particulars thereof and the furnishing to India Supply Mission if required, of reasonable supporting evidence. Any waiver of time in respect of partial instalments shall not be deemed to be a waiver of time in respect of remaining deliveries.

10(A). 'Provided that where supplies are made within 21 days of the contracted original delivery period, ISM's freight forwarders, or the Inspecting Agency where so specified, may accept the stores for shipment/inspection, unless it is stipulated in the relevant contract that such grace period shall not be applicable to the contract'."

2.221. When asked whether it would not be advisable, in respect of levy of liquidated damages, to judge each case on its merits instead of taking a general decision not to levy any liquidated damages, the Department of Supply, in a note, replied:

"The question of levy of liquidated damages against fertiliser contracts has been considered by the FPC a number of times. In the meeting of FPC held on 29-1-1975, the consensus was that liquidated damages should not ordinarily be levied in contracts of fertilisers but the clause regarding liquidated damages should be allowed to stand in the contracts as it would serve as a deterrent to the suppliers against their wilful and unnecessary delays. Again in the meeting of FPC held on 30/1/1975, the matter was discussed and it was decided that guidelines be issued to ISM, London and Washington suggesting waiver of liquidated damages unless they were convinced in any particular case that the delay in the completion of the contract was wilful."

2.222. The Committee asked whether it was not true that higher prices were often agreed to for quicker delivery and, if this was the case, whether delays in delivery did not frustrate the very purpose, conferring undue advantage on the suppliers. In a note, the Department of Supply stated:

"There were not many cases in which higher prices were paid in consideration of quicker delivery."

2.223. The Department of Supply, according to the Audit paragraph, had stated (January, 1975) that the Fertiliser Purchase Committee had decided, on 14 November 1974, not to levy liquidated damages. The Committee enquired into the grounds on which this decision had been

taken, in reply to which the Department of Supply furnished to the Committee an extract from the minutes of the meeting of the Purchase Committee, which is reproduced below:

"In the fertiliser contracts, Audit has been raising queries as to whether any liquidated damages were being levied and if not, why? The present cases under consideration were for ANP under ISM, London contract No. M. 16464 and M. 16471. Since Audit has been raising this in other cases also, the matter was taken as general issue in the FPC. Since clause for liquidated damages are generally incorporated in the contracts as the matter of safety and since the Ministry of Shipping & Transport is also practically responsible in shipment arrangements no liquidated damages is being recovered. It was proposed to give the reply to Audit on the above lines. FPC approved the same."

The Department of Supply added:

"No further grounds for the decision are on record. However, it is relevant to point out that, so long as there was a 'Sellers' Market' for fertilisers, it might have been embarrassing for us to raise any question of liquidated damages."

2.224. Explaining, during evidence, the legal position in regard to "force majeure", the representative of the Ministry of Law stated:

"Force Majeure" is any incident due to act of God or any incident due to natural forces; but it can be given an extended meaning, namely, due to unforeseen circumstances beyond the control of the firm or the contract or . . . events for which the contractor cannot be held responsible can be allowed under the 'force majeure' clause. But normally we do not categorise all these things because once we start categorising them, we will have to include more and more. It is always better to have a restricted 'force majeure' clause and leave some room for us to contend that the events on account of which they are seeking to invoke it are not actually events which would fall under the 'force majeure' clause."

2.225. With reference to the contract executed in April 1973 for the purchase of 55,000 tonnes of di-ammonium phosphate, commented upon in the Audit paragraph, where the 'force majeure' clause had been invoked by the supplier, the Committee asked whether it was the advice of the Law Ministry that the 'force majeure' clause could be invoked appropriately

and successfully in this case. The representative of the Law Ministry replied:

"I would like to explain the circumstances and facts on the basis of which our advice was given in this case. As far as I can say, the plea of the firm was that there was a breakdown of the machinery, not in his own plant, but in the plant of his sub-contractor who had promised to supply him the raw material. We took the view that another sub-contractor's contract cannot be construed as 'force majeure' under the 'force majeure' clause in the main contract. We, therefore, stated that any break-down in another sub-contractor's machinery cannot be taken as 'force majeure' unless the firm stipulates in the contract itself that sub-contracts should be considered."

2.226. The Committee, therefore, desired whether the supplier in this case had not obtained an undue advantage of invoking the process of Law, despite the Law Ministry's advice. The representative of the Department of Supply stated:

"As mentioned in the Audit Report there was a conflict of legal opinion between our Law Ministry here and the Legal Adviser in Washington. Therefore, it was held that these events which were pleaded by the contractor should be deemed to fall within definition of 'force majeure'."

2.227. A note furnished to the Committee subsequently in this regard by the Ministry of Law is reproduced below:

"There is no contradiction as is sought to be made out in the sense that in so far as the 'force majeure' event like breakdown of the plant etc. is concerned, it may be brought within the category of 'force majeure' but in the context and on the facts of the present case, the firm had pleaded breakdown of the machinery, not in its own plant, but in the plant of another sub-contractor. Such a contingency was not specifically included or made a term of the contract entered with the firm by the DGS&D. In the said circumstances, it may not be open to the firm to successfully raise a plea of 'force majeure'. It is not clear whether our Legal Adviser at Washington had taken into consideration the afore-mentioned special circumstance. Besides, no written opinion was received from the Legal Adviser at Washington, save his preliminary oral observations being conveyed by an officer of our Mission to DGS&D in one of his letters."

2.228. The Committee asked whether the Ministry of Law had been consulted by the Department of Supply about the feasibility of defining events which would attract the provisions of the 'Force Majeure' clause included in the conditions of contract. A note furnished in this regard by the Department of Supply is reproduced in Appendix XIII:

2.229. The Committee are concerned to observe that prior to 24 March, 1972, no provision for the levy of liquidated damages or penalty for late delivery existed in the fertiliser contracts executed by the Director General, India Supply Mission, Washington, who purchases more than 40 per cent of the total purchases of fertilisers from abroad, while contracts executed by the India Supply Mission, London and the Director General of Supplies & Disposals contained provisions for the imposition of liquidated damages or penalty for non-adherence to the delivery schedule. That such a lacuna should have been allowed to exist thereby conferring an undue advantage on the suppliers is regrettable. What, however, causes greater concern to the Committee that even after the incorporation, by means of a Special Condition of Contract, of a clause for the levy of liquidated damages, a general decision had been taken by the Fertiliser Purchase Committee not to invoke this clause ordinarily but utilise it only as a deterrent against "wilful and unnecessary delays" by the suppliers. Unfortunately, no grounds for this strange decision are stated to be on record, though the Department of Supply have sought to explain it away by stating that "so long as there was a sellers' market for fertiliser it might have been embarrassing for us to raise any question of liquidated damages". This, in the Committee's view, is entirely impermissible and unwarranted and apprehension about how the suppliers would react in the event of levy of liquidated damages should not have gained precedence over sound and prudent commercial principles. Since this decision has apparently frustrated the very purpose of incorporating the clause for the levy of liquidated damages, the Committee desire that this should be reviewed urgently and steps taken to rescind the instructions issued in this regard and each case judged on its merits instead of giving a virtual carte-blanche to the suppliers.

2.230. It is also a matter for concern that while clause 10 of the conditions of the contracts executed by the India Supply Mission, Washington, provides, inter alia, that claims for extension of time on account of 'force majeure' shall be granted, the expression 'force majeure' has not, however, been precisely defined or delimited by setting forth the particular eventualities that would constitute it, giving rise to conflicting views and interpretations. Thus, in one case of delayed deliveries, the supplier had invoked the 'force majeure' clause on account, inter alia, of a breakdown in the plant of a sub-contractor who had promised to supply him the raw material while the Law Ministry were of the view that this could not be construed as

falling within the purview of the 'force majeure' clause since the contingency of a breakdown in a sub-contractor's plant was not specifically included or made a term of the contract entered with the firm, the Legal Adviser of the India Supply Mission at Washington had, however, advised that whenever 'force majeure' was not defined, it might imply that the situations covered would be those which in fact constitute acts of god and was of the view that accident at the plants would constitute such an act. The representative of the Law Ministry also informed the Committee that it was always better to have a restricted 'force majeure' clause and leave some room to contend that the events on account of which the clause was sought to be invoked were not actually events which would fall under the 'force majeure' clause. It would, however, appear to be financially prudent to lay down some criteria, on the basis of accepted norms of international mercantile practice, for the determination of events that would constitute 'force majeure', so that any vagueness or ambiguity in this regard is not taken advantage of by the suppliers. The Committee, therefore, desire that this question should be re-examined, in all its aspects, and necessary remedial measures taken to plug what appears to be a loophole in the contracts.

2.231. As regards the specific case relating to the contract executed in April 1973 commented upon by Audit, it appears that the supplier's plea in regard to the breakdown in the sub-contractor's plant had been accepted on the basis of the advice given by the Legal Adviser to the Supply Mission, Washington. The Committee would very much like to know why the Law Ministry's views on the subject had been ignored particularly in view of the fact that the Legal Adviser to the Mission had not given any written opinion but had only "conveyed" his "preliminary oral observations" through an officer of the Mission.

CHAPTER III

PACKING

Audit Paragraph

3.1. Till 1971, imported bagged fertilisers were normally packed in jute bags. From 1971, suppliers from different countries began to offer fertilisers in polypropylene bags, at prices lower by about 2 to 3 dollars per tonne as compared to fertilisers in jute bags. The Department of Agriculture, while expressing preference (July 1972) for jute bags for operational reasons, had no objection to purchase of fertilisers in polypropylene bags in view of the price advantage. Accordingly, large quantities began to be purchased in polypropylene bags. For instance, it was reported in September 1972 that out of 4.60 lakh tonnes of fertilisers purchased from a foreign country only 77,000 tonnes were packed in jute bags and the rest in polypropylene bags and this caused concern to the Jute Industry in India. The Ministry of Commerce and the Indian Jute Mills Association were anxious that in view of the comparatively higher foreign exchange earning from export of jute goods and also employment provided by the jute industry, no positive encouragement should be given to synthetics where jute could be used. A committee set up (July 1972) by the Ministry of Agriculture to enquire into the matter found that, from the point of view of handling, jute bags and polypropylene/polythelene bags were equally suitable, provided they conformed to the prescribed specifications. The committee, therefore, recommended (June 1974) that the preference as between jute bags and polypropylene/polythelene bags should be governed by considerations of maximum foreign exchange earning. In other words, if price advantage in buying fertilisers in polypropylene bags is more than the net in-flow of foreign exchange due to export of jute bags, purchases ought to be made in polypropylene bags and *vice versa*. The net inflow of foreign exchange due to export of jute bags for packing fertilisers was assessed by the committee (in May 1973) as \$6.57 per tonne of fertilisers. This in-flow is much more than the price advantage of about \$ 3 per tonne (assessed in August 1972). The committee's recommendations are under consideration of Government January 1975).

[Paragraph 41 of the Report of the Comptroller & Auditor General of India for the year 1973-74. Union Government (Civil). pp. 110-111]

3.2. The Committee learnt from Audit that the Department of Agriculture had stated in this regard, in February 1975, as follows:

"It is correct that in the recommendations of the Committee under the chairmanship of the Joint Commissioner (Fertiliser Shipping and Distribution), Department of Agriculture, quantitative guidelines for exercising of option between jute bags and polypropylene bags at the time of purchase negotiations had been given. The implementation of this recommendation, however, has to be done by the fertiliser purchasing agencies, i.e., the Department of Supply and MMTC. The Report of the Committee was forwarded to the Department of Supply and the Ministry of Commerce on the 5th June 1974 and they also have been requested to intimate the action taken by them. On receipt of their reply, the final position will be intimated to Audit.

The Department of Supply was, however, understood to have informed Audit (April 1975) in this connection as follows:

"This sub-para is obviously meant for the Department of Agriculture to comment upon and we have nothing to say."

3.3. The Committee enquired into the main recommendations of the Committee (The Polypropylene Committee) appointed under the Chairmanship of the Joint Commissioner (Fertiliser Shipping and Distribution) on the packing of imported fertilisers and the action taken by Government thereon. According to the information furnished to the Committee in this regard by the Department of Agriculture, the Polypropylene Committee had made the following recommendations:

"from the point of view of handling, the Government of India should view the use of jute bags on the one hand and the use of polypropylene/polythylene bags on the other as equally suitable, subject to the minimum specifications in either case indicated by Government of India, being followed.

The preference as between jute bags and polypropylene/polythylene bags in the purchase of fertiliser from abroad should be based primarily on the relative economics of the two propositions in a particular negotiation.

In order that the preference in respect of choosing jute bags on the one hand and polypropylene/polythylene bags on the other is exercised during negotiations on the basis of as quantitative a comparison as possible, the negotiating team may follow the following procedure in this respect:

- (a) Before the Indian negotiating team purchasing fertiliser from abroad enters into negotiations with the suppliers, they

should ascertain from the Ministry of Commerce the current level of net in-flow of foreign exchange due to export of jute bags in terms of per tonne of fertiliser.

- (b) During negotiations a decision may first be taken whether the fertiliser is to be imported in bulk, *i.e.*, in unbagged condition or in bagged condition, which decision will depend, again, on the relative economics and feasibility of the two options, the details of which are not within the purview of this Committee's terms of reference.
- (c) After a decision has been taken to purchase the fertiliser in bagged condition and if there is an offer from the suppliers of both jute bags and polypropylene/polythylene bags of acceptable specifications from the point of view of handling, and the price offered for supply in polypropylene/polythylene bags is lower than that of supply in jute bags, the purchase should be made in polypropylene/polythylene bags if the price advantage per tonne is more than the net in-flow due to export of jute bags as mentioned in item (a) above. If, however, the price in polypropylene/polythylene bags is higher than that in jute bags or if the price advantage in polypropylene/polythylene bags is less than the net inflow of foreign exchange due to export of jute bags, the purchase should be made in jute bags."²

3.4. The Department of Agriculture also made available to the Committee a copy of the Report of the Polypropylene Committee. Dealing with the economics of purchasing fertilisers in jute bags on the one hand and polypropylene/polythylene bags on the other, the Committee had observed, *inter alia*, as follows:

"In view of the fact that from the point of view of handling there was nothing much to choose between jute bags on the one hand and polypropylene/polythylene bags of the required specifications, on the other, the Committee felt that the preference to be indicated by purchasers of fertiliser on behalf of India should be governed mainly by the relative economics of the two options. In this context, it would be necessary to compare (a) the net inflow of foreign exchange earnings to the country due to export of jute bags with (b) the price advantage, if any, involved in choosing polypropylene/polythylene bags instead of jute

²Polypropylene Committee Report, of paragraph 7.

bags. Since (b) keeps varying from time to time and in each negotiation, the comparison of (b) will have to be made with (a) applicable to a particular transaction. Even (a) tends to vary from time to time and the position in this respect will have to be ascertained from the Ministry of Commerce prior to any negotiations.”⁸

The Committee had further observed:

“The net foreign exchange inflow due to export of jute bags for packing fertiliser was assessed by the Committee during the month of May 1973 as \$6.57 on the basis of the following data obtained from the Ministry of Commerce:

1. Type of bag	B. Twill	Hessian (selved) (Ex-14 oz/40" 11 × 12)	D. W. Tarpaulin (selved) (Ex-15 oz/45" 10 × 10)
2. Size	36" × 24"	36" × 24"	36" × 24"
3. Weight per bag	762 gms. (1.68 lbs)	527 gms. (1.26 lbs)	502 gms. (1.10 lbs)
4. Holding capacity of each bag.	50 kgs.	50 kgs.	50 kgs.
5. No. of bags required to pack 1 tonne of fertiliser.	20	20	20
6. Provision for wastage @ 5%	1	1	1
7. Estimated value (f.o.b.) of (5) and (6) above.	Rs. 43.51 \$5.98	Rs. 49.77 \$6.84	Rs. 44.28 \$6.09
8. Basic price	Rs. 2,600 per ton (F.A.S.) for Standard and B. Twill bags.	Rs. 3,750 per tonne (F.A.S.) Standard 40" × 10 oz.	Same as hessian plus a premium of Rs. 100 per ton hessian.

NOTE: In the Table above given by the Ministry of Commerce a wastage of 5% in the bags has been assumed *vide* item 6 of the table. The suppliers, however, provide 10 empty bags alongwith the bagged fertiliser. The Committee, therefore, reduced the percentage of wastage on bags to 1% and with this change the f.o.b. value of Hessian bags works out to \$ 6.57 as against \$ 6.84 mentioned under column 7 of the Table.

As per the price advantage between the fertiliser in polypropylene/polyethylene bags as compared to the fertiliser packed in jute bags, the position ascertained by the Committee from the Department of Supply (during the month January 1975) indicated

⁸Ibid. paragraph 6.1

that there was a price advantage of about \$5 per tonne in purchasing fertiliser in polypropylene|polythylene bags. This, again, is likely to have changed substantially consequent to the energy crises and the shortages of oil-based raw material required for polypropylene|polythylene industry.”⁴

3.5. As regards the action taken by the Department of Agriculture on these recommendations, the Committee were informed as follows:

“It would thus be observed that the Committee broadly recommended that while importing fertiliser in bags the choice between jute bags and polypropylene bags should be made on the basis of a quantitative comparison between (a) the net inflow of foreign exchange due to export of jute bags expressed in terms of per tonne of fertiliser and (b) the savings, if any, per tonne of fertiliser in the price of fertilisers supplied in polypropylene bags as compared to jute bags. The Committee also indicated the methodology of making this quantitative comparison.

The Report of the Committee and its recommendations were forwarded to the Department of Supply and Ministry of Commerce *vide* O.M. No. 20-25/72-MSHP dated 4-6-1974. The Department of Supply|Minerals and Metals Trading Corporation have been requested to intimate to the Lok Sabha direct the action taken on the recommendations of the Committee.”

A note furnished in this regard by the Department of Supply is reproduced below:

“Department of Supply is guided by the decision of the Department of Agriculture who are concerned with the specifications of material and bags. Earlier, the purchases were confined to either bulk or in jute bags. Subsequently the Department of Agriculture started accepting the material packed in polypropylene bags. The switchover was necessary because of two reasons, namely: (i) cheaper prices were being offered for PP, and (ii) non-availability of jute bags. The Department of Agriculture set up a committee to consider the type of bag that should be used. This question was also considered by the Fertiliser Purchase Committee on 2-4-1975 when they took the following decision:—

A Committee set up under the Department of Agriculture had worked out the economics of purchase in jute and PP bags. In the meeting of the FPC on the 26th March, Shri.

⁴*Ibid.*, paragraphs 6.2 and 6.3.

stated that there should be no subsidy on exports of jute. In the existing contract and in our negotiations suppliers had been asking for the differential between PP and Jute Bags varying from 2 to \$ 7.53. But this differential is not correct as the suppliers had offered supplies in PP bags which was not in accordance with the specification. Also in making a decision whether to buy in jute bags or PP bags consideration had to be given to the availability of these bags with the suppliers. FPC, therefore, decided that each case had to be considered on its merit."

3.6. Drawing attention to the fact reported in the Audit paragraph that out of 4.60 lakh tonnes of fertilisers purchased from a foreign country, only 77,000 tonnes were packed in jute bags and the rest in polypropylene bags, the Committee desired to know the reasons for accepting supplies in polypropylene bags instead of jute bags, thereby adversely affecting the foreign exchange potential of the indigenous jute industry. A representative of the Department replied in evidence:

"From 1972 when shortage of fertilisers started developing, the Agriculture Ministry agreed to accept either in jute bags or in PP bags. The stage has not come when we can have the choice. We have had to buy in whatever type of bags the fertilisers were offered to us because of shortage."

3.7. Asked whether this did not run counter to Government's policy that no positive encouragement should be given to synthetic packing where jute could be more advantageously used, the representative of the Department of Agriculture replied:

"As far as the Agriculture Ministry is concerned, a committee was set up and that committee very clearly indicated that, as far as suitability was concerned, both jute bags and PP bags were acceptable provided they conformed to certain minimum specifications. The committee also went on to say that the formula which had been worked out by them must be applied in each case to see which is more advantageous depending upon the offer made. That was to be exercised by the purchasing department. The committee stated in no uncertain terms as to what its recommendations were regarding the suitability or acceptability of the either type of bags. By the formula worked out by it, the purchasing department could easily decide, whether it is advantageous to get fertiliser in jute bags or in polypropylene bags. It was a question of implementing those recommendations by the purchasing department. The Agri-

culture Ministry had also sent it to the Supply Department and to the MMTC for implementation of these recommendations."

3.8. To another question whether the Department of Agriculture, being primarily concerned with the promotion of jute production in the country, should not have a more comprehensive and much larger interest on this important issue and ensure that the interests of the Indian jute industry were not affected, the Joint Commissioner (Fertiliser Shipping and Distribution) replied:

"I happened to be the Chairman of the Committee. We had a rather difficult task to come to a quantitative conclusion. We made certain specific recommendations and it was for the purchasing department to take a decision in each case whether to get fertilisers in jute bags or in polypropylene bags. To enable them to decide this one way or the other, we recommended that the net inflow of foreign exchange due to export of jute bags must be considered and they should not go by the price reduction in polypropylene bags alone. The Committee indicated that from handling point of view both jute bags and polypropylene bags are acceptable provided they conform to certain minimum specifications in regard to mesh, weight, denier etc. They must exercise cost checks and their preference should primarily be based on the relative economics of the two propositions.

Then a question was raised that the jute may not be necessarily from India. We resolved that by deciding that it need not go into that question. We have a common jute board with Bangladesh and our interests are then linked. We said that if the price in polypropylene bags is higher than that in jute bags or if the price advantage is less than the net inflow of foreign exchange due to export of jute bags, the purchase must be made in jute bags irrespective of the source of jute. The Committee's recommendations are thus to some extent weighed in favour of jute bags.

It was for the purchasing department to implement those recommendations. We had also reminded them. It is not that we were not pursuing this matter."

As regards the specific instance reported by Audit, the witness added:

"In this particular case, let me say, because I happened to know something of the case, that they perhaps had no choice. The

Japanese suppliers at that time were not willing to supply anything except in polypropylene bags. If that was the position, there could not be anything else. They had to buy fertilisers and there was no other choice. I do not know whether this is absolutely correct, but this is my impression. It is for the Department of Supply to say."

3.9. In view of the fact that the responsibility for the purchase of fertilisers from abroad had been entrusted to the Minerals and Metals Trading Corporation, the Committee desired to know the policy proposed to be adopted by the Corporation. The Chairman of the Corporation stated in evidence:

"So far as MMTC is concerned, we have always insisted on jute packing. We are quite aware of the policy considerations which should make us take only in jute bags, and we have insisted on that. There have been only one or two very exceptional cases where we have accepted in PP bags. The entire bulk of our imports has come in jute bags, and I may assure the Committee that, in our future purchases, we will insist on jute bags being used."

Asked whether a condition for supply in jute bags only could be imposed upon the foreign suppliers, the witness replied:

"It can be done because many of the suppliers would accept it as a condition of supply. Otherwise, we would not purchase it from them."

To another question whether any formal decision had been taken on this question and necessary instructions issued, the witness replied:

"If at all any instruction is required in this matter, it must come from the Agriculture Ministry. Now that the question has become very clear that there is a net inflow of foreign exchange, I think, there should be no difficulty."

3.10. The Committee are concerned to note that though, in the context of promoting indigenous jute exports and the economic advantages likely to accrue therefrom, positive encouragement was not to be given to synthetic packing where jute could be more advantageously used, and in spite of the Department of Agriculture also having expressed preference, for operational reasons, for jute packing, considerable quantities of fertilisers have been purchased from abroad by the Department of Supply from 1971 onwards in polypropylene bags to the detriment of the country's jute interests. For instance, it was reported in September 1972 that out of 4.60 lakh tonnes of fertilisers purchased from a foreign country only 77,000 tonnes

were packed in jute bags and the rest in polypropylene bags. Purchases of fertilisers in polypropylene bags had been agreed to mainly on the ground that prices of fertilisers packed in such bags as compared to jute bags were lower about 2 to 3 dollars per tonne in August 1972 and by about 5 dollars per tonne in January 1975. It has also been stated that from 1972 when shortage of fertilisers started developing, the Department of Agriculture had no choice except to accept fertilisers in whatever packing they were offered. It, however, appears that while assessing, in August 1972 the price advantage resulting from purchases in polypropylene bags, the comparative economics of the two propositions had not been examined in detail and the in-flow of foreign exchange by the export of jute bags taken into account and only a simplistic comparison between the prices quoted for supply in synthetic packing and for supply in jute bags made. That this was so would be evident from the calculations subsequently made by a departmental committee (The Polypropylene Committee) appointed to enquire into this matter, according to which the net foreign exchange inflow due to the export from the country for packing fertilisers was 6.57 dollars per tonne in May 1973, which was much more than the price advantages of 3 dollars and 5 dollars respectively offered by the suppliers in August 1972 and January 1975. Besides, as has also been pointed out by the Polypropylene Committee, the argument that fertilisers packed in polypropylene/polythelene bags would be comparatively cheaper than those packed in Jute bags may no longer be valid on account of the increase in prices of oil-based raw materials required for the polypropylene/polythelene industry.

3.11. The other contention that on account of shortage of fertilisers at the relevant time, there was no choice except to buy fertilisers in whatever packing they were offered, may also no longer be valid at present in the context of easier availability of fertilisers and fall in prices. As a sellers' market no longer exists for fertilisers, it should not be too difficult to ensure that whatever purchases are required to be made from abroad in a packed condition are made only in jute bags so that exports of jute bags from the country for packing fertilisers are not adversely affected. The Committee have also been informed in this connection by the Chairman of the Minerals and Metals Trading Corporation that apart from one or two very exceptional cases, the entire bulk of their imports have come in jute bags and that supply in jute bags could be insisted upon as one of the terms and conditions of the purchase which should be acceptable to many of the suppliers, failing which purchases would not be made from them. Having regard to the fact that the Polypropylene Committee has also indicated the methodology for making a quantitative comparison between (a) the net inflow of foreign exchange due to export of jute bags expressed in terms of per tonne of fertilisers and (b) the savings, if any, per tonne of fertiliser in

the price of fertilisers supplied in polypropylene bags as compared to jute bags, the Committee desire that every care should be exercised to see that the fertilisers are imported as far as possible in jute bags in preference to polypropylene bags.

CHAPTER IV

DISTRIBUTION AND PRICING

Distribution

4.1. In the context of supplies of fertilisers being far from regular and the difficulties known to be faced by the average Indian farmer in obtaining in time fertiliser of the requisite quality at reasonable prices, the problem of equitable distribution of fertilisers assumes great importance. A common complaint of farmers is that fertilisers are despatched to the distribution outlets only during the lean seasons when the offtake is poor. The Committee, therefore, enquired into the steps taken or proposed to be taken to ensure that fertilisers reach the farmer when most required. In a note, the Department of Agriculture informed the Committee as follows:

“The production of fertilisers is more or less continuous throughout the year. Consumption of fertilisers occurs in two peaks, one in July-August and other in November-December. It is not possible to rush the entire requirement of fertilisers only just when it is required. This would create many logistical problems like transport bottlenecks and as a result slippings in supply at certain points. Moreover, movement of fertilisers by rail has to be arranged taking into consideration the capacity of the Railways to move traffic expeditiously. Hence the movement of fertilisers from the factories to the distribution outlets has necessarily got to be made more or less uniformly throughout the year. This would result in some stocks accumulating in the off-season which would be sold during the ensuing consumption season.

Under the Essential Commodities Act, the Fertiliser Movement Control Order has been promulgated by the Central Government in 1973. Taking into consideration the requirement of each State for each season for each fertiliser and taking into account facility of railway movement orders are issued under the Fertilisers Movement Control Order once in 3 months directing the manufacturers to supply a certain quantity of fertilisers in each State/Union Territory. Instructions have also been issued that the supplies by the manufacturers have to be made proportionately every month. For instance, out of the

quarterly allocation for August-October quarter, 1/3 is expected to be supplied during August and so on. Any non-compliance of the order is punishable under the Essential Commodities Act. The issue of such an order ensures that the manufacturer supplies an adequate quantity of fertilisers to each State during the consumption season.

In regard to pool fertilisers also, since it is not possible to ensure the arrival of imported fertilisers only just prior to the consumption season and taking into account the movement problems, it becomes necessary to move fertilisers to likely consumption centres in the off-season so that adequate quantities of fertilisers are available in the consumption season."

4.2. Explaining, during evidence, the arrangements for the distribution of fertilisers, the Joint Secretary (Inputs), Department of Agriculture stated:

"From July 1972 we have taken over the distribution of fertilisers under the Essential Commodities Act. We have been drawing up coordinated supply plans for indigenous manufacturers of fertilisers as well as for the pool."

Asked whether Government had satisfied themselves that since July 1972, the distribution mechanism actually worked to the benefit of the farmer, the witness replied:

"Yes, the distribution mechanism worked, but the problem in 1972-73 was that of non-availability. The total availability of fertilisers in the country was far less than the demand."

To another question whether whatever quantities were available during 1972-73 were actually and equitably distributed to the farmers, the witness replied:

"For the quantities of fertilisers which are made available, as I said, under the distribution plan, which we have drawn up, the State Governments are expected to monitor the distribution under this plan every month by calling the representatives of the manufacturers to the State headquarters to find out whether they had in fact distributed the fertilisers which they are supposed to distribute and also to make sure that they give the right kind of fertilisers to the districts in which the State Governments want those fertilisers to be distributed."

4.3. In this context, the Committee invited attention to the following observations in regard to shortage of fertilisers contained in the Supplementary Report of the Comptroller and Auditor General of India for the year

1972-73 on the Emergency Agricultural Production Programme and asked whether this did not represent a melancholy state of affairs, in spite of the claims made by Government:

“Punjab and Haryana have complained of acute shortage. In Assam, Manipur, Rajasthan and West Bengal shortages of 25 per cent or more were reported. In Rajasthan the quantities available for distribution were also less because of the inability of the representatives of the State Governments to lift in time the allotments made to the State. In Maharashtra 0.61 lakh tonnes of nitrogen were allotted against the requirements of 0.54 lakh tonnes and 0.31 lakh tonnes remained undistributed. Against a total requirement of 0.63 lakh tonnes of P&K, 0.40 lakh tonnes were allotted, out of which 0.11 lakh tonnes were distributed. In Assam 1637 tonnes of fertilisers remained unutilised since March 1973 in 5 districts out of 6094 tonnes received.”

The Joint Secretary (Inputs), Department of Agriculture replied:

“I would like to say that for the first time in July 1972 we started drawing up this guaranteed supply plan. So far as the internal distribution within the State is concerned, it is left to the State Governments. That is, we make the allotment that has to be given by the manufacturers who have their retail points. What we say is: Zuari Chemicals will give 2000 tonnes of nitrogen to Tamil Nadu State within this six month period. We are satisfied that Zuari Chemicals have their own private retail points also and give something through the public channels. But it is for the Tamil Nadu State Government to make sure that Zuari Chemicals distributes 2000 tonnes and to whatever extent the State agencies can lift them, they should lift it.

As far as the imported fertilisers are concerned, we make allotments to each State Government according to the co-ordinated supply plan. It is for the State Government to make arrangements to lift them. Some of them did not lift it because of financial difficulties.

As far as the figures are concerned, I will be able to make it only after I have seen it. But, broadly, in the whole of the latter half of 1972 and the whole of 1973 and the early part of 1974, the main problem was one of the overall availability of fertilisers in the country both from indigenous and the pool being far short of the total requirements of the country. So many States complained of severe shortages because this was a situa-

tion which could not be helped because the proportionate indigenous production could not go up and possibly came down also and also the imports have to be restricted because they are not available in the international market."

4.4. On the Committee drawing attention to complaints that farmers were unable to obtain fertilisers during those seasons when they were actually required and enquiring what steps, if any, had been taken to ensure that fertilisers were actually made available during the peak consumption periods, the witness replied:

"Though July-August and October-November are the big consumption months, that has nothing to do with the delivery or distribution arrangements. We have more than 13 lakh tonnes of material in the pool in stock which is distributed to the various parts of the country. We have asked the State Governments and also the fertiliser manufacturers to distribute the indigenous production under the Essential Commodities Act. We have made arrangements to see that every district officer makes a review of the quantity of fertiliser required in a district during the consumption period and make arrangements for having that stock. Even though the peak consumption would be during July-August and November-December, our distribution is throughout the year so that there will be no rush at the last moment."

4.5. Asked whether the Central Government had any idea of the basis on which fertilisers were actually distributed in the rural areas, particularly in States like Andhra Pradesh and Tamil Nadu, and whether the quantity issued per acre was considered adequate in Government's view, the Additional Secretary of the Department of Agriculture replied in evidence:

"Probably the Member's disappointment at the low rate per acre stems from the fact that this was happening in a few States in a time of scarcity, perhaps two or three years ago. It was true that in many cases they had just a mathematical distribution, the total quantity available divided by the acreage, and sometimes the farmers were getting very small quantities. This was unfortunate, but there was nothing that we could do to rectify the situation because the total available was so small. I had known cases in Andhra Pradesh in particular, where they use a very high dose of fertilisers, where the farmers used to get hardly 4 to 5 kg. or 10 kg. for paddy land, but that is now a thing of the past. We have adequate

fertilisers and even buffer stock and we do hope that in the coming years this phenomenon will not recur. It did happen in the past when there was acute scarcity and people were selling at black market rates."

To another question whether any complaints in this regard had been received from Andhra Pradesh and Tamil Nadu, the Joint Secretary (Inputs) replied:

"We have received no complaint as such, but in Andhra Pradesh as far as the internal distribution is concerned, we have ascertained from them that they are operating on a card system. After estimating the requirements per farmer based on his area, crop etc., they give him his entitlement but otherwise the total assessment of requirements has been agreed to by the Andhra Pradesh and Tamil Nadu Governments."

She added:

"As I mentioned earlier, the internal distribution of the fertiliser allotted to States is left to the State Governments. But many of the State Governments introduced a distribution system like permit and card system which led to some amount of malpractices. Then our Minister wrote to all the Chief Ministers of the States pointing out that complaints had been received that the introduction of this kind of distribution system was acting more as a bottleneck than as a help and requested them to revise the system. I must report to the Committee today that practically all the State Governments, on the basis of a letter written by the Minister, have now withdrawn it."

4.6. The Committee desired to know, in this connection, how the State Governments had reacted to the formula adopted by the Central Government for the assessment of requirements of fertilisers and their allocation. The Additional Secretary of the Department of Agriculture stated in evidence:

".....even the latest method of assessing has since been accepted by the States perhaps with some reservations, and this, it has been felt, was the best and most realistic in the circumstances. Even with the help of agronomists and other research scientists who, on the basis of their experiment, suggest dosages for optimum utilisation of fertilisers for maximum production, at the moment we are not able to improve upon this formula."

Asked whether the reservations on the part of some of the States had in any way contributed to a certain kind of anarchy in the distribution of fertilisers, the witness replied:

“No. I checked up with Miss. . . . [Joint Secretary (Inputs)]. I was under the impression that there was some protest in the beginning, but she says that after a round of discussions in the zonal meetings, they have been convinced that this was the best available formula for the present to assess the requirements of the States.”

To another question as to how the States had reacted to the revised criteria introduced in 1974-75 (*vide* Appendix I) and to what extent, if any, the principles of allocation had been modified, the Joint Secretary (Inputs) replied:

“When the formula was first thought of to link it to the production programmes and to the level of application reached, we had consulted most of the State representatives. We had a series of discussions with them both in the zonal conferences and at the Centre and the formula was drawn up. The protest about it was that we were giving a uniform 5 per cent increment in the dosage rate to all the States. To a State which has a very low consumption level, you have to give a higher increment because there is a possibility of improving upon their performance much more. A uniform 5 per cent increment would keep the lower consumption States at a low level for all time. So, we went into this question again and drew up a graded system of increments by which the States which had already reached a high level of consumption were given lower increments and States with lower levels of consumption were given higher increments in the dosage rates. To that extent we adjusted our formula on the basis of the suggestions of the State Governments.”

Asked whether the States had reacted better to the new formula, the witness replied:

“Much better. Actually, I forgot to mention that six-monthly zonal conferences with every State and the APC and the Agriculture Director of each State are held at which the formula is discussed and if they have any reservation or protest about the method, they express it. They have completely accepted the assessment and there has been no protest at all about the criteria for assessing the requirements by any particular State in the last two or three years.”

4.7. Drawing attention, in this context, to the classification adopted for Rabi 1975-76 (*vide* Appendix I), the Committee desired to know the reasons for some States getting a preferential treatment in the matter of assessment of fertiliser requirements and allocation. The Joint Secretary (Inputs), Department of Agriculture stated in evidence:

“The range is 5 to 20 per cent. We did this grading because of the protest of the State governments that equating States with high levels of consumption with States having low levels of consumption was not fair because it keeps the low level consumption State always at the bottom. Andhra Pradesh, Punjab and Haryana are in the forefront as far as use of fertiliser is concerned, but I can say that whatever Andhra Pradesh has asked for, even apart from the assessment of requirements, we were willing to give them and we have given them in the past. For instance, when under the Nagarjunasagar Dam some additional area came under irrigation, they asked for an *ad hoc* additional allotment and we gave the entire allotment from out of the pool, even though it was over and above the assessed requirement. We have been making arrangements to see that any State which wants additional *ad hoc* allotment is supplied its requirements. We are working in order to ensure that the States which can make use of fertilisers get them. As far as distribution is concerned, we are in constant touch with the Director of Agriculture and the Secretary. If there is any shortage, we do make it up.”

4.8. According to the information furnished to the Committee by the Department of Agriculture (*vide* paragraph 1.47 and Appendix V), “after a period of shortages in availability of fertilisers in the country from 1972 to 1974, the availability of fertilisers has been relatively easy during the past six months or so”, as a result of which both the distributing agencies and the cultivators tended to purchase fertilisers only just before the application season and only in such quantities as were immediately required. The Committee, therefore, enquired into the reasons for the sudden change in the situation and desired to know whether this was attributable to excess imports or increased production or less utilisation. The Additional Secretary of the Department of Agriculture replied in evidence:

“In the years you refer to there was considerable shortage because of non-availability in the international market. As you are aware, in 1974-75, there was an unprecedented drought and floods and eight big States were involved in this catastrophe. This, combined with the increased rate of fertilisers, resulted in less off-take. The seasonal conditions did not permit uti-

lisation of fertilisers and also the increased cost and the lack of credit facilities, which have since been rectified, was a contributing factor for less off-take. This result I would not say in a glut, but a comfortable stock position. Today we have about 1.3 lakh tonnes in terms of nutrients with the fertiliser manufacturers and about 2.6 lakh tonnes with the importers. This works out to less than 30 per cent of the total requirements which had to be kept by them in the pipeline and as a market buffer to give us sufficient bargaining power when we go for tenders in the international markets. This has been the advice and, as also reiterated by Mr. . . . this gives us the necessary strength to withhold from purchases if the market is buoyant and we are not getting at reasonable rates. The National Commission of Agriculture and several other committees have recommended that it is necessary to maintain this in order to ensure that the fertilisers are available to the farmer at a time he needs them at all the retail points in the far-flung areas of the country. So, the total which we have for the year is not considered by any means unusually high or excessive. In fact, the fertiliser stock with the manufacturers amounts to hardly 5 to 6 per cent of the total annual capacity and in respect of the pooled fertilisers it works out to about 20 per cent which it is felt necessary to be kept as a buffer stock."

Since drought and lack of purchasing capacity had been cited by the witness as factors responsible for the lesser off-take of fertilisers, the Committee desired to know in which part of the year these had occurred. The witness replied that this was in 1974. On the Committee pointing out in this context that it appeared somewhat contradictory that the fertiliser position should have been difficult when there was drought and also less demand, the witness replied:

"In the first half it was difficult. In the second half it was very comfortable."

The Joint Secretary (Inputs) added:

"Shortage developed during the middle of 1972. Before that there was plenty of fertilisers. The whole of 1973 was one of extreme shortage. In early 1974 the shortage continued, but by June 1974 the situation changed partly because in the Kharif of 1974 there was drought in Gujarat, Maharashtra, Rajasthan and Karnataka. So, it was in the Kharif of 1974 that the adverse seasonal conditions started. The international position regarding the availability of fertilisers eased towards the second half of 1974 and the price increase was also in June 1974."

She stated further:

“In the latter half of 1974 the position definitely changed from one of shortage to easier availability because of less consumption in Khariff and Rabi because of drought and other conditions.”

4.9. When the Committee pointed out in this connection that in the later part of 1974, there was a hue and cry for fertilisers, and even an agitation, in Andhra Pradesh and that it was, therefore, difficult to reconcile to the statement that the availability of fertilisers had eased during that period, the witness stated:

“Andhra Pradesh, Bihar and West Bengal were the three States where there was still demand for fertilisers. As a matter of fact, from Gujarat and Rajasthan we diverted fertilisers to Andhra Pradesh.”

She added:

“In eight States there was certainly decline in the consumption of fertilisers due to drought, but in a few States like Andhra Pradesh, West Bengal and Bihar there was still good consumption of fertilisers and we despatched to them as much as they could take. There was no question of our not being able to supply to them, but for the whole country consumption certainly declined because of the drought conditions and also because of the increased prices of fertilisers.”

Elaborating further, the witness stated:

“We normally work out our requirements based on normal seasonal conditions. Every year it is a fact that one or two States get affected by drought or floods but last year was an unusual year in which eight States were badly affected. Together with that there was a price increase in June and the consequential credit non-availability which had to be tackled. So, it was a combination of a number of factors and also many of the contracted imports did not materialise in the earlier half, but towards the latter half the position improved and the import arrivals came according to schedule and even in advance.”

4.10. On the Committee pointing out that drought alone in some parts of the country could not account for the easing of the fertiliser position and that, despite the claims of Government to the contrary, a black market in fertilisers actually flourished in 1974, and enquiring whether

the easier availability of fertilisers in the early part of 1975 was attributable to larger import arrivals or increased production or was on account of the release in the market of stocks held earlier clandestinely by haorders and blackmarketeers, the witness replied:

“It is a combination of factors. By the end of 1974, we had a better stock position than we had anticipated because of less off-take in many States. We had made special arrangements for rushing additional supplies to Andhra, in addition to what they had asked for. As I had mentioned... when additional water became available in the Nagarjunasagar area for which they had not asked for fertilisers, we gave them additional fertilisers. Then in the first half of 1975, import arrivals have been according to schedule and in some cases even in advance of schedule. So there have been better import arrivals. Indigenous production also in the first half of 1975 had been better because of better power availability and various other factors. So because of these factors, our position now is much better than it was last year. It was a combination of a number of factors that was responsible for this.”

Another representative of the Department of Agriculture added:

“During 1974, as a result of drought in a number of States, the consumption was really below the expected target. It was less than the previous year 1973-74. Even in States like Punjab and Haryana, the consumption was less than the previous year. Consumption was particularly less in Rajasthan; it was less in Gujarat; it was less in the eastern part of MP, the Chhatisgarh area. It was very low in Orissa. Also it was less in U.P. As a result, stocks which were supposed to have been consumed in the kharif season were not consumed and the availability of stocks towards the end of 1974 (November-December) was slightly better. In the meantime, prices of fertiliser also increased by almost 80—100 per cent. There was some shortfall in the off-take of fertilisers in almost all States and by the end of the year 1974-75 (March 1975) we found that in States like MP, Punjab, Haryana and UP there was substantial reduction in the consumption of fertiliser compared to the previous year, 1973-74. It is as a result of combination of factors, that is, drought, a sudden increase in the fertiliser price and less off-take that this situation was brought about.”

Asked whether Government were aware of a black market in fertilisers flourishing till the end of 1974, the Joint Secretary (Inputs) replied:

“As a matter of fact, Andhra Pradesh was the only State where it was the last to disappear, because it was one of the States which did not have drought, which had additional water and which came up to the Centre for additional supplies. . . . It is a fact that in Andhra Pradesh there was a brisk demand for fertilisers from growers of cotton, tobacco and other commercial crops. But even there, towards the end of the year, black market, according to official reports, had more or less disappeared.”

4.11. Asked whether any steps were taken during this period to divert surplus stocks of fertilisers available with states where there was no immediate demand to those deficit States like Western U.P. where there was a clamour for fertilisers, the Joint Secretary (Inputs), Department of Agriculture replied:

“When manufacturers who had been given allotments under the Essential Commodities Act came up saying ‘we cannot sell in Rajasthan and in Gujarat because there is no demand there’, we gave orders for diversion of these quantities to States like Western U.P. and Bihar and Andhra where there was a demand. There has been considerable diversion ordered in order to meet the demands of States where there was still demand and because of low consumption in other States. We had been reviewing it as we went along. Wherever there was a demand, we sent the fertilisers because we were in a position to divert it.”

In a note* furnished subsequently in this regard, the Department of Agriculture informed the Committee as follows:

“On the basis of the reviews made from time to time to assess the fertiliser availability position of fertilisers in different States, steps were taken to divert fertilisers from the States affected by drought to States like Bihar, Andhra Pradesh, Western U. P. etc., where there was increased demand. The requirements of fertilisers of Andhra Pradesh and Bihar were stepped up by 24,000 tonnes of N and 6500 tonnes N respectively for the special programmes launched by them. These additional allotments were given from the Central Fertiliser

*Not vetted in Audit

Pool. In addition to this, the quantities of domestic fertilisers diverted to different States are given below:

Quantities of fertilisers. (in tonnes)	Diverted from	Diverted to
1120 P	Gujarat	Karnataka, Andhra Pradesh Madhya Pradesh & Punjab.
165 N	Haryana & J & K	50% Bihar, 50% Punjab.
644 N	Madhya Pradesh	Bihar.
1840 N	Bihar & Punjab	Rajasthan
1083 N	Haryana	Punjab
2300 N	Gujarat	Andhra Pradesh
6720 N	Gujarat	Andhra Pradesh
690 N	Gujarat	Uttar Pradesh
1470 N	Gujarat	Uttar Pradesh
360 N	Gujarat	Uttar Pradesh
920 N	Gujarat	Uttar Pradesh
828 N	Haryana	Bihar
644 N	Madhya Pradesh	Bihar"

4.12. As has been pointed out in paragraph 1.42 of this Report while the imports of fertilisers during the period from 1968-69 to 1973-74 ranged from 6.33 lakh tonnes to 12.56 lakh tonnes, imports during 1974-75 (when the world prices were highest and worked out to almost six times the prices prevailing in 1971-72) amounted to 14.09 lakh tonnes, though internal consumption during that year (25.79 lakh tonnes) was the lowest as compared with the consumption during the preceding three years. The Committee, therefore, desired to know the reasons for making such large purchases at higher prices in the context of a lack of demand and lesser off-take. The Joint Secretary (Inputs), Department of Agriculture stated in evidence:

"The planning for the 1974 imports was done in October 1973. As already explained, imports could be profitable only if

planned sufficiently in advance. Till June 1974 the position was one of continuous shortage. Kharif starts in July 1974 and when we knew that the price increase had a disastrous effect on consumption, we took note of that. Besides there was inadequacy of credit. Conditions improved by the later half of 1974 by which time all the contracts for imports for 1974 had already been concluded and consignments started arriving. Since we knew that stocks were built up we made an effort to reschedule our concluded contracts to the extent possible or even cancel if possible. But our total supply today is such that it may not even account for a good pipeline provision. If there is no black market today, if international prices are responding to us today, it is because we are in a comfortable position. I still maintain that we are not holding more stocks than would be required for kharif and rabi, provided corrective measures are taken to step up consumption. The attempt of the Ministry of Agriculture is not to keep availability to the sale which is possible but to keep availability to the consumption levels which should reach food production levels. Revision of prices, increasing the distribution margin, doing more promotional work and increasing credit availability are steps in that direction which were taken in the last six or seven months. We get reports from the State Governments of good seasonal conditions. The offtake has improved and the stock position with the domestic manufacturers is coming down."

4.13. In an editorial captioned 'Fertilizer Policy', appearing in the 'Business Standard' of 2 June 1975, it had been stated, *inter alia*, as follows:

"New Delhi's decision to go slow on fertilizer imports is a tardy recognition of the harsh realities both at home and abroad. The indigenous demand for fertilizers has declined so sharply that huge stocks remain unsold. World supplies have also assumed massive proportions and international prices have been steadily going down. Imports in these circumstances will not only mean reckless dissipation of scarce foreign exchange reserves but also lead to large accumulation of fertilisers for which the country would have no immediate use. *The current developments on the fertilizer front have apparently taken the Union Government by complete surprise and it does not know what to do to meet the unexpected challenge (emphasis added).* To make the best of a bad job it has

advised foreign suppliers to defer deliveries in the hope that the respite thus gained will enable it to sort out its problems. Efforts are also being made to renegotiate old contracts on more favourable terms. In view of the worldwide shrinkage in demand and fall in prices the supplying nations may not oppose a reasonable compromise plan."

4.14. When the Committee drew attention to this editorial and particularly to the statement that the developments on the fertiliser front had taken the Union Government by complete surprise and asked why a glut situation should have been allowed to develop, the Joint Secretary (Inputs), Department of Agriculture replied:

"I have already explained that there is no situation of glut. Compared to the actual requirement, it was only a question of low offtake. The first half of 1975 was non-consumption season. We have seen that press report; it does not make any reference to any official agency. I can tell you that there are reasons. There might be parties who want to keep down the availability, because in the last two years, 1972, 1973, people were making money because of shortage of fertiliser. Fertiliser was selling in the black market at a premium and there was no need for any aggressive marketing at all. They found that the situation has changed to their disadvantage and they are interested in seeing that we cut down our imports so that a situation of shortage could be created. Our attempt has been to keep availability related not to what we could sell but to what should be consumed in order to achieve production targets in agriculture. If we do not do that we would have to import foodgrains for Rs. 500 crores and Rs. 600 crores. We are trying to find out the factors which inhibit this; one was the price, the other was the inadequacy of distribution margin; then the inadequacy of credit, bottlenecks, in the distribution system in the States, adverse seasonal conditions, etc. Wherever corrective measures could be taken, we have done so, rather than pander to the press report and cut down our imports; if we did that once again a situation of shortage would arise and the old malpractices would flourish."

The witness, however, conceded that at the present moment (August 1975), there was a glut on account of less offtake plus improved imports, which were coming according to schedule, and better indigenous production. She also admitted that the cultivators' resistance to increased prices affected the offtake of fertilisers.

4.15. The Committee desired to know whether there were adequate stocks of fertilisers to meet the requirements of Rabi 1975-76. The Joint Secretary (Inputs) stated in evidence:

“For the Rabi 1975-76 all arrangements have been made for adequate availability and not only for adequate availability but a detailed distribution supply plan for the period August to January has already been drawn up both for indigenous and imported fertilisers and so there is no doubt about it and we have told the State Governments to tell each District Magistrate to assess the requirements for the district, to see whether that quantity of fertilisers has already been moved to the distribution points in the districts because there are about 40,000 retail points in the country and our efforts are to see that fertilisers are just not merely available but also made available to the remotest corners and to each of the distribution points well in time before the consumption season starts. As a matter of fact, I have brought for the information of the Committee the supply plan we have drawn up for the period. August to January, in which the 48 manufacturing units have been told exactly what quantities of fertilisers have to go within this six-month period to each of these States. This is being done under the Essential Commodities Act. The State Governments will watch to see that this quantity is proportionately made available by the manufacturers for every month of the six months' period and for the pool we give the residual requirements. So before the Rabi season starts most of the fertilisers would have reached the farthest retail point in the country.”

She added:

“We have already sent out telegrams to all the State Governments asking them to ascertain from the District Magistrates the fertiliser requirements of the district and whether that quantity of fertilisers has already moved to the district.”

4.16. The Department of Agriculture also furnished, at the Committee's instance, a detailed note on the machinery that was available to ensure the timely and equitable distribution of fertilisers to the farmers and the checks exercised by the Central Government in this regard, which is reproduced in Appendix XIV. In the note, the Department informed the Committee, *inter alia*, that the following measures had been taken, in

recent times, to ensure availability of fertilisers adequately and in time to the State Government agencies and cultivators:

- (1) Sizeable buffer stocks of pool fertiliser have been built up in order to guard against shortages and also to be able to negotiate prices in world market from a position of strength.
- (2) Efforts have been made to step up domestic production.
- (3) The Pool buffer stocks have been located near consumption centres (and not only near the ports) so that supply can be made to the cultivators quickly when required.
- (4) Prices of fertiliser have been reduced *w.e.f.* 18th July, 1975 to make it easier for the cultivator to purchase fertiliser.
- (5) Movement of imported and domestic fertiliser has been rationalised and is done on an 'advance programming' basis from time to time, which enables Railways to give priority to movement without affecting their operations or the movement of other essential commodities."

4.17. Referring to complaints of farmers in regard to the poor quality of fertilisers produced by the domestic manufacturers and that not unoften only mud was being supplied in the guise of fertilisers, the Committee enquired into the steps, if any, taken to ensure the quality of the fertilisers made available to the farmers. The Joint Secretary (Inputs), Department of Agriculture replied in evidence:

"As for the quality of the indigenous manufacture... I would be able to say broadly that it is not possible for adulteration to take place at the production level because production has been geared to a particular percentage, and so this kind of adulteration takes place after it gets into the distribution system, because it goes to the wholesalers, then to the retailers and then there are several points thereafter where it is handled before reaching the farmer. It is possible that adulteration takes place at any of those points. Here again we have tightened the regulatory machinery to such an extent that we are monitoring what the State Governments who have their laboratories, who have their fertiliser inspectors who are supposed to draw samples from all registered dealers at any point and if they are found to have adulterated stocks, they are to prosecute them. In times of shortage, many cases of such adulteration took place. Cases of prosecution were reported to us. But again adulteration possibly has come down, the cases reported have come down, because of the easier availability of fertilisers this year."

Asked whether any monitoring in this regard was done by the Central Government, the witness replied:

“We have a system by which we ask State Governments to report to us all cases of blackmarketing and adulteration which they have detected and what action has been taken in each case. In our six-monthly zonal conferences, we find out from State Governments what they are doing in this regard. Obviously such machinery cannot be administered from the Centre. But the States have been vested with sufficient powers and we are monitoring what they are doing about it.”

To another question in regard to the nature and extent of quality controls exercised by the State Governments and whether there was any machinery to check that the fertiliser actually supplied to the farmer was of the same quality and standard as produced by the plants and no adulteration took place at the distribution points, the witness replied:

“As I said, in each State there is a machinery to do the quality control. Under the Fertiliser Control Order, each State has nominated fertiliser inspectors for each district and each inspector has to indicate how many samples he has drawn. We are monitoring it. Where in some cases there may not be sufficient vigilance, we have been monitoring the action taken by Government in this respect. Fertilisers distributed in the States, imported or indigenously produced, are subjected to the same quality control, because it is also possible that imported fertilisers may be adulterated. As I said, since in the distribution and transport there are so many agencies involved, at any point in these stages adulteration could take place. So we have vested the State Governments with power to draw samples at any stage of the distribution of fertilisers and prosecute the offenders. Sufficient powers have been given even for summary trials because it was represented to us that the normal judicial processes are too cumbersome for such cases. So we changed the law; we have now given them powers of summary trial in such cases.

Then many State Governments came to us and said that they cannot do better monitoring and quality control because they do not have enough finances to appoint staff exclusively for quality control. What they now do is to nominate the DAO as the fertiliser inspector, also the seeds inspector, also the pesticides inspector. Because of his other duties, he is not able to devote sufficient time to catch cases and successfully prosecute them. We thought this was a genuine plea and we have in

the Fifth Plan included a scheme by which we will assist State Governments in appointing one inspector practically per district exclusively for drawing pesticide/seed/fertiliser samples. He will be the input inspector. He will have the time to draw these samples and prosecute the offenders."

4.18. Apart from the quality of fertilisers actually supplied to the farmers, other complaints also relate to the quantity and weight of fertilisers sold. Drawing attention to the fact that in some cases, farmers were forced to pay the price for the full quantity and weight indicated on the bags even though the actual contents might be less, the Committee desired to know whether any action had been taken in this regard. The Joint Secretary (Inputs) stated in evidence:

"I presume this applies to imported fertiliser rather than to the indigenous fertiliser, because part of it comes in bulk and part in bags. In handling the bags, hooks are used because labour are not willing to handle them without hooks. We have estimated that on each bag from the time it is taken down from the ship, to the transit shed, then to the wagons, then to the destination point, then again transported by trucks and then handled at the depots and then at the retail point, about 16 hook holes occur. I have seen this myself. We have tried to persuade labour not to use hooks, but they are not amenable to it. They say it is very difficult to lift it by hand. So we got them Japanese hooks which are smaller. But they do not use it. What they do is to keep it hidden in dhoties and use the very vicious big hook which makes these holes in the bag. I have seen it myself. It is very difficult to compel them to give up use of hooks. The only answer to this is to mechanise the handling. In respect of bulk fertilisers it is being done, though not in a satisfactory manner despite our attempts. At the major ports where bulk fertilisers are received we are trying to mechanise the handling process as far as possible. From the ships fertiliser will be sucked and through conveyor belts will be carried, so that the handling will be more controlled and losses by hook holes or pilferage may not be much. At present it is difficult to fix responsibility between the port trust labour, the FCI labour and the railways for such losses."

Asked whether the witness could say with certainty that it was the port labour or the FCI labour which was pilfering fertilisers, the witness replied:

"It is very difficult for people to smuggle fertiliser out of the port trust premises because it is a bulk commodity."

She added:

"Secondly, it becomes slurry and it is not possible to prevent it." To another question whether in order to prevent handling losses at the ports, which, in any case, did not appear to be very heavy, it was necessary to make large investments in sophisticated mechanical handling plants which would also displace a large number of labourers, the witness replied:

"We have installed a Rs. 8 crore mechanical handling project in Kandla, which would handle about 4,000 to 6,000 tonnes a day as against 400 to 700 tonnes a day by manual handling. There would be a saving on demurrage charges that we pay in foreign exchange. There will be a quicker turn over of fertiliser vessels and thereby reduction in freight charges quoted by fertiliser suppliers; by itself this will be an enormous amount. Besides, all these mechanical projects have been taken up in consultation with labour unions, though there would be no displacement of labour because we will be handling many more ships. Even so, we are providing for compensatory payment."

4.19. Asked why the farmer should be made to bear the incidence of handling losses, the witness replied:

"In the distribution margin we give, there is some provision for shortage and losses and that amount should enable them to make up any shortage or loss. It is not that every bag is short. Some bags like that may be there and the farmer is entitled to get the quantity for which he pays."

Pricing of Fertilisers

4.20. The following table indicates the prices paid by farmers for different fertilisers in India and elsewhere in the world during 1968-70:

Prices paid by farmers per 100 kgs. of plant nutrient in U.S. Dollar.

	Ammonium Sulphate	Ammonium Nitrate	Urea	SSP (below 25%)	MOP (Over 45%)	Remarks
France 69/70	26	23.3	..	22.3	8.7	Price at retail store. No subsidy M.O.P. 60%
West Germany 69/70	28.7	28.5	27.0	25.9	8.9	Price at nearest rail station for mini lots of 20 tons including value-added tax. M.O.P. 50%

	Ammo- nium Sulphate	Ammo- nium Nitrate	Urea	SSP (below 25%)	MOP (Over 45%)	Remarks
U. K. 69/70	15.6	14.5	..	..	..	Prices are compiled from subsidy claim statistics. Different subsidy for different fertiliser.
Switzerland 69/70	25	24.7	19.4	24.9	..	Prices at nearest rail station for 5-15 car- lots—No subsidy M. O. P. 40%.
Canada 68/69	29.1	22.1	20.9	23.6	8	Prices FOB on Plant. No subsidy.
USA 69/70	27.5	19.78	19.9	25	9.4	Prices at various points of delivery. There is cost-sharing arrangement with farmers which is not considered subsidy.
Burma 69/70	24.2	..	25.1	..	9.5	Prices at nearest sale points in Government organised non-profit sale.
Ceylon 68	21.1	..	15.8	..	7.5	Prices at Government retail Stores—Subsidised sales.
Taiwan 69/70	38.0	37.7	23.3	23.6	12.3	Prices at nearest rail- way station. No subsidy.
India 69/70	34.3	29.4	27.5	26.7	11.6	..
Japan 69/70	25	..	21.9	24.4	9.7	No subsidy.
Pakistan 68/69	21.7	22.4	23.7	22.2	13.4	Subsidy varies from fertiliser to fertiliser.
UAR 68/69	29.9	30.1	30.4	17.7	11	No subsidy.
Australia 69/70	24.2	30.9	18.9	9.7	10.6	Subsidy paid to ferti- liser manufacturers.

Source : FAO Production Book, 1970.

It would be seen from the table that the prices paid by farmers for fertilisers in India were about the highest in the world.

4.21. A note furnished, at the Committee's instance, by the Department of Agriculture indicating the basis on which prices of fertilisers were fixed, is reproduced below:

"Fertilisers distributed in India come from two sources—imports and indigenous production. All imported fertilisers are distributed through the Central Fertiliser Pool, operated by the Union Ministry of Agriculture and Irrigation, at uniform Pool Issue Prices. The maximum retail prices of imported as well as indigenously produced urea, ammonium sulphate and calcium ammonium nitrate are fixed under the Fertiliser Control Order. The prices of other indigenously produced fertilisers are not regulated under the Fertiliser (Control) Order. The retail prices of fertilisers imported by the Government of India are made up of the Pool Issue Prices and the distribution margins. Potash is wholly imported and its price is regulated by this Ministry.

The price of single Superphosphate is regulated at the factory level by the Fertiliser Association of India according to a formula which has been approved by the Government. This formula permits increase in prices and compels reduction in prices as the prices of raw materials like rock-phosphate and sulphur and packing material go up and down.

The prices of other fertilisers like NPs and NPK complex are not regulated under the Law. The manufacturers have been pricing them according to the cost of production and the capacity of the market to pay the prices. But the steady prices of imported Di-ammonium Phosphate and NPK fertilisers fixed by the Government influence the prices of other fertilisers.

In fixing the Pool Issue Prices for imported fertilisers, the following factors are generally taken into account:

- (i) (a) The cost of purchase of the material from various sources.
- (b) Departmental Charges levied by the Purchasing Organisations.
- (c) Ocean freight in respect of imported fertilisers.
- (d) Customs duty.
- (e) Handling charges at the ports and godowns.
- (f) Cost of bags.
- (g) Establishment charges payable to handling agents.

- (h) Internal transport charges.
- (i) Incidental charges.
- (ii) Need to promote the use of a particular fertiliser and the paying capacity of farmer.
- (iii) The plant nutrient contents.

The Pool is supposed to operate on the principle of 'No profit No loss' but this concept also applies to the total operation of the pool and not to the individual fertilisers.

While the economic cost (No profit No loss price) of imported fertilisers is worked out on the basis indicated in para (i) above, the actual Pool Issue Price is dependent on factors enumerated in (ii) and (iii). It has been the endeavour of the Government to fix the Pool Issue Prices and the retail prices as low as possible. It also equalises the transport cost to the nearest railhead so that farmers in distant places do not have to pay more.

Certain other items of expenditure are incurred by the allottees on handling and distribution before the fertilisers reach consumers. These are on account of (a) administrative costs, (b) internal transport cost from railhead destination, (c) loading and unloading costs, (d) finance charges etc. For this purpose, distribution margins are allowed to be added to the Pool prices before the fertilisers are sold to the consumers."

4.22. On the Committee pointing out during evidence that while the prices of imported fertilisers alone were fixed by Government, there appeared to be no control on the prices of domestic manufacturers, leading often to very high prices being charged, the Joint Secretary (Inputs), Department of Agriculture stated:

"On imported fertilisers, all prices are fixed by Government. On the three major nitrogenous fertilisers, Urea, CAN and ammonium sulphate there is statutory price control which applies at the retail point for both imported as well as indigenous. For the rest of the fertilisers which are produced indigenously, there is no control by Government. But it is our impression that the pool prices have an effect on them. We import many of these same types of fertilisers and the quantities are so sizable that it does have an effect on the prices of the indigenously manufactured fertilisers. For instance, we import large quantities of DAP. The prices are controlled and the quantities are so large that the indigenous manufacturer cannot afford to sell his manufacture very much above the pool

prices. It may be marginally above the pool prices. Generally, the pool prices have a regulatory effect.

As regards the prices of other indigenous fertilisers which are not statutorily controlled, for example, single superphosphate, though there is no control by Government, there is a formula which is regulated by the Fertiliser Association of India. So there is some sort of control on single superphosphate manufactured in the country. But the main thing is that because the retail prices of the imported commodities are controlled, it helps to regulate or keep within control the prices charged for similar products produced within the country."

To another observation of the Committee in the context that the experience of the farmers was that prices of domestic fertilisers had almost troubled in recent times, the witness replied:

"If it is a question of the three statutorily controlled fertilisers, Urea, CAN and ammonium sulphate, during the period of shortage when there have been attempts to indulge in blackmarketing, State Governments have been given full powers to prosecute any dealers who indulge in blackmarketing. Several cases have been reported and the industry also has co-operated by cancelling the licences of dealers indulging in such malpractices.

Now the position is that there is so much fertiliser available that there is practically no complaint, at least of unreasonable prices or blackmarketing of fertilisers even in respect of the three statutorily controlled fertilisers."

4.23. The observations of the Estimates Committee (1972-73), contained in paragraph 3.104 of their 40th Report (Fifth Lok Sabha) are relevant in this context and these are reproduced below:

"At present, the Central Government have no separate organisation or procedure to keep watch on the prices at which fertilisers are actually available to the farmers at the field level. Reliance is placed on the State Governments to report the existence of blackmarketing in respect of fertilisers the prices of which are controlled. Besides, according to Government, the cooperatives through which the pool fertilisers are channelised are expected to observe the price discipline. The Committee feel that there is need for the collection of price data at regular intervals either independently or through the machinery of the State Government so that the Government are aware as to whether the controlled prices are actually being charged from the farmers, and also of the trend in the prices of non-controlled varieties of

fertilisers. The Committee, therefore, recommend that Government should devise suitable machinery and/or procedure for the purpose of collection of price data for taking such remedial action as may be necessary."

In response to these recommendations, the Ministry of Petroleum and Chemicals had informed the Estimates Committee (1973-74) as follows:

"The recommendation of the Committee is acceptable to Government in principle. The State Governments are being requested to give periodically the prevailing market prices of all fertilisers, whether controlled or uncontrolled. The State Governments would collect this information through their Fertiliser Inspectors appointed under the Fertiliser (Control) Order, 1957 who are entrusted with the implementation of the Order at the Field level.*

4.24. As stated earlier in Chapter II of this Report, the Committee were informed by the Department of Supply and the Minerals and Metals Trading Corporation that when world prices of fertilisers began to fall in 1975, the contracts concluded earlier for supply of fertilisers during 1975 were re-negotiated, resulting in considerable savings. The total benefit accruing to the Central Fertiliser Pool as a result of these re-negotiations, during the period from April 1975 to July 1975, had been estimated at Rs. 105.53 crores. It would further be seen from the details in Appendix XV that the savings on account of revision of contract prices were Rs. 15 crores and Rs. 11.5 crores in respect of supplies from Poland and USSR. Similarly, a saving of Rs. 2.46 crores had resulted following re-negotiation of prices in respect of supplies from Romania. The following tables indicate, in brief, the details of the reduction obtained in respect of contracts concluded by the Minerals and Metals Trading Corporation:

	Quantity in Metric Tonnes	
	Quantity	Price
Poland		
<i>Urea</i>		
Original contract (15-2-1975)	1,80,000	354.00 FOB
Revised contract	1,80,000†	242.00 FOB
<i>CAN</i>		
Original contract (15-2-1975)	50,000	170.00 FOB
Revised contract‡	6,000††	116.00 FOB

*Estimates Committee (1973-74), 45th Report (5 LS), December 1973. p. 19.

†Includes a quantity of 27,000 MT of CAN converted into Urea.

††Out of the balance quantity of 33,000 MT, 27,000 MT converted into Urea.

Quantity in Metric Tonnes. Price in Rupees per MT		
	Quantity	Price
Ussr		
<i>Urea</i>		
Original contract (10-2-1975)	2,00,000	2950.00
Revised contract	85,000	1600.00

Quantity in Metric Tonnes. Price in Rupees per MT		
	Quantity*	Price
Romania		
<i>Urea</i>		
Original contract (5-12-1974)	25,000	2950.00
Revised contract	5,000	1900.00
<i>CAN</i>		
Original contract (15-12-1974)	75,000	1595.00
Revised contract	29,000	928.00

*In respect of supplies to be effected before June 1975.

A similar position emerges in respect of contracts concluded by the Department of Supply.

4.25. The Committee learnt that the cultivators' prices of fertilisers had to be revised upwards rather steeply with effect from 1 June, 1974 as a result of abnormally high prices in the international market, increased ocean freight and increased cost of production of the indigenously produced fertilisers on account of the overall increase in prices of raw materials, operating costs, etc. Asked, during evidence, to indicate the extent to which prices had been reduced subsequently, the Joint Secretary (Inputs), Department of Agriculture replied:

"Urea—from Rs. 2,000 to Rs. 1850. Ammonium sulphate, we have not changed the price. CAN—from 1145 to 1060. Ammonium sulphate Nitrate—1145 to 1060."

Pointing out, in this context, that while the price of Urea imported from Poland had been re-negotiated from US Dollars 354 per MT to US Dollars

242 per MT (representing a reduction of little more than Rs. 800), the cultivators' prices of Urea had been reduced only by Rs. 150 per MT, the Committee desired to know why the advantage derived from re-negotiation of prices had not been passed on to the cultivators. The Joint Secretary (Inputs), Department of Agriculture, stated:

"We are getting imported fertiliser from several sources and the prices of all of them have not been reduced. Many of the stocks have already come in. The re-negotiation came only for further shipments to be made."

She stated further:

"We had to keep in view the quantity of fertilisers which had arrived in the country for which prices had been paid at a higher rate. The re-negotiations applied to the shipments which had yet to be made and which was only a small quantity.

Urea had been purchased from eight or nine different sources where different rates were negotiated. We pooled previous prices of the old shipments as well as the new shipments and worked out the total cost. After price reduction in Urea the landed cost comes to Rs. 2200 on an average. For Urea we will have to add handling charges, customs duty. We had to work out total economics of imported fertilisers and as you would have seen price reductions were announced. We had to reduce the cost of production of the indigenous manufacturers which meant reduction in the pool acquisition charge by a small amount. Then we had to increase distribution margin. We had to compensate for the stocks already held by the co-operatives and other agencies at the time of the price change. After taking into account all these and after the price reduction was announced, in the pool there was a deficit of Rs. 170 crores."

Elaborating the position, the Additional Secretary, Department of Agriculture, stated:

"Actually Government was paying very much more for the fertilisers which Government had to import. Even the sale at Rs. 2,000 resulted in a loss of Rs. 298 crores. We never thought of passing it (the loss) on to the farmer. We knew already that they would never have recovered had we passed on the loss to them. We went to the Cabinet and fought for ensuring that it never went beyond Rs. 2,000. Later on thanks to the negotiations and the change in the international market, the prices came down. So keeping in view the overall cost even after these reductions, the

retail price which we have fixed is Rs. 1850. We make it a point to see that burden is made as little as possible, knowing the condition of the poor farmer who cannot afford to pay anything more than a reasonable price. At the same time, a view has been expressed by various quarters including the Finance Ministry that, if in the black market they were willing to pay more than Rs. 2000 or 3000 for urea, why should not the benefit go to the public exchequer? If I may say so without casting any reflection on the other departments, with great difficulty we were able to secure even this reduction. If we had defaulted in making efforts, the price would have remained at Rs. 2000."

4.26. Asked whether it was Government's policy to make good earlier losses in fertiliser distribution at the expense of the Indian farmer, the witness replied:

"Otherwise we were informed that it would upset the entire budget of the Government of India. You are as keen as anybody else to see that our economy is not thrown out of gear and there is no inflation. These were the various considerations. In fact, even today we have to meet a deficit of Rs. 170 crores."

He added:

"In fact, we will welcome any recommendation from this Committee which will strengthen our hands in this regard."

The Secretary, Department of Fertilisers & Chemicals stated in this context as follows:

"I was also a member of the Committee of Secretaries which went into the question of pricing this year. Nothing has been done which has not been done in the past years. There is a principle under which the Indian farmer will pay a pooled price which is worked out every year depending upon the price paid to the indigenous producer and the imported price. Every year a calculation is made and a balance is struck. Having done this, the pool was still losing which means the balance was not adequately struck. The farmer was at no stage exposed to the erratic nature of international prices. When the prices went up in the international market, it was not passed on to the farmers. Had that been done, you can say that when there is a decline the benefit should be passed on to the farmers. This year the calculation indicates that there is an average price which the pool today is actually paying to the indigenous prices,

to the stock in the pool and to the new stocks coming at reduced prices. Even now the pool has not cut even and will be losing Rs. 170 crores."

4.27. Explaining the reasons for not reducing further the cultivators' prices, a representative of the Finance Ministry stated in evidence:

"It will not be possible to pass on the benefit now. The fertilisers that are being distributed now are those which were contracted about, say, one year back and which had been purchased at a higher price. I have before me a statement showing the prices that had been paid during this year for imported quantity and the prices that we will be realising by way of recovery from the farmers. As far as Urea is concerned, the quantity which is being distributed to the farmers this year has actually been purchased at a price of about Rs. 2400 per MT c.i.f. We were selling the same at Rs. 1920 and now it has been reduced further."

Supplementing this information, the Joint Secretary (Inputs), Department of Agriculture added:

"At present there is no subsidy to the farmer on the price of fertiliser. We have recently increased the commission of the distributors. With all these things, the Central Fertiliser Pool which deals with the imported fertiliser will certainly lose Rs. 170 crores which is the extent of the subsidy. Strictly speaking, we could have passed that on to the farmers but we had not. We are taking this Rs. 170 crores worth of deficit as indirect subsidy to the farmers. We must understand that it was not available on all the quantities which were contracted. A Member was quoting the reduction of price by Poland. We have worked out the exact quantities and worked out the final balance-sheet and we found that the Pool would lose Rs. 170 crores. The Government of India consciously took the decision that even with this deficit we should reduce it and that is why the reduction was made. Rs. 170 crores is the subsidy now being given to the farmers on fertiliser. A fall in the international market price will be reflected, if possible, in the next year's purchase."

She added:

"As far as the Ministry of Agriculture is concerned, we review the price at least once a year to see whether it is possible to reduce the price or not. If the import price falls, next year we can consider whether we can reduce the price."

4.28. A note furnished subsequently in this regard, at the Committee's instance, by the Department of Agriculture, is reproduced below:

"The total benefit which the Central Fertiliser Pool received as a result of the renegotiation of various contracts during the period from April 1975 to July 1975, has been estimated at Rs. 105.53 crores (*vide* details indicated in Appendix XV). Consequent upon the renegotiation of contracts, a total benefit of Rs. 67.22 crores was passed on to the cultivators through reduction in the Pool issue prices of the Pool fertilisers, through reduction in the statutorily fixed prices of indigenously-produced urea, ammonium sulphate and CAN and through compensation to Co-operatives, State Governments, Indian Potash and other institutional agencies for stocks held by them on the date of price revision so as to enable them to sell the fertilisers at reduced prices. In addition to this, as a result of the increase in distribution margins payable to the distributors of fertilisers without a corresponding increase in the retail prices, an additional expenditure of Rs. 14.94 crores is estimated during 1975-76. A further expenditure of Rs. 27.27 crores is estimated on account of the increase in fair delivery prices of manufacturers of urea, ammonium sulphate and CAN. As a result of all these changes, it has been estimated that the Central Fertiliser Pool would incur a deficit of about Rs. 180 crores during the year 1975-76."

4.29. Asked whether the indigenous manufacturers of fertilisers were being subsidised by Government in any manner, and if so, what was the quantum of subsidy paid, the Secretary, Department of Fertilisers & Chemicals replied:

"There is a misconception. It is the indigenous producers who are subsidising the imports today. The indigenous producers are getting an amount of Rs. 1183 per tonne of urea today whereas the sale price to the farmer is Rs. 1850. The difference goes as excise duty, dealers' marginal and contribution of the indigenous producers to the pool to enable Government to pay for the higher cost of imported fertilisers."

4.30. Since it had been stated that even after re-negotiation of the contracts resulting in considerable savings, the loss to the Central Fertiliser Pool had been computed at Rs. 170 crores, the Committee desired to know the basis for this computation and the mechanics of projection of the figures reflected in this regard in the Budget Estimates. A note furnished by the Department of Agriculture in this regard is reproduced in Appendix XVI.

4.31. At the Committee's instance, the Department of Agriculture also furnished a note indicating the concrete and specific measures taken by Government to bring down the prices and to prevent hoarding of fertilisers by profiteers and black-marketeers, which is reproduced in Appendix XVII. The Department of Agriculture have furnished the following statement* indicating the retail prices of some of the major imported fertilizers as they existed on 1 June 1974 and the reductions effected thereafter:

Name of Fertiliser	Retail price w.e.f. 1-6-74	Rs. Per tonne					Total reduc- tions effected (Cols. 3+4+5+ 6+7)
		Reductions effected on					
		18-7-75	1-12-75	16-3-76	20-4-76	8-2-77	
1	2	3	4	5	6	7	8
Urea	2000	150	..	100	..	100	350
Muriate of Potash	1220	50	85	185	..	105	425
Di-Ammonium Phosphate (18-46-0)	3005	200	205	..	300	..	795
Ammonium Nitro-Phosphate (24-24-0)	3080	..	430	335	25	225	1035
(20-20-0)	1855	75	120	..	..	70	265
N.P.K. (15-15-15)	1700	..	55	..	75	50	180
NPK (17-17-17)	2590	..	165	300	155	160	780

4.32. The Committee understood from reports appearing in certain sections of the press** that Government had set up a Fertiliser Prices Committee, to evolve a fertiliser pricing policy, which would ensure "a fair return on a sustained basis for the investment made in the industry", headed by Shri S. S. Marathe, Chairman of the Bureau of Industrial Costs and Prices and with eleven other members, including representatives of the Planning Commission, Ministries of Petroleum, Chemicals and Fertilisers, Agriculture

*Not vetted in Audit.

**'Economic Times' and 'Financial Express', 25 January 1976.

and the fertiliser industry. The Terms of Reference of the Committee were reported to include the following :

- (1) To evolve the norms for determining the production costs in the various fertiliser units, including the return on capital, which will make investment in the industry attractive.
- (2) To suggest, with due regard to the feed stock used, vintage of plants and other constraints to production, the retention prices for different units in operation and those likely to be commissioned during the Fifth Plan, which will give a fair rate of return.
- (3) To examine the cost of feedstock and other major inputs at different fertiliser factories and suggest whether the prices of the feedstocks and inputs need to be rationalised.
- (4) To suggest a formula for revising the manufacturers' ex-factory realisation, plant-wise, from factory time to time, consequent upon any increase or decrease in the cost of major inputs.
- (5) To evolve a policy for pricing of the imported fertilisers in relation to cost of imports, the nutrient content and the price of indigenous fertilisers of similar grades.
- (6) To consider any other matter which may be related to or have a bearing on the issues mentioned above.

4.33. Apart from assessing in a realistic and scientific manner the requirements of fertilisers and evolving a sound and rational import policy which would enable purchases being made at the proper time and at the most advantageous prices, it is equally important to ensure that the available fertilisers reach the farmers when most required. Thus, in the context of supplies being far from regular on account of shortfalls in indigenous production and uncertainties of purchases from abroad in a violently fluctuating market, and the difficulties known to be faced by the average Indian farmer in obtaining in time and at reasonable prices fertilisers of the requisite quality, a proper and equitable distribution and pricing of fertilisers assume great significance. As regards the arrangements that exist for ensuring the timely and equitable distribution and pricing of fertilisers, the Committee have been informed that internal arrangements for the distribution of Pool fertilisers within a State are the responsibility of the State Government concerned and that from July 1972, the distribution of fertilisers is regulated under the Essential Commodities Act while the actual distribution is monitored by the State Governments in terms of the coordinated supply plans drawn up by the Department of Agriculture for Pool fertilisers as well as indigenous manufacturers of fertilisers. The Committee also understand that the entire quantity of Pool fertilisers which constitute roughly 50 per cent of the total

availability) and about 60 per cent of the domestic production are distributed through public institutionalised channels like cooperatives over which the State Governments exercise control and that even in respect of the balance quantity, the districts/areas where the fertilisers are to be supplied can be decided by the State Governments concerned, although the actual marketing may be done through private distributors of the domestic manufacturers. The entire fertiliser distribution within a State in the context of areas and priorities is thus under the control of the State Governments.

4.34. These apparently elaborate arrangements notwithstanding, the Committee are doubtful whether the machinery that hitherto existed was capable of and adequately equipped for tackling situations arising from shortage of fertilisers and scarcity conditions and whether the distribution mechanism actually worked satisfactorily to the farmer's benefit particularly during 1972-74 when there was an acute shortage of fertilisers in the country with overall availability both from indigenous and imported sources being far short of the total requirements. It is well known that the common complaint of the farmer during this period was that fertilisers were not readily available and in adequate quantities during the peak seasons of consumption when they were actually required. Admittedly, some State Governments, in a time of scarcity, merely resorted to a mechanical "mathematical distribution" by dividing the total quantity of fertilisers available by the acreage, as a result of which farmers accustomed to using high doses of fertilisers, as in Andhra Pradesh, got hardly 4 to 5 kilogrammes of fertilisers for an acre of paddy. It also appears that many of the State Governments had introduced a card/permit system which, according to the representative of the Department of Agriculture, led to "some amount of malpractices" and acted "more as a bottleneck than as a help." The Department's representative was also candid enough to admit during evidence that in the past when there was an acute scarcity, fertilisers were being sold in the black market at a premium as a result of which there was no need for any aggressive marketing at all, and that in Andhra Pradesh, despite arrangements made to divert fertilisers from States where there was less demand on account of drought, a black market in fertilisers flourished till the end of 1974 as there was a brisk demand from growers of cotton, tobacco and other commercial crops.

4.35. The Department of Agriculture have, however, informed the Committee that these were now things of the past and that as a result of better indigenous production, improved imports, which were coming according to schedule and in some cases even in advance of schedule leading to better availability of fertilisers, the position was much better than in 1974. According to the Department, the factors inhibiting proper distribution of fertilisers have been identified and a number of corrective measures like (i) building up sizeable buffer stocks of Pool fertiliser to guard against shortages, (ii) stepping up of domestic production, (iii) location of buffer stocks near consumption centres, (iv) reduction in prices of fertilisers, (v) rationalisation

of and advance programming for movement of imported and domestic fertilisers, etc., have been taken in recent times to ensure availability of fertilisers adequately and in time to the State Government agencies and cultivators. With these measures as well as the withdrawal of the card/permit system for distribution of fertilisers, it was hoped that the phenomenon of the past would not recur in the coming years.

4.36. While these are, no doubt, steps in the right direction, it would appear that a lot more needs to be done to streamline the procedures in times of scarcity so as to ensure that the farmers, particularly the small and marginal farmers with their meagre resources, get their input requirements in time. Apart from reviewing urgently whether the existing channels of distribution are adequately equipped to reach the small farmers in the remote areas of the country and to react quickly and effectively in times of scarcity, and taking all necessary remedial measures in this regard, the actual performance of the existing machinery for the distribution of fertilisers should also be constantly monitored to ensure its smooth and efficient functioning and to safeguard against the situation of serious shortages which developed in 1972-73 and continued till the first half of 1974 much to the disadvantage of the peasants. The functioning of the institutionalised channels like co-operatives, agro-service centres, etc. should be continuously watched and steps taken to ensure, as has also been pointed out by the Estimates Committee (1972-73) in paragraph 3.54 of their 40th Report (Fifth Lok Sabha), that the co-operatives do not become merely an intermediate agency distributing fertilisers through private traders, but provide better and effective service to the needy farmers. The cooperative structure should also be strengthened both organisationally and financially to enable it to take up a larger share of the fertiliser business and to rationalise the location of its retail depots so as not leave out remote or inaccessible areas. Necessary infrastructural facilities like godowns, transport vehicles, trained personnel, etc. also need to be provided in a larger measure than before, if the problem of making available fertilisers in adequate quantities and in time to the farmers is to be tackled effectively. The present comfortable position in fertilisers affords the necessary opportunity and time to revamp the distribution system and the Committee trust that the Central Government, in consultation with the State Governments, will take all necessary steps in this behalf.

4.37. Strengthening of the distribution machinery alone would not produce the desired results unless corresponding steps are taken simultaneously to assist the weaker sections of the farming community to obtain timely credit for purchase of fertilisers. Admittedly, one of the factors influencing the off-take of fertilisers is the inadequacy of credit facilities. While the Committee note that efforts have been made to remove this constraint by making available additional short-term loans to the State Governments in the Budget for 1975-76 for the purpose, inter alia, of granting loans to the

farmers for the purchase of fertilisers and other inputs over and above the normal provision or grant of such loans in the State budgets, relaxing conditions for advancement of cooperative loans, etc., they would urge Government to keep the arrangements for the provision of credit to the farmers, particularly those belonging to the weaker sections, under close and continuous review and take prompt and appropriate remedial measures whenever deficiencies come to light.

4.38. Yet another aspect requiring constant attention and monitoring is the quality of fertilisers actually supplied to the farmers. While admitting that in times of shortage, many cases of adulteration of fertilisers took place in the distribution system, the representative of the Department of Agriculture informed the Committee during evidence that the regulatory machinery for curbing adulteration and other malpractices had been tightened to a considerable extent and sufficient powers vested with the State Governments to draw samples at any stage of distribution of fertilisers and to prosecute offenders. It, however, appears that on account of financial constraints which have come in the way of appointing staff exclusively for quality control, many State Governments have not been in a position to effectively monitor and exercise better checks over the quality of fertiliser actually supplied to the farmers. This deficiency has been sought to be remedied by including a scheme in the Fifth Plan for assisting the State Governments in appointing one Input Inspector practically per district exclusively to draw samples and to prosecute offenders. Apart from rendering all necessary assistance to the State Governments in this regard, the Committee would also urge Government to ensure the provision of adequate testing facilities and quality control laboratories and develop quick methods for spot-detection of malpractices. The existing enforcement machinery needs also to be tightened with a view to ensuring that un-scrupulous dealers who indulge in various malpractices like adulteration, dilution, short weightment, etc. of fertilisers are proceeded against promptly and dealt with sternly.

4.39. As regards pricing of fertilisers, the Committee are concerned to note that the prices paid by Indian farmers are about the highest in the World and admittedly the cultivators' resistance to the increases affected in prices of fertilisers with effect from 1 June 1974, on account of abnormally high prices in the international market, increased ocean freight and increased cost of production of the indigenously produced fertilisers attributable to overall increase in prices of raw materials, operating cost, etc., affected the off-take of fertilisers during 1974-75 leading to the downward revision of prices in July 1975 and December 1975. With effect from 16 March 1976 Government introduced a Scheme of subsidy at the rate of Rs. 1250 per tonne on phosphatic fertilisers which was meant to be passed on by the domestic manufacturers concerned to the farmers by way of reduction in prices. The

prices of fertilisers were also reduced again with effect from 20 April 1976 and again on 8 February 1977. The Committee have been informed in this connection that all imported fertilisers are distributed through the Central Fertiliser Pool, which operates on a 'no profit no loss' principle, at uniform Pool issue prices and that while the prices of the three major nitrogenous fertilisers Urea, CAN and ammonium sulphate are controlled statutorily, both in respect of imported and indigenous fertilisers, under the Fertiliser (Control) Order, there is no control by Government on the prices of other indigenously produced fertilisers. However, in respect of fertilisers the prices of which are not statutorily controlled, the Pool prices of imported fertilisers influence these prices and have a somewhat regulatory effect. The Department of Agriculture have also assured the Committee that it has always been Government's endeavour to fix the Pool issue prices and the retail prices of fertilisers as low as possible and that a number of measures have been taken by Government in recent times to bring down the prices of fertilisers.

4.40. While the Committee are also not unwilling to concede that the pricing policy has to take into account the total economic of imported fertilisers as well as of indigenous production and a drastic reduction in prices would be difficult, they would urge Government to keep the position under review and ensure that the pricing policy of fertilisers is invariably directed towards making this vital input available at reasonable prices. Now that the prices of imported fertilisers have fallen substantially and adequate buffer stocks are also being built up so as to provide the country with a strong bargaining base in the international market, it should not be too difficult to pass on the benefits accruing therefrom to the cultivator. Besides it should also be possible to effect economies in indigenous production and to take effective and conclusive steps to ensure the highest possible levels of capacity utilisation in the public sector fertiliser plants and thereby reduce production costs. The Committee would also urge Government to examine the feasibility of reducing the prices of fertilisers further in the overall interest of the country to increase the production of foodgrains. What is, therefore, required is an integrated approach to the entire question and not piecemeal and ad hoc solutions.

4.41. In this context, the Committee understand that a Fertiliser Prices Committee (Marathe Committee) has been constituted by Government to evolve a fertiliser pricing policy which would ensure a fair return on a sustained basis for the investment made in the industry and that this Committee was also to evolve, inter alia, a policy for pricing of imported fertilisers in relation to cost of imports, nutrient content and the price of indigenous fertilisers of similar grades and to suggest retention prices for different domestic units in operation and those likely to be commissioned during the Fifth Plan, which will give a fair rate of return. The Committee would like to be apprised, in some detail, of the findings of the Marathe Committee and the specific action taken by Government in pursuance thereof.

CHAPTER V

TOWARDS SELF-RELIANCE IN FERTILISERS

5.1. The use of chemical fertilisers in agriculture is now almost a matter of history. The earliest chemical product to be manufactured in India as a fertiliser, as early as in 1906, was super-phosphate. Fertiliser mixtures, which sought to provide a combination of nutrients, followed thereafter and the nitrogenous fertiliser, ammonium sulphate, was first obtained as a bye-product of the steel industry in 1933 and later as a manufactured product in 1940. This marked the beginning of the chemical fertiliser industry in India, to be followed, in 1943, by the conception, under the shadow of the Bengal Famine, of the first public sector fertiliser factory at Sindri (the Sindri plant was, in fact, India's first public undertaking), inaugurating which Pandit Jawaharlal Nehru stated: "The places are the new temples to which the Indian people will undertake pilgrimages one day." Some thirty years have passed since these prophetic words were uttered and the indigenous fertiliser industry has, undoubtedly, made rapid strides and its growth rate has been steady, registering an increase from 1.44 lakh tonnes of nutrients in 1960-61 to 18.55 lakh tonnes of nutrients in 1975-76. However, the domestic production of fertilisers is yet to catch up with the total requirements of the agricultural sector, necessitating substantial imports, which worked out in 1974-75 to 51.78 per cent of the consumption, to bridge the gap between demand and production.

5.2. Since the fertiliser industry is basic to our national economy, the Committee enquired into the steps taken to achieve self-sufficiency in fertilisers, so as to reduce the country's dependence on imports. In a note furnished to the Committee in this regard, the Department of Fertilisers & Chemicals have stated as follows:

"The fertiliser industry, being basic to our national economy, has been accorded a very high priority in our development programme. The industry has been accorded 'core' treatment for purposes of industrial licensing, allocation of scarce resources (including foreign exchange etc.); under the extant policy it is open to the foreign companies and larger Industrial Houses to participate in the programme for the development of the industry vis-a-vis the growing needs of our agricultural strategy.

Over the years, the development of the fertiliser industry has taken place in the public, the private and the cooperative sectors. The extent of the progress registered by the industry can be gauged from the fact that, as against a capacity of about 5.48 lakh tonnes of nitrogen in 1965-66 [the capacity developed presently is about 22 lakh tonnes of nitrogen. During the same period, the capacity for production of phosphatic fertilisers (in terms of P₂O₅)] registered more than a two fold increase, i.e., from a level of about 2.28 lakh tonnes in 1965-66 to about 5.6 lakh tonnes in 1974-75.

The industry, which thus began in a small way, has marched over a wide front and produces presently a variety of fertilisers to suit different soil and crop conditions in the country. Considerable diversification and reorientation of the product mix has also taken place to keep pace with the changing agrinomical and technological developments. Presently, as many as 19 large sized plants are in operation; these are in addition to a number of single super-phosphate units located in various parts of the country. The country has also embarked on a very large programme for capacity expansion. As a part of this programme, 21 projects are in different stages of implementation; some more proposals for additional capacity are also expected to get firmed up soon and may be taken up for implementation, depending, among other things, on the availability of resources. With the completion of all these projects under implementation and others approved for implementation, the total capacity would rise to about 6.5 million tonnes of nitrogen and 1.78 million tonnes of P₂O₅. On the organisational side, there is a high level committee of Secretaries in the Department of Fertilisers & Chemicals to oversee all matters relating to development of additional capacity and optimisation of production in the operating units. As a nodal agency the Committee gives composites clearances in regard to Industrial Licensing, Capital Goods Clearance and Foreign Collaboration Approvals.

The draft Fifth Plan document envisages a capacity target of about 6 million tonnes 1978-79 and a production target of 4 million tonnes of nitrogen. Because of the resources constraint it has become necessary to rephrase some of the these projects; as a result it is now excepted that production by 1978-79 may be about 3 million tonnes of nitrogen and .9

million tonnes of P_2O_5 . Since, however, the requirement of fertilisers by 1978-79 have been currently assessed at 5.2 million tonnes of nitrogen and 1.8 million tonnes of P_2O_5 , there would be a gap between the demand and indigenous availability and this may have to be bridged by imports to the extent possible.

In any appraisal of the growth of our fertiliser industry, it would have to be appreciated that the industry is highly capital intensive with a long gestation period. A plant of standard size based on naphtha (i.e. with a capacity of 900 tonnes of ammonia per day) may cost about Rs. 130 crores; the capital outlay would be even more for a fuel oil or a coal based plant. The financial magnitudes involved are thus so large that private sector projects would have to lean very heavily on public financial institutions for the financial support needed by them. The funds available with such institutions are limited and would have to be deployed for developing the various sectors of the national economy. The public sector in this field already plays a dominant role and this trend would get even more pronounced in the programme for expansion of fertiliser capacity.

So far, the preferred feedstock for production of nitrogenous fertilisers has been naphtha, but since naphtha availability would not be adequate to sustain the programme envisaged above, a policy decision has been taken that there should be maximum diversification of the feedstock and that as far as possible, fertiliser capacity should be developed on other feedstock like heavier petroleum fractions and coal. The Nangal Expansion, the Sindri Modernisation, the Bhatinda, Panipat and Haldia projects and a few of the projects in the private sector are being based on fuel oil as the feedstock. In addition, three large sized coal based plants are coming at Talcher (Orissa), Ramagundam (Andhra Pradesh) and Korba (Madhya Pradesh). Each of these coal plants has a capacity for production of 900 tonnes of ammonia per day or about half a million tonnes of urea per annum and would absorb about 1 million tonnes of coal per annum, plentiful supplies of which are available over wide areas.

Considerable progress has been made in the development of facilities for design, engineering, fabrication, erection, commissioning and operation of the fertiliser plants. In this context, external assistance is limited to supplies and services not

available in the country. Over the years, the country has also developed a wide enough and diversified industrial base geared especially to meet the specialised requirements of the fertiliser industry like high pressure vessels, pumps, heat exchangers, etc. Special mention in this connection will have to be made of the achievement of the Fertiliser Corporation of India in the field of catalysts. A number of catalysts required for the manufacture of fertilisers are now produced by the FCI on the basis of their own technology. As a result of all these efforts, the foreign exchange content in fertiliser plants has been brought down from the level of 55 to 60 per cent to about 30 to 35 per cent.

The foregoing paragraphs attempt to bring out briefly the progress made by the fertiliser industry in the public, the private and the cooperative sectors in the past few years and the measure of success achieved towards reaching the goal of self-sufficiency in fertilisers. As already stated, this industry is in the 'core' sector and it will be the constant endeavour of Government to afford maximum assistance for the development of the industry keeping in view the resources position, technological capabilities and other relevant factors."

5.3. According to the information furnished by the Department of Fertilisers & Chemicals, while 11 plants in operation in the public sector accounted for an installed capacity of 11.16 lakh tonnes in terms of nitrogen, one plant in the cooperative sector and 7 plants in the private sector accounted for an installed capacity of 11.16 lakhs tonnes in terms of nitrogen. A further quantity of 0.20 lakh tonnes of nitrogenous fertilisers could be obtained as a bye-product from the coke/coke oven plant in the private and public sectors. Thus, the installed capacity for the production of nitrogenous fertilisers in respect of plants in operation works out to 21.96 lakh tonnes in terms of nitrogen. Similarly, the total installed capacity in respect of phosphatic fertilisers is 6.87 lakh tonnes in terms of P_2O_5 , of which 2.02 lakh tonnes are contributed by the public sector, 3.58 lakh tonnes by the private sector and 1.27 lakh tonnes by the cooperative sector respectively. Details of the plants in operation and their installed capacity are indicated in Appendix XVIII.

5.4. Details of the fertiliser projects under implementation and approved for implementation were also furnished to the Committee by the Department of Fertilisers & Chemicals and these are indicated in the following statements:

I. *Projects under implementation.*

(Capacity in '000 tonnes of nutrients)

Name of the Factory	Capacity	
	N	P ₂ O ₅
A. <i>Projects in advanced stages of completion.</i>		
(a) <i>Public Sector.</i>		
Barauni	152	..
Namrup II	152	..
Khetri . . . . .	..	90
(b) <i>Private Sector.</i>		
Vizag	3	31
Tuticorin*	258	51
Total all sectors.	565	172

Name of Factory	Capacity	
	N	P ₂ O ₅
B. <i>Other projects under implementation.</i>		
(a) <i>Public Sector.</i>		
Trombay**	18	18
Talcher	228	..
Ramagundam	228	..
Haldia	152	75
Gorakhpur Expansion	51	..
Cochin II	40	114
Korba	228	..
Sindri Rationalisation . . . . .	..	156
Nangal Expansion	152	...
Sindri Modernisation	129	..
MFL. . . . .	..	20
Bhatinda	235	..
Trombay IV	75	75
Panipat	235	..
(b) <i>Private Sector.</i>		
Mangalore	160	..
(c) <i>Co-operative Sector.</i>		
Phulpur	228	..
Total all sectors	2159	45 ^B

*Commissioned in June 1975 and under trial production.

**De bottle-necking

II. *Projects approved/approved in principle for implementation.*

(Capacity in '000 tonnes of nutrients)

Name of the Factory	Capacity	
	N	P ₂ O ₅
<i>(a) Public Sector.</i>		
Mathura	235	..
Paradeep	345	300
Trombay	130	..
<i>b) Private Sector.</i>		
Kota Expansion	345	..
Kakinada	228	82
<i>(c) Co-operative/Joint Sector.</i>		
Maharashtra Co-op. Fertilisers & Chemicals Ltd.	51	..
GSFC Expansion	243	..
Karnataka State Industrial & Investment Corpn. . . . .	..	83
Total all sectors	1577	465

Thus, the total capacity of all the fertiliser plants in operation and of projects under implementation or approved/approved in principle for implementation works out 6.5 million tonnes in terms of nitrogen and 1.78 million tonnes in terms of P₂O₅.

5.5. In reply to Unstarred Question No. 179 dated 9 March, 1976 on the progress made so far towards the achievement of self-sufficiency in fertilisers and whether Government were satisfied with the progress made by the fertiliser factories in the country, the Deputy Minister in the Ministry of Petroleum & Chemicals, had stated:

"A large-scale programme is under implementation in the public, private and cooperative sectors for augmenting the indigenous capacity for production of chemical fertilizers. The performance of the various units is continuously monitored and such measures, are necessary, are taken to overcome the various constraints which are found to inhibit production and ensure their satisfactory and efficient performance. As a result, the overall performance of the industry, in terms of capacity utilisation, has improved very substantially.

Further, with the implementation of the above programme, the capacity, which presently stands at 25.09 lakh tonnes of nitrogen and 6.9 lakh tonnes of P₂O₅, is expected to go up to 65 lakh tonnes and 17 lakh tonnes respectively. The increased production arising from substantial addition to capa-

city, as envisaged above, should help narrow appreciably the gap between demand and indigenous availability of fertilisers.”

5.6. As has been pointed out in paragraphs 1.13 and 1.14 of this Report, there has been a substantial gap between the installed capacity of the indigenous fertiliser industry and its actual production. It would be seen from the table in paragraph 1.13 that while the capacity for the production of nitrogenous fertilisers had registered an increase of 126.4 per cent and 253.8 per cent respectively during the Third Plan and Fourth Plan periods, the actual production of nitrogenous fertilisers was only 40.5 per cent of the available capacity in the last year of the Second Five Year Plan (1960-61), 42.5 per cent in the last year of the Third Five Year Plan (1965-66) and 54.6 per cent in the last year of the Fourth Plan period (1973-74). Similarly, in respect of phosphatic fertilisers also, while the available capacity had increased by 140.0 per cent and 145.6 per cent respectively during the Third and Fourth Plan periods, actual production was only 54.7 per cent of the available capacity in 1960-61, 48.7 per cent in 1965-66 and 57.7 per cent in 1973-74.

5.7. Reviewing the under-utilisation of the capacity of the fertiliser plants in the public sector, the Estimates Committee (1972-73) had, in paragraph 2.86 of their 40th Report (Fifth Lok Sabha), observed, *inter alia*, as follows:

“The Committee consider that it is nothing short of tragic that at a time when the country requires more and more fertilisers in order to step up agricultural production to meet the requirements, the fertiliser plants in the public sector should not be able to produce as per their installed capacity. In the case of single superphosphate, the production was 39 per cent in 1970-71 and 36 per cent in 1971-72. In the case of phosphatic fertilisers, the production rose from 57 per cent in 1970-71 to 71 per cent in 1971-72, while in the case of nitrogenous fertilisers, it rose from 57 per cent to 61 per cent. During 1972-73, a slight improvement has been claimed during the first half of the year, but the final position is unlikely to be much different particularly in view of the power cuts and industrial relations. The Committee see no reason why Government and the project authorities could not accelerate the pace of development. They would like Government to analyse, in detail, the reasons for which each of the plants in the public sector has not been able to achieve production according to its full rated capacity and to take concerted measures to achieve it by a date to be specified in this behalf. The Committee need hardly stress that in carry-

ing out the analysis and the follow-up action, the best technical talent in the country should be utilised. The Committee would also suggest that the performance of each of these plants should be reviewed at a high level in the Government at least once in every quarter so that on-course remedial measures, as necessary, can be taken to achieve maximum production at the earliest."

Again, in paragraphs 1.22 to 1.24 of the Report, the Committee had observed:

- "1.22. The Committee are constrained to note that the net addition of installed capacity for the production of fertilisers in the country during the Fourth Plan period is likely to be only 13.99 lakh tonnes as against the original Plan target of 27.55 lakh tonnes. According to revised estimates the annual production of fertilisers is likely to increase during the Plan period by 9.45 lakh tonnes only (from 7.55 lakh tonnes in 1968-69 to 17 lakh tonnes in 1973-74) as against the original Plan target of an increase by 26.45 lakh tonnes. Thus, with reference to the original plan targets, the achievements in the case of installed capacity and production are likely to be only 51 per cent and 36 per cent respectively. Sizeable shortfalls have similarly been noticed in the achievement of financial targets covering expenditure on public sector projects. The Committee also note that to cover up the sizeable shortfall in achievements, Fourth Plan targets have been scaled down from time to time and the achievements are indicated against the revised targets."
- "1.23. The Committee are averse to the *ad hoc* manner in which the fertiliser capacity and production targets were fixed for the Fourth Plan period by the Planning Commission and the Ministry of Petroleum and Chemicals. They are also surprised at the leisurely manner in which the public sector projects were identified and finalised even though the Fourth Plan envisaged their implementation within the Plan period. They also feel that the capital intensive, long gestation and low profitable nature of the fertiliser industry was a sufficient warning for the Government that the private sector may not have an impressive role to play in this field; yet, Government had not taken up in advance preparation for a maximum effort in the public sector to achieve the targetted capacity."
- "1.24. The Committee hope that the poor achievements in the past would provide a spur to the authorities concerned to urgently

rationalise the procedures for clearance of projects, streamline the implementation machinery and achieve maximum production in shortest time so that pressure on foreign exchange needed for import of fertilisers may be relieved and the country attains a degree of self-sufficiency in this field.”

Dealing with the delays in the commissioning of new plants, the Estimates Committee, in paragraphs 2.75 and 2.76 of the Report, had recommended, *inter alia*, as follows:

“2.75. The Committee are unhappy that considerable delays ranging from six months to three and a half years have taken place in the commissioning of the fertiliser projects in the public sector leading, *inter alia*, to a sizeable escalation of cost of putting up the projects. While some part of the delay might have been due to reasons beyond the control of the project authorities, the Committee feel that at least some part of it could have been avoided by a more effective coordination as between different agencies of the Government. Government have set up Coordination Committees for the Cochin and Durgapur Projects to review critically the progress of implementation of these projects at regular intervals. The Committee suggest that such Coordination Committees should be set up for each of the other projects under implementation.”

“2.76. The Committee also note that the procedure for economic appraisal of the projects and the release of foreign exchange therefore is being streamlined. They also note that the engineering and equipment for the fertiliser projects is being standardised so as to facilitate setting up of identical plants speedily. The Committee regret that Government have thought of these measures only now when the fertiliser programme during the Fourth Five Year Plan has gone away. The Committee trust that the new measures taken by Government would lead to speedy implementation of the projects so that the targetted capacities for the Fifth Plan are achieved in time.”

Reviewing, two years later, the position in this regard, the Estimates Committee (1974-75) had, in paragraph 3.23 of their 76th Report (Fifth Lok Sabha), recommended, *inter alia*, as follows:

“The Committee, in paragraphs 2.75 and 2.76 of their 40th Report on Fertilisers (1972-73) had observed the considerable delays taking place in the commissioning of fertiliser projects in the

Public Sector. At that time, the Committee were informed that Co-ordination Committees had been appointed for Cochin and Durgapur projects to review critically the progress of implementation of these projects at regular intervals. The Committee were also informed at that time that the procedure for economic appraisal of the projects and the release of foreign exchange therefore was being streamlined and the engineering and equipments for the fertilisers projects were being standardised so as to facilitate setting up of identical plants speedily. The Committee had suggested that Co-ordination Committee on the pattern of those of Cochin and Durgapur projects should be set up for each of the other projects then under implementation. The Committee regret that despite these earlier observations and recommendations of the Committee, little progress has been made in setting up the licensed capacities in the Public Sector and that many units have not gone on-stream for years. The Committee would like to point out that delays in commissioning of the fertiliser plants are leading to progressive escalation of cost of setting up the projects and continuing drain on the public exchequer on account of imports which have now become very costly in view of their scarcity value in the internal market. They, therefore, emphasise the imperative need for reducing the period for the commissioning of the plants to the minimum and to maximise indigenous production of fertilisers so as to achieve self-sufficiency in the matter of fertilisers at an early date. They also recommend that all factors coming in the way of fuller utilisation of the existing installed capacity should be attended to on an urgent basis. At the same time, a time bound crash programme should be formulated for the creation of additional production capacity in the country to meet the demand."

5.8. On the Committee drawing attention, during evidence, to the wide gap between the indigenous capacity of the fertiliser industry and its actual production and to the recommendations/observations of the Estimates Committee in this regard, the Secretary, Department of Fertilisers & Chemicals stated:

"You were kind enough to refer to EC's report. We have to examine three things. Is Government following an investment policy in tune with needs of the country on fertiliser? Secondly, are plants operating efficiently? Thirdly, what about forecasting and estimating? From 85 thousand tonnes capacity at the end of the First Plan it went up to 19.8 lakh

tonnes in 1974-75 and capacity has gone up in current year to 22 lakh tonnes of nitrogen. This means, so far as investment policy is concerned, Government has ensured 2500 per cent growth rate of this industry from First Plan to the Fifth Five Year Plan."

On the Committee pointing out, in this connection, that while the growth in capacity had been satisfactory and even impressive, actual production had not kept pace commensurately, the witness replied:

"I will first speak about investment and then about production. So far as Government is concerned, the first question which you have a right to ask is, is the Government serious about fertiliser investment? The figures would indicate that the Government as an investor has put in an enormous amount of money for building up indigenous fertiliser capacity. As a matter of fact, the growth rate is about 2500 per cent. I will be placing before the Committee the counter-part figures of other core sectors like steel, coal and petroleum products wherein you will find that the growth rate of investment in so far as fertiliser is concerned is really of a high order."

Asked whether there should not be adequate correlation between the growth in investment and growth in production, the witness replied:

"I shall answer this. I want to deal with investment first, comprehensively. These figures which represent the capacity in the entire country, both public and private sector. Public Sector investments have to come from the public exchequer and they have got to be included in the Plans.

The private sector investments of course come from the market though they are supported by the financing institutions. Now the Estimates Committee, as you had quoted, mentioned that perhaps the possibility of private sector making substantial investments may not materialise. I would like to point out... that of the 22 lakh tonnes capacity which exists today, a little over 11 lakh tonnes is in the public sector and the balance of 11 lakhs is, in fact, in the private sector. In the coming years, it would become a little more difficult for the private sector because of the enormous investment cost and perhaps their inability to raise such funds. In the Fifth Five Year Plan, there is a provision of Rs. 1,100 crores for the public sector investment. But, with the escalation of costs, we have suggested to the Planning Commission and the Ministry of Finance that the amount required might even touch

Rs. 1700 crores for the same capacity. This is in respect of the first aspect, whether we are serious about investment."

In support of the contention that the growth rate of investment in so far as fertilisers were concerned was really of a high order, the Department of Fertilisers and Chemicals furnished subsequently the following comparative statement* indicating the investments made by Government in the public setcor, during 1970—75, in the Fertiliser Sector and other core sectors:

(Rupees in crores)

	1970-71	1971-72	1972-73	1973-74	1974-75
*Steel	187.37	191.25	196.70	179.72	245.84@
*Coal	16.78	20.10	30.06	43.60	172.74
Petroleum	26.82	25.38	28.12	22.55	69.53
**Fertiliser	41.60	65.54	105.68	117.65	200.88

*Based on information received from Department of Steel and Coal. The investment in the Steel sector also includes the expenditure incurred on the activities of the National Minerals Development Corporation, Hindustan Steel Works Construction Limited, Steel Authority of India Limited, Metal Scrap Trading Corporation, Bharat Goking Coal Limited and Iron Ore Board, as well as a few other items.

@ Provisional.

**While the figures relate only to the investment made by Government in the public sector, substantial investment has also been made, in the case of the fertiliser industry, by the private sector during this period.

5.9. Dealing with the gap between installed capacity of the fertiliser industry and actual production, the Secretary, Department of Fertilisers and Chemicals stated in evidence:

"The figures indicate that we are not operating at a very high capacity. Firstly, the international norm for comparable chemical and fertiliser plants today is approximately 82 per cent utilisation of capacity. The average utilisation of capacity including the most advanced countries in the world in similar plants is 82 per cent. In the case of our country, you will notice that the figure for 1973-74 indicated about 52 to 53 per cent capacity utilisation. In 1974-75, it has gone up to 58.5 per cent capacity utilisation and in the current

* Not vetted in Audit.

year, 1975-76, we are now planning—I am very confident this will be achieved—to raise it to 71 per cent capacity utilisation.”

The witness added in this context:

“I would like to make one submission to the Committee, for the Committee’s consideration, that the plants which we have in operation, really fall into three categories. Category ‘A’ are extremely old plants like Sindri and Udyoga Mandal and now to some extent the original investment in Trombay. The capacities which are mentioned here are the capacities which were originally installed in Udyoga Mandal and Trombay. In Sindri, we have somehow managed to run the Plant. It is not possible in the case of extremely old plants, to operate them at the optimum capacity and as years go by, their capabilities may be weakened. As a matter of fact, we feel that what is going on in Sindri, what is going on in Udyoga Mandal, is nothing short of a miracle. The fact that our technologists and managers are running the plants, which in other countries, would have been scrapped long ago, is extremely credit-worthy. These plants should have been closed because they are extremely old. But they are being run because we cannot just afford to close these plants. This is category ‘A’.

Category ‘B’ plants are those plants which have been installed and have now reached what we call stabilisation. In the case of these stabilised plants—like Gorakhpur in the public sector, Namrup in the public sector, IFFCO plant at Kaleri in the cooperative sector and the GSFC plant in Baroda in the private sector—these are plants which are now less than five years old and which have reached stabilisation and I am glad to tell you that these plants are operating at extremely good capacity utilisation. In the case of GSFC plant, they are operating now at over 92 per cent capacity utilisation. Their only constraint is directly related to power supply. Right now, the Bhakra Board is giving us ample power supply and the plant is working at 80 per cent capacity. Gorakhpur is one of our bright plants. They are operating now at over 85 per cent capacity.

Category ‘C’ plants are the new plants, the ones which have been recently commissioned. Even in our investment decisions, we assume that in the first year, the plants will operate at

50 per cent, it will build up to about 65 per cent in the second year and in the third year, it will reach 80 per cent capacity utilisation. Some of our plants, and I am mentioning both the public sector and the private sector, are now going through this period. Durgapur and Cochin have very special technological problems. I think, the Committee has gone into the problems of Durgapur. But, may I point out, and it is very revealing, that even the private sector plants, which are under capable managements and which do not come under what may be considered to be, wrongly I believe, the controls and rules of Governmental organisations, are experiencing precisely the same problems. The SPIC plant at Tuticorin is today operating at only 50 per cent capacity utilisation. It has an excellent management. They have some technological problems which they hope to solve. The Kota plant of the Shrirams started off with a bang. It started with 100 per cent but, due to technical problems, the capacity utilisation fell sharply to 60 per cent. The Madras Fertilisers, a joint venture where the management is in the hands of experienced people, who have run fertiliser plants abroad, started extremely well but ran into technical difficulties including a major accident. The point I am making is that this third category of new plants have to go through a period, till they reach stabilisation. I would request the Committee, therefore, to view the capacity utilisation of our plants with reference to the spread of investment in extremely old plants, stabilised plants and new plants. It is our endeavour to bring all the plants to a high degree of stability and we will not be satisfied unless we reach 80 per cent capacity utilisation. This year we have taken up the task of raising the capacity of the existing plants by 12 per cent, from 58.5 per cent to 71 per cent—12½ per cent increase in capacity utilisation. Only the end of the year can say whether we can achieve it.”

Elaborating further on this subject, the witness stated:

“...there has been a progressive improvement from year to year and I have promised to give a detailed statement on three categories I have mentioned...indicating the capacities separately which will show that in the case of stabilised plants the capacity utilisation has been reasonably good varying from 75 to 80 per cent. In individual cases it is even above 90 per cent. In the old plants the decline has set in. Believe me that the decline will persist in the years to come and there will be lesser production from certain plants like Sindri, Neyveli and probably Trombay also. I am afraid, I must

make it clear that this will be a continuing problem for the next ten years. Every year when new plants are commissioned, we will be facing this in regard to installed capacity which, in the first year, would as I mentioned, operate at 55 per cent. However, every year when the new plants go on stream, then the total installed capacity in the country goes up but the new plants do not operate at more than 50—52 per cent. However, our plan is that we will be monitoring the system of project implementation a little more satisfactorily. If the plants are actually commissioned much faster, the planned capacity utilisation to the total would improve. Therefore, as I have promised, I will give the statement broken up into three categories to establish that in the case of stabilised plants we fare reasonably well while in the case of old plants we have problems which will continue and it was in the case of the new plants that we make the assumption of a three year cycle for stabilised utilisation.”

5.10. A statement furnished subsequently by the Department of Fertilisers and Chemicals indicating the utilisation of capacity, during the period 1970-71 to 1974-75, of individual fertiliser plants in the country, under the three broad categories referred to in the preceding paragraph, is reproduced in Appendix XIX. At the instance of the Committee, the Ministry of Chemicals and Fertilisers have sent another similar statement for the years 1975-76 and 1976-77 which is reproduced at Appendix XX. According to these statements, the aggregate utilisation of capacity as between the three broad categories of plants is as follows:

Category 'A'—Old plants and those with built-in constraints	45 to 49.8 per cent.
Category 'B'—Stabilised Plants	71 to 83.6 per cent.
Category 'C'—New Plants	17 to 43.2 per cent.

The Department also furnished to the Committee a note on the constraints limiting production in category 'A' plants, which are briefly discussed below:

1. *Sindri*: One of the oldest units with certain sections, operating for nearly 20 years. Equipments worn out and have already outlived their normal life.

2. *FACT, Udyogamandal*: Certain sections of the Plant have been operating over a long period of time with equipments which have outlived their normal lives. The unit is also faced with limitations arising out of maintenance of multiple units and equipment and limitation in the production facilities arising out of inter-dependence of a large number of units.

3. *Rourkela*: Basic problem faced by the unit is the inadequate availability of coke oven gas, which is one of its feedstocks, even after commissioning the naphtha gasification unit, the supply of coke oven gas to cover the balance requirement has been much below the anticipated level.

4. *Neyveli*: (i) Defective design and equipment, multiplicity of streams and obsolescence of technology in certain sections of the plant.

(ii) Quality of lignite is poor and differs from the original designs specifications.

(iii) Problems in the sulphur removal and carbon dioxide sections.

(iv) Dust in the raw gas entering the chambers.

According to the information furnished by the Department to the Committee, the utilisation of capacity in some of the stabilised plants (Category 'B') was also below 70 per cent in some years. The reasons therefore as intimated by the Department, were as follows:

1. *Nangal*: The unit operated at less than 70 per cent of its rated capacity during the years 1970-71, 1972-73 and 1974-75 solely because of power cuts. Production loss on this account during these three years was 26,000 tonnes, 26,018 tonnes and 39,800 tonnes of nitrogen respectively. Even during the years 1971-72 and 1973-74, the unit lost 23,200 and 21,000 tonnes of nitrogen respectively on account of power cut. This unit is capable of operating near its rated capacity, given its full quota of power which is its feedstock; this is very well demonstrated by the fact that during the first six-months viz. April—September of the year 1975-76, the unit has produced 34,400 tonnes of Nitrogen which represents a capacity utilisation of 87.3 per cent.

2. *Trombay*: Frequent mechanical breakdowns have been largely responsible for low capacity utilisation.

3. *Namrup*: The unit went into commercial production in 1968-69. Production during the earlier years of its operation was low due to problems of catalyst, limitations of ammonia feedpump and ammonia refrigeration condensers, process problems. Since 1972-73, however, the unit is operating well as will be seen from statement.

4. *Madras*: The unit went into production in October 1971 and was in the process of stabilisation during 1972-73. During the year 1974-75, the unit operated only at 50.6 per cent capacity because the plant had a serious accident in June 1974 when it had to remain shut down for about three weeks. The plant was again shut down due to leaks in the reformer tubes and was commissioned only by the middle of November 1974.

3. *Baroda*: The unit operated at 69 per cent of its rated capacity during 1970-71 due to power and mechanical problems; the loss due to power cuts/interruptions was 7000 tonnes of nitrogen during that year.

6. *Vizag*: Production was comparatively low during 1973-74 and 1974-75 due to factors like equipment failures and power cuts.

7. *Kanpur*: Capacity utilisation during the years 1970-71, 1971-72 and 1973-74 has been low because of various reasons. The unit commenced commercial production in 1969-70 and was in the process of stabilisation in 1970-71; during 1970-71 some production was lost also on account of power cuts (2200 tonnes of nitrogen).

During the year 1971-72, the unit incurred production loss to the extent of 24,499 tonnes of nitrogen due to labour trouble.

Again in 1973-74, the unit incurred heavy production losses on two accounts—labour trouble: 22,800 tonnes of nitrogen and power cut: 51,000 tonnes of nitrogen.

5.11. Since it had been contended that the international norm for comparable chemical and fertiliser plants was about 82 per cent utilisation of capacity, the Committee desired to know the extent of utilisation of fertiliser plant capacity in countries like Saudi Arabia, Kuwait, etc., where conditions similar to those in India might exist, and in the United States of America, Japan, USSR and the East European countries. In a note furnished in this regard, the Department of Fertilisers and Chemicals informed the Committee that a meaningful comparison of the productivity in the Indian Fertiliser Industry with the conditions obtaining in the fertiliser industries in other parts of the world was made considerably difficult by the lack of readily available and suitable data. However, on the basis of a study made by the Fertiliser Association of India, the Department furnished details of the rated capacity and percentage capacity utilisation of fertiliser plants in some countries, in respect of which data were available for the year 1972-73, which are indicated in the following table:

Plant	1972-73		Per cent capacity utilisation
	Annual Capacity	Production	
1	2	3	4
1. Austria : Oesterreichische Stickstoffwerke AG .	530	230	43
2. Switzerland : Emserwerke AG	20	27	90
Lonza AG	10		
3. Finland : Kemira oy, Oulu	204	243	110
4. Albania : Location : Vlone	41	36	88

1	2	3	4
5. Iran : Iranian Fertilizer Co., Shiraz . . .	31	} 108	96
Shapur Chem. Co., Bander-e-Shapur . . .	272		
6. Iraq : Government Plant, Basra . . .	65	20	91
7. Israel : Chemical & Phos., Haifa . . .	66	24	96
8. Kuwait Chem. Fert. Co., Shuaiba . . .	109	} 270	46
Kuwait Petrochemical Ind. Co., Shuaiba . . .	478		
9. Burma : National Fert. Co., Sale . . .	33	} 50	76
National Fert. Co., Pagan . . .	33		
10. Indonesia : Petrokimia, Gresik . . .	58	} 60	21
P.T. Pulpuk Sriutdgaja, Folem Bung	228		
11. Philippines : Meria Christina Fert. Corp., Ligon	27	} 55	47
Planters Products, Limay . . .	90		
12. Malayasia : Esso Standard Malaysia Ltd., Port Dickson	41	40	98
13. Thailand : Chem. Fert. Co. Ltd., Mae Moh . .	27	8	30
14. Algeria : Sonatrach, Arzew	271	50	18
15. Rhodesia : Sabla Chem. Ltd., Que Que . . .	90	58	65
16. Cuba : Cienfuegos Plant, Cienfuegos . . .	190	} 11	5
Raul Cepero Bonilla, Matanzas . . .	27		
17. Trinidad : Federation Chem. Ltd. Point Lisas .	185	114	62
18. Colombia : Amoniaco del Caribe SA, Cartagena	118	} 72	53
Fertilizantes Colombianas, Barranca- barreja	19		
19. Peru : Cuzco Corp., Cachimay Fertilizantes Sinteticos, Callo	13 22	27	77
20. Venezuela : Instituto Venezolano de petro- quimica (IVP), Puerto Moron	190	5	3
Average :			50

Note :—The countries noted here have only those plants which have been shown against each of them.

Ref :— 1. World Fertilizer Atlas, 4th Edition, British Sulphur Corporation Ltd., 1973.
2. Monthly bulletin of Agriculture Economics & Statistics, FAO, 23(3), 19-22 March 1974).

The Department added that while the capacity utilisation in respect of these plants varied from 3 to 119 per cent (representing an average utilisation of about 50 per cent which was much lower than the average capacity utilisation in India for the same year), adequate data, however, were not available to explain the reasons for the low capacity utilisation in the plants listed, nor were data available to compare capacity utilisation of individual plants in developed countries.

5.12. The Department of Fertilisers and Chemicals also furnished comparative figures of total nitrogen capacity utilisation (during the years 1967 to 1972) and P_2O_5 (Phosphatic fertilisers) capacity utilisation (during the period 1965 to 1967) in some selected regions of the world, which are tabulated below:

Total nitrogen capacity utilisation in some selected regions of the world

Region	1967	1968	1969	1970	1971	1972
India*	55	61	53	63	62	70
North America	52	59	58	61	65	66
West Europe	68	69	68	58	56	55
East Europe & USSR	63	69	66	68	69	65
Japan	86	93	96	62	52	43
Israel	76	79	85	91	40	47
South Africa	33	24	38	54	53	49
Oceania	16	20	26	43	43	59
Latin America	57	48	46	47	50	47
Developing Africa	124	115	96	27	34	35
Developing Asia	26	40	51	50	34	43
Other Asia	48	51	54	59	59	88
World	59	63	63	60	61	60

*Figures are on April-March basis.

Ref: World Fertilizer Market Review and Outlook, TVA, 1974: pp. 41, 43.

N and P₂O₅ Capacity utilisation in some selected regions of the world

Region	Per cent capacity utilisation					
	1965		1966		1967	
	N	P ₂ O ₅	N	P ₂ O ₅	N	P ₂ O ₅
India*	72	63	59	52	55	62
North America	82	78	64	76	62	74
Western Europe	77	87	83	82	74	83
Eastern Europe	81	85	92	63	87	77
Asia (Less Japan)	62	74	63	65	71	60
Oceania and Japan	95	85	86	71	87	71
Africa	67	59	66	54	56	52
Latin America	44	60	56	48	60	51

*Figures are on April-March basis.

Ref: Estimated World Fertilizer Production Capacity as related to Future Needs 1967 to 1972—80; TVA, June 1968: pp. 18—21.

With reference to these figures, the Department stated that by and large, the overall performance of the industry in India with respect to nitrogen was comparable both with the developing and developed countries and that during 1972, productivity in India was higher than the world average. As regards P₂O₅ (Phosphatic fertilisers), the Department informed the Committee that relevant comparative data were available only for the period 1965-67 which showed that the performance in India was lower than that in the developed countries. The Department, however, added that the position as at present was likely to be quite different in the context of the steps taken in the recent past to improve the productivity of the P₂O₅ units in India.

5.13. At the instance of the Committee, the Ministry of Chemicals and Fertilisers have furnished the following statements indicating the capacity utilisation of nitrogen in some selected regions of the world during 1974-75 and in selected individual countries in 1973-74 and 1974-75:

Capacity utilisation of Nitrogen in some selected regions of the World

Region	Capacity Utilisation (%)	
	1974-75	
1. India	59.5	
<i>Developed Market Economies</i>		
2. North America	64	
3. Western Europe	66	
4. Occania	51	
<i>Developing Market Economies</i>		
5. Africa	46	
6. Latin America	42	
7. Near East	50	
8. Far East	60	
<i>Centrally planned Economies</i>		
Asia	68	
Europe and USSR	71	

Note :— 1. Capacity utilisation for regions other than India has been worked out by Fertilizer Association of India, New Delhi.

2. FAI have taken the capacities for 1974-75 for countries other than India from "Annual Fertilizer Review—FAO 1974" and actual production figures for 1974-75 from "Annual Fertilizer Review—FAO 1975" respectively.

Statement showing capacity utilisation of Nitrogen in 1973-74 and 1974-75 in selected individual countries

Country	Capacity Utilisation (%)	
	1973-74	1974-75
1. India	58.4	59.5
2. China	72	76
3. Japan	59	64
4. Iran	43	43
5. France	66	68
6. F.R.G.	59	63
7. Italy	60	58
8. U.K.	50	59
9. U.S.S.R.	86	87
10. U.S.A.	74	68
11. Canada	71	70
12. Kuwait	54	51
13. Saudi Arabia	37	50
14. South Korea	79	75

Note :—For countries other than India, capacity utilisation has been worked out by FAI. The capacities have been taken by FAI, from the publication "Long term forecast for World Nitrogenous Fertilizer Demand & Supply"—October, 1975 and July, 1976—UNICO, Japan and production figures have been taken from "Annual Fertilizer Review"—FAO—1975.

5.14. As against the installed capacity of 19,39,000 tonnes of nitrogenous fertilisers in the last year of the Fourth Plan (1973-74), the installed capacity in the first year of the Fifth Plan (1974-75) was only 19,81,000 tonnes, representing an increase of only 2.2 per cent, which was relatively insignificant compared to the capacity available in the preceding year. The production during 1974-75 had also increased only by 1.2 per cent over the previous year. Asked why there appeared to be a sudden fall in the rate of improving the capacity as well as in the production in the first year of the Fifth Plan, the Secretary, Department of Fertilisers & Chemicals replied in evidence

“There are two aspects to that. One is the improvement of the capacity utilisation if plants settle down and the other is increase in the installed capacity from year to year.

So far as the latter question is concerned, the commissioning of new plants gives you this growth rate in installed capacity, in any year, even if one major plant is commissioned. For instance, for the new and bigger plants, their actual capacity is ranging anywhere between 1.5 to 1.7 lakh tonnes. Normally, one plant can give you approximately a 10% increase in total capacity. This year, for instance, when four plants are to go on stream—SPIC, Mangalore, Namrup and Barauni plants—it means that this being a flag year, even if all of them are commissioned, the installed capacity will not normally operate at more than 50 per cent. It will bring down the overall capacity utilisation of the country.”

He added:

“In the case of the stabilised plants, there is an annual improvement in the capacity utilisation. But, in the case of the older plants, there is an annual decline in the capacity utilisation. In the case of the new plants there is a three year's gestation. If you are looking at any year, the break-up will throw up the realities of the situation. For instance, this year, if we commission the four plants, there would be a fall in the utilisation capacity of the total system as compared to last year. . . . This year, that is in 1975-76, assuming for a moment, that we do not commission any of these four plants, the utilisation of capacity is going to be better than last year.”

5.15. Explaining, at the Committee's instance, the constraint in the way of optimising production of fertilisers in the country, the witness stated in evidence:

"We are doing our best to see that the gestation periods are reduced We face four basic constraints. One is availability of power supply which is so critical to us and you will appreciate that it is completely outside the control of fertilizer producers. This year the power supply position has vastly improved and this is going to improve fertilizer production.

* * * * *

The second constraint is labour problems. Here, I would say that the fertilizer industry has an extremely good record. The labour has been cooperative and loss of man-hours in the fertilizer industry has been very little Then, we have breakdowns in plant and equipment which, unfortunately, are much too frequent and the whole system of preventive maintenance is being revamped. We have learnt a great deal in the process—from out of these difficult and temperamental plants. If this matter is to be brought under control, we have to improve maintenance.

Fourthly, we have the question of feed-stock inputs. In plants which are based on electricity (in Nangal the feed-stock itself is electricity), their production will depend on the availability of power supply as feed-stock. Fuel-oil and naphtha have been reasonably available and now that we are making an investment in coal plants, we are planning that there will not be any constraint because of shortage of that particular feed-stock."

In a note furnished subsequently in this regard, the Department of Fertilisers & Chemicals stated:

"The Five Year Plan targets for development of capacity and production are fixed prior to the commencement of the plan period taking into account (i) target consumption envisaged for the plan period, (ii) the capacity in operation, (iii) the capacity under erection, (iv) the status of schemes planned but not firmed up, (v) the proposals under consideration, etc. on the one side and the extent to which further capacity and production can be planned and develop under favourable conditions so as to be close to the requirements. When once these targets are fixed, projections are made for purposes of planning the development of both capacity and production for each year of the plan.

In the actual implementation of the programme, the basis on which the projections were made need to be adjusted on account of factors like—

- (a) inability of the operating units to achieve the levels of production anticipated;
- (b) delay in the implementation of new projects/expansions due to equipment supply delays|labour problems|rupee financial constraints, etc.;
- (c) delays in commissioning and achieving optimum production levels due to leakages, breakdowns/failures of equipment, etc.;
- (d) extended time taken in arranging credits and finalising contract arrangements;
- (e) delays by entrepreneurs in finalising their own plans and financing arrangements;
- (f) constraints in taking up new schemes due to paucity of rupee funds. etc.

Many of these problems are not new. Under our existing set up and economy, it is not possible to make firm arrangements at the time of planning and projecting the programme. At the same time, it also calls for a set target to proceeding with the programme. In a situation of this nature the programme gets delayed and it becomes necessary to review the projections from time to time with due regard to the prevailing conditions. The programme drawn up in the very beginning does not admit of a cushion to cover up possible slippages in production performance and in the commissioning of new units. Every effort is nevertheless made to optimise production in the operating units.

At the beginning of each year, the estimates of production are reworked in consultation with the producers, keeping in view (a) the likely production from the units in operation at the beginning of the year, taking into account, *inter alia* their performance in the previous year, the condition of the operating plants and other known constraints limiting production; and (b) the likely production from units expected to go on stream during the year. In doing so, it is also assumed that the supply of power and other essential inputs and labour relations would remain normal throughout the year.

Notwithstanding the above, variations do occur between the plan targets and the estimates, as worked out at the commencement of each year; these are mainly attributable to the unexpected delay in the commissioning of new projects implementation."

5.16. Since it had been stated that the variations between plan targets and actuals were mainly attributable to unexpected delays in the commissioning of new projects under implementation, the Committee desired to know whether the delays in commissioning new plants were unavoidable and whether the factors responsible for such delays had been identified and necessary remedial measures taken. The Secretary, Department of Fertilisers & Chemicals stated in evidence:

"May I make one specific point? In plants which are built on turn-key basis—for example, Kota plant of Shri Ram Chemicals—where you place the entire contract with one foreign party, it is easy to stick to schedule. Now we have taken a deliberate policy decision in the case of many public sector plants that we will not go in for such turn-key projects. We have done this because we are anxious to build up indigenous technological capability, but there is a certain price we are paying for this. In the case of Durgapur, Cochin, Namrup and Barauni this is being done. The process know-how has been obtained from abroad for the various plants, but the basic control, designing and detailed engine ring is being done by the P&D Division of the Fertiliser Corporation and FEDO."

In a note furnished subsequently in this context, the Department of Fertilisers and Chemicals have enumerated the following factors as being responsible for the delays in completion of projects:

- "(a) Delay in supply of equipment both indigenous and imported. These delays on the part of suppliers have been often due to unforeseen factors like labour unrest in the fabricators' workshops, power cut, difficulty in obtaining material for fabrication etc.
- (b) Delay on the part of construction contractors;
- (c) Difficulties in fabrication of some sophisticated equipment being indigenised for the first time;
- (d) Labour unrest;
- (e) Availability of construction and structural items like steel, cement etc.

- (f) Failure of critical items of equipment including imported equipment;
- (g) Delays due to adoption of new technology on a large scale."

5.17. It would be seen from the preceding paragraph that delay in supply of equipment for fertiliser plants has been cited as one of the factors responsible for the delay in completion and commissioning of new projects under implementation. Dealing with this aspect, the Secretary, Department of Fertilisers & Chemicals stated in evidence:

"A decision was taken by us that the plants at Bhatinda and Panipat which are now under construction should be based on fuel oil. There again the philosophy is similar, that we would be producing in this country from our own refineries all the end products including naphtha and fuel oil to feed these fertiliser plants. Fuel oil is much cheaper than naphtha and the difference in price is anywhere between 35-40 dollars per tonne and an average-sized plants requires 250,000 tonnes of feed-stock. It is for this reason that the foreign exchange cost of importing fuel oil would be considerably lower than naphtha and we are also trying to reduce our dependence on sources abroad. . . . In the case of indigenous equipment there is a clear policy of the Government of India that we will indigenise and today a very substantial portion of the equipment which is used in these projects is in fact being produced in India. . . . We have companies like the Bharat Heavy Plates and Vessels, BHEL, Bharat Pumps & Compressors which are producing a range of items which we are using, including centrifugal compressors, air separation units, multi-layer high pressure units and so on and so forth. . . . The ratio in the costs of equipment indigenous to imported is about 30 per cent imported and 70 per cent Indian today. This, of course, varies according to feed-stock of the plants and the design of the plants and varies from time to time depending upon the price levels which are being quoted both by Indian companies and foreign companies.

There is one thing which I must bring to the Committee's notice. About the Indian equipment which is being supplied, we have very little complaint about the quality. In fact, I am glad to tell you that the quality of production in the Bharat Heavy Plates & Vessels is extremely good. We are extremely satisfied; so also with the compressors which are being given by the BHEL. The problem, however, is that of delivery schedules. This is a serious problem, that if we depend upon 2-3 public sector

companies to feed the entire system, there is a danger that there is an overloaded order book position and consequently there will be delay in the delivery, which is being reflected unfortunately in the delay in the commissioning of the plants. This is a conscious decision one has to take. On the one hand, it is our policy objective to encourage indigenisation of equipment and on the other hand, it is policy objective to commission the plants as early as possible to get the fertilisers. We have to make a cruel choice; we have to make a conscious choice where the Commissioning of the plant may be delayed because we are dependent on indigenous equipment. Of course I can tell you that the Ministry of Heavy Industry which is controlling these equipment supplying plants are taking very strong monitoring steps to improve the position."

He added:

"Bharat Heavy Plates & Vessels is the most critical company so far as we are concerned. They are supplying equipment for Talcher, Ramagundam, Nangal expansion and Haldia and there are complaints from FCI that the delivery of equipment by BHVP has slipped very badly. We had joint meetings at Vizag and reviewed the situation. We have been asking them to follow up and sub-contract so as to improve upon their delivery schedules and we are satisfied with the talks."

Asked, in this context, whether the delivery schedules were likely to be delayed on account of certain deficiencies and whether these could not be expedited, the witness replied:

"The delivery schedule has already been delayed because of the delays in the supply of equipment. The issue is really whether there will be a further delay. That is what we are going to avoid."

To another question whether the deliveries were likely to be impeded for a long time, the witness replied:

"Based on our experience we have some fears, but, as I said, we have great confidence in the monitoring steps that are being taken by our sister Ministry, the Ministry of Heavy Industry and our confidence is to some extent revived. But there may be slippage of anything upto 6 months on this account only."

5.18. With reference to the statement made by the witness that necessary monitoring steps were being taken by the Ministry of Heavy Industry to reduce delays in the deliveries of indigenous equipment, the Committee enquired into the details of the steps taken in this regard and the results achieved as a sequel thereto. In a note, the Department of Fertilisers and Chemicals replied:

"The Bharat Heavy Plates and Vessels have identified the following factors responsible for slippage in the delivery schedules:

- (i) Delay in receipt of imported materials, components, etc.
- (ii) Failure on the part of the customers concerned to supply free issue materials for the equipment as per the terms of the contracts.
- (iii) Power cut in the plants imposed by the Government of Andhra Pradesh.

Remedical measures:

In order to overcome the above difficulties, following measures have been adopted:

- (a) B. H. P. V. have a blanket foreign exchange allocation of Rs. 3.45 crores and Rs. 2.60 crores for import of components and materials respectively.
- (b) The company has been authorised to get the list of items to be imported attested directly from CCI&E without routing their proposals through DGTD.
- (c) The company is periodically sending senior executives to the works of the foreign suppliers to monitor the progress of orders placed on them.
- (d) The supply of free issue materials to BHPV by its customers is being closely monitored.
- (e) The Department of Heavy Industries had taken up the question of power cut with the Government of Andhra Pradesh and consequently, the Government of Andhra Pradesh have issued instructions for restoration of the power cut from 16th July 1975.
- (f) The company has offloaded some of the items on other manufacturers in consultation with their customers to ensure that the delivery schedules are maintained.
- (g) The company is monitoring the progress of the major orders by means of CPM/PERT charts.

The performance of the company and the progress of completion of major orders are being reviewed periodically by senior officers of the Ministry with the representatives of BHPV and its important customers.

The adoption of the above measures has resulted in considerable improvement in the deliveries of equipments by BHPV to its customers etc. With the present tempo of work, the Department of Heavy Industry are confident that the company will be in a position to meet the requirements of FCI etc. without further slippage."

5.19. At the Committee's instance, the Department also furnished a note indicating the extent to which indigenisation had been achieved in respect of equipment required for fertiliser plants, which is reproduced in Appendix XXI.

5.20. The Committee desired to know whether the dependence on foreign companies for fertiliser plant equipment had also led to delays. The Secretary, Department of Fertilisers & Chemicals stated in evidence:

"There had been occasions where even foreign suppliers did not stick to the time schedule. But, in the case of imports we have wider choice to make whereas in the case of indigenous equipment we have to depend on one or two manufacturers. We have to look into this matter in the context of the conflict between the two objectives."

5.21. The Committee were informed by the Department of Fertilisers & Chemicals that the reasons for the delays in commissioning of public sector plants had been gone into by a committee appointed under the chairmanship of the late Shri V. N. Kasturirangan, Chief Project Officer, Ministry of Petroleum & Chemicals, with representatives of the Fertiliser Corporation of India, Fertilisers and Chemicals Travancore Ltd., Directorate General of Technical Development, Bharat Heavy Plates and Vessels Ltd., etc. as members and that the main conclusions and recommendations of this committee were as follows:

"(1) The project authorities should be given the necessary import licences to import raw materials, where these are not available from indigenous sources in time. The issue of such licences and allotment of foreign exchange for steel import, if given as soon as a project is sanctioned, will facilitate raw materials import early enough to ensure project completion schedule being maintained. Allotment of carbon steel plates and such other indigenous steel plates required for the fertiliser industry should be given a higher priority than what was prevailing.

- (2) To overcome the difficulties experienced in procurement of raw materials, a Raw Materials Bank could be set up to stock the raw materials needed by the project authorities/fabricators.
- (3) Special efforts should be made to obtain billets and blooms of suitable quality, if necessary by imports, to enable manufacture of flanges, valves etc.
- (4) Timely imports to fabricators of electrode wires, electrical stampings, radiography films, mechanical seals and such other items not available in quality or in time.
- (5) The establishment of additional capacity for quality casting of alloy steel suited for special chemical pumps and valves.
- (6) Competency and capability of fabricators, their skill, know-how and their ability to deliver in time should be considered before denying import of any special items by DGTD. Orders are often placed on parties on the basis of their claims to fabricate the item but the parties have been unable to deliver the goods of proper quality or on time. A standing Committee consisting of the representatives of the administrative Ministry, Project authority, DGTD and the Chemical Plants Manufacturers' Association should be attached to the DGTD to consider the claims made by all such parties and take decisions which should be treated as final.
- (7) Exclusion of liberal assistance to fabricators for import of equipment and/or tools required for improvement of manufacturing skill and techniques necessary for fabrication of sophisticated equipment.
- (8) Necessary assistance to fabricators for obtaining foreign technical know-how for the manufacture of sophisticated equipment.
- (9) There should be a time-limit for the designing organisation and the project authorities for placement of all orders for machinery after a project has been sanctioned. This will ensure that sufficient time is available to the fabricators to plan their work to suit the time-schedule of the project.
- (10) Highest standards of quality should be ensured in workmanship and hence there should be no relaxation in the standard of inspection."

The Department stated further that these recommendations together with the comments of the Director General of Technical Development thereon were considered by the concerned Ministries, as also at an inter-Ministerial meeting, and action, as required, had been taken by Government. The latest position emerging as a result of these investigations was also intimated, in a note* by the Department, which is reproduced below:

"The import policy provides for import of various items of steel, including carbon steel plates, which are not available in the country in adequate quantities or of the right quality. Foreign exchange allocation for import is also made from time to time to the canalising agencies and in favour of the individual importers. In view of the easy availability of most categories of steel, including carbon steel plates and coils and forging quality steels of all categories, even plates and forging quality steel has been taken out of the purview of the Steel Priority Committee recently. The distribution procedure has also been streamlined and the consumers can now obtain their requirements of steel materials freely, directly from either the producers or from the stock yards. A steel bank was set up in 1971 under the operative control of Hindustan Steel Limited and it has been in operation since then.

At present, the supply position with regard to billets and blooms is satisfactory. In fact their availability outstrips the demand. Further, adequate import provision also exists for meeting the specific shortfall for any industrial need.

In regard to the recommendation for establishment of additional capacity for quality castings of alloy steel suited for special chemical pumps, valves, etc., it is considered that, with the capacity already established/approved, the requirements of alloy steel castings for chemical machinery manufacturing facilities would be met substantially. Creation of further additional capacity in this field was not considered necessary.

As regards the suggestion for the constitution of a committee to go into the claims of indigenous manufacturers regarding their ability to manufacture particular items, it was considered that a formal committee is not necessary. The claims of individual fabricators in regard to their competence to manufacture particular items, as are not acceptable to the indenting parties, are carefully scrutinised by the DGTD. The idea is to work towards a solution which would not upset the project schedule.

*Not vtted in Audit.

Individual requests from fabricators for the import of tools required for improvement of manufacturing skills and techniques are considered favourably. Requests for obtaining foreign technical know-how for the manufacture of sophisticated equipment from the fabricators are considered promptly on the merits of each case.

It is the constant endeavour of the project authorities to place orders for machinery on the fabricators as soon as possible after the projects are sanctioned. Efforts are concurrently made to ensure that the items produced by the indigenous manufactures are of the requisite quality.

There have, nevertheless, been slippages in the commissioning of the various fertiliser plants, as observed by the Committee. Several factors have contributed to these delays and continuing efforts are being made to overcome these difficulties and speed up plant Commissioning."

5.22. In response to the recommendations/observations of the Estimates Committee (1972-73) contained in their 40th Report (Fifth Lok Sabha) (*vide* paragraph 5.7), Government had, in December, 1973, stated, *inter alia*, that the capacity utilisation in the fertiliser plants was kept under constant review and that Government had decided to set up a team of experts for evaluating the performance of various public sector fertiliser units, identifying the factors inhibiting the fuller utilisation of capacity and suggesting measures needed to remove the inhibiting factors. Drawing attention to Government's reply to the Estimates Committee, the Committee desired to know the results of this evaluation and the improvements, if any, effected as a sequel thereto. The Secretary, Department of Fertilisers & Chemicals stated in evidence:

"Speaking specifically in terms of result, I would repeat that as against 58.5 per cent utilisation of capacity from the existing plants, which was achieved in 1974-75, this year we will achieve 71 per cent capacity utilisation. Since I am making this statement, obviously it is backed by a certain series of steps. One of the steps is debottlenecking, which involves lot of foreign finance. The World Bank has been good enough to support this programme. They have suggested that it is greatly to our advantage to make some marginal balancing investments on optimising the capacity in the existing plants rather than go in for bigger programmes for new investments."

Asked whether the appointment of the team of experts and its recommendations had made any tangible contributions, the witness replied:

"Indeed, Sir. We have programmes for de-bottlenecking for most of the plants. Sindri rationalisation will be completed in 1976. In respect of Rourkela Plant, the main bottleneck was that adequate coke oven gas was not coming from the steel plant. We have taken a decision as part of the debottlenecking that we will shift it to naphtha. The plant at Neyveli is based on lignite. Now power was always given the first priority; whatever production of lignite was available will first go to power. The plant was depending on unreliable source of supply of lignite. We have decided to shift this plant to fuel oil. Series of decisions have been taken as result of these recommendations and also suggestions from the world Bank."

Elaborating further on the remedial measures taken, the witness stated:

"One of the important steps which have been taken is that we have now separated project management from operating management. At one stage, when we were expanding the General Manager in charge of operating the plant was over-seeing the project. Now, in each case a sparate project Administrator and Operations Manager have been appointed."

He stated further:

"I want to make one more submission. This year, learning by past mistakes, the monitoring systems has considerably improved not only in our Ministry but in other Ministries as well. In conultation with our Plant Managers we have worked out a profile of which we recently got approved by the Committee of Secretaries, this will go to the Cabinet. We are enclosing the production profiles for each single plant indicating what its capacity is, what its past history is and what are the constraints in that plant etc. This is what we are proposing to do. We are now looking at it not on any theoretical basis but as a regular production plan."

Asked whether it was not a fact that some of the plants had not been able to go on stream for quite a number of years and, if so what steps were being taken to expedite the commissioning of such plants, the witness replied:

"Unfortunately, these are the two bad cases. . Namrup and Barauni. They have taken us three extra years to complete."

He added:

"It is our expectation that in the last quarter of this year, October-December, both Namrup and Barauni projects will be commissioned. We had some problems in the R&G boiler; we have flown in a team of engineers from Germany and they are in position. I have received a report only yesterday that both these plants will be on stream during the last quarter this year. Gorakhpur expansion plant will be on stream in the first week of October itself."

5.23. As regards the action taken in pursuance of the findings of the team of experts, the Department of Fertilisers & Chemicals informed the Committee, in a note furnished subsequently, as follows:

"The need for maximising fertiliser production from existing capacity has constantly been engaging the attention of the Government of India. To improve the capacity utilisation in the public sector plants, a team was set up in August 1973; the concerned organisations/departments were invited to nominate their representative. Effort were also initiated to locate a suitable expatriate expert who could be available to the teams.

In the mean while negotiations were in progress with the World Bank in regard to the financing of the project for expansion of Trombay known as Trombay-TV. During these discussions, the simultaneous need for taking necessary measures to improve capacity utilisation in public Sector units was recognised and a credit of \$ 17 million was negotiated with the World Bank for a 'Plant Operations Improvement Project'. The project which would cover the Public Sector units in FCI and FACT envisaged the formation of a technical Co-ordination Group which would review the six operating units of FCI and FACT (Gorakhpur, Namrup, Nangal, Sindri, Trombay, Udyogamandal) and identify areas where modifications and improvements can be carried out for achieving better levels of production. The Group was also to review the Durgapur, Cochin, Barauni and Namrup projects and formulate necessary measures to expedite completion and attain better levels of operation. This project did not favour the inclusion of an expatriate expert on a long-term basis in the Co-ordination group, but had envisaged use of specialists and consultants for specific studies required by the Co-ordination Group.

In the above context, the expert team was reconstituted to include

1. Adviser (Fertilisers) - Convenor Ministry of Petroleum & Chemicals.

2. Shri K. S. Sarma, OSD (Projects), F.C.I.
3. Shri D. G. Rao, Group Manager (FCI).
4. Dr. K. S. Gill, General Manager, FACT.,
Representatives of DGTD were invited to participate in the discussions of the above Group.

In evolving the schemes under the PCIP in addition to experts within the Ministry, FCI and FACT, expatriate assistance was used wherever considered necessary. In 'end to end' survey of the Durgapur Plant was carried out by Technimont and based on the findings a programme for modifications/improvements is under implementation at Durgapur. A suitable programme was also evolved for Cochin. An expert from Air Liquide was also obtained to study the problems of the air and nitrogen wash plants at Trombay to assess the modifications required. An expert from Shell has carried out studies on the Gasification Section at Trombay to identify areas for improvement.

These and other studies and proposals from FCI and FACT have been discussed in depth at the various meetings of the group. Based on these discussions, the following programmes have been evolved and are being implemented in the various units of FCI and FACT:.

FCI SCHEMES.

1. DCDA Sulphuric acid schemes at Trombay.
2. Modifications in the ammonia plant at Trombay.
3. Power plant at Trombay-IV.
4. Modifications in the Durgapur plant.
5. Installation of aluminium fluoride plant at Sindri.
6. Renovation equipment for the Gorakhpur unit.
7. Carbonate pump for Durgapur.
8. Consultancy services.

FACT SCHEMES.

1. Cochin modifications
2. Renovations modifications at Always.

The foreign exchange requirement of these programmes are being met from \$ 17 million World Bank credit.

Additional programmes have subsequently been identified to improve capacity utilisation; these include oil gasification unit at Neyveli, naphtha reformer at Rourkela, Protective power generation in the various units etc. These are being covered under a further line of credit negotiated with the World Bank and would be coordinated by the same group.

The Department also stated, in another note, that the following measures had been taken/were being taken to augment production in the existing units:

- (i) *At Sindri*: Installation of a supplementary naphtha gasification unit introduction of naphtha into coke oven gas reformation section to supplement availability of gas; efforts made by Ministry of Petroleum and Chemicals to maintain the continuity of supplies of Krgali coal for improved production a Rationalisation programme for the manufacture of phosphatic fertilisers replacing at the same time the poor quality gypsum now obtained from Rajasthan by product gypsum from the phosphoric acid plant is expected to be implemented by the end of 1975-76; a long-term programme for modernisation of the Sindri plant to be implemented by April 1978 so as to replace the aged plant and process technology now in use for ammonia production by a switch-over to the use of heavy petroleum fractions as feedstock.
- (ii) *At Nangal*: An expansion project is under implementation; this includes change-over from electrolysis to fuel oil as feedstock, thus reducing the power requirements to 36 MW as against the the existing 164 MW.
- (iii) *At Trombay*: Extensive modification to remove design and engineering deficiencies; change-over of the carbon dioxide recovery system to modified Benfield process; installation of a supplementary naphtha reformation unit; additional steps for debottlenecking the complex fertiliser plant to be implemented by the end of 1976-77.
- (iv) *At Alwaye*: Installation of spare phosphoric acid reactor; installation of a thickner for gypsum slurry used for manufacture of ammonium sulphate; replacement of acid coolers, drying and absorption tower in old sulphuric acid plant and creation of additional grinding facilities for rock phosphate.

(v) *At Rourkela:*

- (a) Modification for release of coke oven reform fuel with naphtha.
- (b) Installation of a new screw compressor for the coke oven gas supply.
- (c) Release of coke oven gas for fertiliser production by meeting energy requirements in the steel plant with fuel oil in place of coke oven gas, wherever possible.
- (d) A proposal for the creation of additional facilities to supplement the gas availability for full utilisation of capacity has recently been approved. It will take 30—36 months for implementing the scheme after all the approvals are given.

(vi) *At Neyveli:* The following steps have already been taken:

- (a) Installation of benzene absorbers and completion of certain other modifications in various sections of the plant.
- (b) Implementation of a phased repair and maintenance programme on an extensive scale.
- (c) Change-over to fresh petro-coke solution for carbon dioxide recovery.

Besides, a programme envisaging switch-over to the use of fuel oil instead of lignite as feedstock and modification in the carbon dioxide recovery system is also proposed to be undertaken. During the five months April-August 1975, the capacity utilisation in Rourkela and Neyveli has been better than in the past.

- (vii) *At Durgapur and Cochin:* An end-to-end survey of Durgapur plant was carried out by Technimont of Italy. Based on their report, various modifications are to be carried out in both these plants which are presently faced with a number of problems including defective equipments supplied from abroad. Appreciable improvement in their performance can be expected only after these modifications have been carried out".

5.24. Drawing attention to the statement made during evidence that the World Bank had also made certain suggestions in regard to the working of public sector fertiliser plants, the Committee enquired into the details of these suggestions and the action taken by Government thereon. In a note, the Department of Fertilisers & Chemicals replied:

"World Bank Mission comprising of three Technical Members visited the five operating units of FCI and Udyogamandal Division of

FACT in 1969 to assess their performance and suggest remedial measures for overcoming various difficulties in attaining higher capacity utilisation.

In case of FCI, the detailed report of the Mission was considered in consultation with FCI. On a number of points the Missions recommendations were accepted and implemented whereas on some other points it was not found practicable to do so for technical and economical reasons.

In the case Sindri Unit of FCI the Mission's suggestions like better control of coke oven gas fluctuation, early commissioning of the MEA carbon dioxide removal system in the gas reforming area strict checking of naphtha quality installation of pressure loop control device and steam carbon ratio regulator were accepted and implemented. Their recommendations (a) to replace the letdown valve for urea plant, (b) for drawing up a loss prevention programme, particularly in the sulphate plant have also been accepted. Some of their recommendations like beneficiation of gypsum, use of lower S/C ratio in reformer and LT shift stage in GRP could not be accepted as they were not practicable.

In regard to the Trombay unit, many of the recommendations of the Mission have been implemented and on some of the points action had been taken even before the submission of the report by the Mission. Recommendations relating to stricter process control, switching over to cameronball valve in HP air dryers, replacement of internals in Separator, of Turbo-compressor discharge separator, use of less concentration potash and vanadate in carbon-dioxide removal plant, installation of automatic carbon-dioxide recorder, measurement of pressure drop across packing bed, etc. were accepted and implemented. There were some recommendations such as the use of synthetic lubricant in the HP air Booster and Kontol Inhibitor in MEA system which could not be carried out due to either strong recommendation of the vendor to the contrary or due to lack of enough field experience. The suggestion to use fuel oil in place of naphtha and increasing gasifier throughput was not carried and feasible with the existing facilities.

As regards the Gorakhpur Unit, many of the recommendations in respect of the ammonia plant like checking of built-in extra capacities in each section of the plant were accepted and implemented and these formed the basis of implementation of Gorakhpur Expansion Project. As regards the suggestion to overcome the power problem, the question of installing a cap

tive power-plant is under consideration of the Government. Regarding urea plant some of the recommendations formed part of implementation of Gorakhpur Expansion. However, some of the observations of the mission on the maintenance of ammonia and carbamate pumps could not be sustained as the machines were operating satisfactorily.

In the case of the Namrup Unit, a thorough check recommended by the Mission was made on the capability of the ammonia plant and it was felt that the introduction of LT shift was feasible to increase the ammonia output. This has since been completed in one train; the results being encouraging. Similar facilities are being assembled in the second train also. Their recommendation to operate the reformer at a much higher pressure could not be accepted as the system was not designed for operating at higher pressure.

In the case of the Nangal Unit, the recommendation of the Mission for putting an additional sale line from FACT was not considered worthwhile considering the investment involved. Their suggestion to replace 3 Nos. synthesis loops with one bigger loop had also with significance since the existing loops are to be retired after Nangal Expansion.

In the case of FACT, in accordance with the recommendation of the Mission, FACT constituted a committee called the Menon Committee to make a critical appraisal of the operations of various units of Udyogamandal and to recommend the debottlenecking steps to be implemented. On the basis of the above two reports as well as earlier study made by Sharma Committee appointed by Government, FACT undertook a debottlenecking programme, as detailed below:

Sl. No. Particulars of Work.

1. New Pump Turbine Unit.
2. Modification to the Chemicbau acid plant (160 TPD)
3. Provision for additional acid storage tank.
4. Gypsum Thickner.
5. Provision of new grinding mill.
6. Providing by-pass to the super capacity elevator.
7. Installation of single tank reactor.
8. New Pusher Centrifuge.
9. New bag filter for hardinge Mills.

the programme of debottlenecking in Udyogamandal unit of FACT has been completed at an approximate cost of Rs. 100 lakhs."

5.25. Since it had also been stated that learning from past mistakes, the monitoring systems had been improved considerably to keep a watch over the performance of individual plants, the Committee desired to know the details thereof and how far these steps would actually contribute towards maximising indigenous production of fertilisers. In a note, the Department of Fertilisers & Chemicals stated:

"As a first step towards improving the monitoring system, steps have been taken to frame the production targets for 1975-76 on a realistic basis. In doing so, due allowance has been made for factors which inhibited achievement of production targets in the previous years. The main factors responsible for this shortfall between the estimates and the actual production are indicated below:

- (a) A variety of factors which have resulted in constraints on production in operating units; these include (i) power cuts and instability of power systems; (ii) occasional labour troubles; (iii) breakdowns of plant and equipment due to poor maintenance; (iv) unplanned shut downs because of unforeseen technological difficulties; (v) reduced quantum of critical inputs; (vi) extreme age of some of our plants.
- (b) The non-realisation of the assumption that new projects will be commissioned on particular dates and would contribute towards production.

The reasons for shortfall in production have by and large been the same for several years and in making the production for cast for 1975-76, it has been assumed that these constraints will continue to operate more or less to the same extent. Discussions were also held with the managements of each of the fertiliser plants both in the public and the private sector; based on these discussions etc. the production target for 1975-76 has been fixed at 15 lakh tonnes of nitrogen.

The production performance of the operating units is being monitored on a weekly and monthly basis and the reasons for the shortfall in production are carefully scrutinised and necessary corrective measures are taken.

It may be mentioned here that production at the Trombay unit of the FCI fell considerably short of its production target during

the first quarter of the current year on account of some maintenance problems. These problems were discussed with the plant authorities at a meeting taken by Secretary (F&C) at Trombay. Following the action taken in the light of these discussions, production at Trombay is showing an upward trend, vide details below:

(In '000 tonnes of N)

Month	Target	Production	Variation from monthly target
April 1975	3.5	2.5	-1.0
May 1975	6.4	4.2	-2.2
June 1975	6.5	3.2	-3.3
July 1975	6.7	4.7	-2.0
August 1975	6.8	6.0	-0.8
September 1975	4.8	6.1	1.3

Discussions are proposed to be held with the managements of the other units shortly and a mid term review is also proposed to be made.

The Ministry is also getting monthly progress reports from all the projects under implementation and a careful watch is kept on their progress. Quarterly performance review meetings are also held in which the progress of implementation of the projects is reviewed. It is found that delay in the commissioning of fertiliser plants is to some extent attributable to slippages in the delivery of indigenous equipment. The Ministry of Heavy Industries have also taken appropriate action to reduce such slippages.

As against a production of 11.85 lakh tonnes of nitrogen during 1974-75, a production of 7,59,460 tonnes of nitrogen was achieved during the period April 1975 to 25 October 1975. This shows that a little over 50 per cent of the year's production target of 15 lakh tonnes has already been achieved. Production during the corresponding period of 1974-75 was 5,91,150 tonnes of nitrogen only. This is a measure of the improvement in the performance of the industry during this current year."

5.26. The Committee desired to note how far the various debottlenecking measures taken by Government had actually contributed to improving capacity utilisation during 1975-76 and 1976-77. In reply, the Ministry of Chemicals and Fertilisers have sent the following note:

“Limitations affecting production are identified on a continuous basis and in addition to normal preventive maintenance, measures such as debottlenecking, renewals, replacement of equipments, etc. are taken to optimise capacity utilisation. In addition, large scale modifications programmes in regard to Durgapur and Cochin projects have also been taken up under the Plant Operation Improvement Programme (POIP), being financed by the IDA, to enable these plants to achieve and stabilise production near rated capacity. Appreciable improvement in these two projects is expected only after modifications taken in hand have been carried out. As a result of the normal preventive maintenance measures taken in various plants for replacement of defective equipments and renewals etc., and arising out of the modifications so far carried out in Durgapur and Cochin projects, the capacity utilisation of nitrogen during the years 1975-76 and 1976-77 has substantially improved as can be seen from the following table:—

	Production of nitrogen	
	Production in MT	Capacity utilisation (%)
1974-75	11,85,000	59.5
1975-76	15,35,000	70.0
1976-77	19,00,000	72.5

It is difficult to pin point and specify the additional production arising out of the various measures taken in various units. It may be pointed out, however, that the same number of units which were in operation during 1974-75 and 1975-76 contributed, as a whole, a production increase of the order of 1.72 lakh tonnes in 1975-76 and 2.27 lakh tonnes in 1976-77 as compared to their contribution in the preceding years.”

5.27. Reviewing the targets of fertiliser production proposed for the Fifth Plan, the Estimates Committee (1972-73), in paragraphs 1.35 and

1.36 of their 40th Report (Fifth Lok Sabha), had recommended as follows:

"1.35 The Committee find that the targets of capacity and production projected for inclusion in the Fifth Plan are too ambitious as they envisage a five fold increase in the achievements made in the Fourth Plan. They feel that such a massive programme is impossible of attainment except on the basis of a 'Crash Programme' to be earnestly implemented. Apart from the massive resources to the extent of Rs. 1500 crores including the foreign exchange component of Rs. 650 crores which will have to be committed to implement the programme, the norms and procedure for clearance of projects and the principles on which import of technical know-how and equipment is allowed, will have to be reoriented and the implementation machinery properly organised and geared up to work on a 'Crash' basis to achieve the task assigned. All this, the Committee feel, need a very careful planning on the part of the Ministry of Petroleum and Chemicals."

"1.36. The Committee hope that if the 'Crash programme' is ultimately approved, it would be sincerely implemented so that the country attains, as the programme envisages, self-sufficiency in the field of at least nitrogenous fertilisers. To begin with, the Government should expedite their decision as to the location of the fertiliser plants which would be set up under the 'Crash programme' during the Fifth Plan period."

Again as has been earlier pointed out in paragraph 5.7 of this Report, the Estimates Committee (1974-75) had also, in paragraph 3.23 of their 76th Report (Fifth Lok Sabha), recommended, *inter alia*, that while all factors coming in the way of fuller utilisation of the existing installed capacity should be attended to on an urgent basis, a time bound crash programme should also be formulated, at the same time, for the creation of additional production capacity to meet the demand.

5.28. Asked whether the Ministry of Petroleum and Chemicals had seriously considered these recommendations of the Estimates Committee and whether, as recommended by them, the principles on which import of technical know-how and equipment was allowed had been reoriented and it was being ensured that the know-how already available in India was being properly utilised, the Secretary, Department of Fertilisers and Chemicals replied in evidence:

"The term 'crash programme' in respect of implementation of fertiliser projects has to be understood in a certain context.

With all the best will in the world—I am talking of normal international standards—it would take approximately 36 to 42 months to complete a standard-sized ammonia-urea complex from what we describe as the 'zero date'. The 'zero date' is the date on which the contracts are finally signed. From that date till the date of commissioning the period would range from 36 to 42 months, and this would be considered to be a good performance. Prior to the 'zero date', there is a process of investment decision making, selection of location, selection of technology, inviting tenders, evaluation of tenders, decisions regarding foreign exchange component, the credits to be allowed, and so on and so forth. Even under a crash programme, it was felt that a period of twelve months would be required for completion of this process. I would, therefore, mention to the hon. Members that we understand the crash programme to mean a total period which would extend to 52 to 54 months. The word 'crash' in this context is not to be taken in the same sense in which it is normally understood.

Secondly, in response to the crash programme, another thing was done. Instead of trying to stagger implementation of fertiliser projects so that we had a situation where year by year one new fertiliser plant would come into operation, the idea was to sanction at one time a large number of projects and see that they came through simultaneously and in pursuance of this, a number of investment decisions were taken in the public sector and provision was made for the private sector also. We have submitted to the Committee a list of projects which have been sanctioned and which are under implementation and also a list of projects which will be taken up in the closing stages of the Fifth Plan and which would really be implemented or be operational in the Sixth Plan. The whole of this investment programme involves a lot of money.

I must mention to the hon. Members that the estimation of the investment costs in respect of fertiliser plants has begun to cause us considerable anxiety. Till about three or four years ago, an average-sized ammonia-urea plant—of 900—tonne a day ammonia capacity—would have been constructed at about Rs. 50 to 60 crores; in fact, some of the plants like the one in Bangalore, which is now coming on stream within a month or so, have been completed at Rs. 67 crores. Today the investment cost for the very same size of plant has multiplied three-fold and ranges between Rs. 125 and 180 crores.

depending upon the feedstock. The cheapest plants are those which are based on gas and naphtha. The fuel oil plants are more costly because they require an air-separation unit. Coal-based plants are still more expensive. This is a major problem for the Planning Commission and the Ministry of Finance because provision of investible funds has really gone out of control, and this is an experience which is felt all over the world."

5.29. The Committee desired to know, in this context, whether greater emphasis was being laid or contemplated in the Fifth Plan for importing foreign technical know-how for fertiliser plants even though Indian technical know-how was available fairly in abundance and Indian technologists were also capable of fabricating fertiliser plants without reliance on foreign technological know-how. The Secretary, Department of Fertilisers & Chemicals stated:

"Apart from the question of equipment, there is the question of self-reliance in technology, design basic engine ring, detailed engineering, procurement of equipment and project implementation.

We have the Planning Division of the FCI, FEDO of FACT and Engineers India Ltd., which are progressively building up know-how in all these spheres. So far as project implementation is concerned, it is hundred per cent indigenous. In the field of detailed engineering, we have very high capacity in P & D, FEDO and Engineers India Ltd. and there is no reason to give detailed engineering to foreign parties. In the case of basic know-how and basic engineering, I am afraid, we cannot really make a claim that we have developed these technologies. In the case of technology for Urea synthesis and ammonia synthesis, there are very few technologies even abroad. There are at best three or four technologies which are in vogue. What has been done is that P&D, FEDO and Engineers India Ltd. are obtaining licensed collaboration from these foreign parties and for that they have to pay royalties, and work under their supervision. In the matter of catalyst development, the P&D has done excellent work and we do not need any knowhow from abroad. In the case of detailed engineering, which is tied up to design know-how, we feel that the best combination would be to get foreign know-how and marry it to our detailed engineering. This has been done at Panipat where TOYO, a Japanese firm is providing the technical know-how and the basic engineering and

Engineers India Ltd. are doing the detailed engineering. Similarly, in respect of Barauni plant, there the P&D of FCI has entered into a collaboration agreement with a foreign firm.

If we have to advance in indigenisation of technology and process knowhow, there is a certain price which we have to pay. The projects have to be slowed down to some extent. We have decide to go in for a balanced approach. Some of the plants, particularly in the private sector, are almost on semi-turnkey basis where a lot of the work is done by foreigners. For some of the plants, we have given the major responsibilities to Indian technologists, like the plants at Durgapur, Cochin, Namrup and Barauni. We are watching this with interest and with certain anxiety. We have yet to commission Namrup and Barauni. If we commission these successfully and they work to capacity, it would be another fee other in the cap of Indian technologists."

5.30. As has been pointed out by the Department (*vide* paragraph 5.2), so far the preferred feedstock for the production of nitrogenous fertilisers had been naphtha. However, in view of the anticipated deficits in naphtha supplies on account of hardening of world supplies, increase in prices and uncertainties in regard to internal availability to sustain a major expansion programme for the production of fertilisers, a policy decision had been taken that there should be maximum diversification of the feedstock and that, as far as possible, fertiliser capacity should be developed on other feedstock like heavier petroleum fractions and coal.

5.31. The Feedstock Committee, appointed by Government in 1969, which had considered the relative economics of manufacture of fertilisers making use of imported naphtha, imported fuel oil, coal, imported liquified natural gas, imported ammonia and electricity, had found that the use of coal and electricity involved the minimum outflow of foreign exchange. The Committee, in its report submitted in November 1970, had, however, concluded *inter alia*, that in the case of electricity, the then available technology made the fertiliser plant more capital intensive than that based on any other feedstock and therefore unattractive for fertiliser production, even when power could be supplied at cost price, though it had felt certain developments, in experimental stage, if proved successful for commercial use in fertiliser production might be of interest for adoption. The Feedstock Committee's findings/conclusions in regard to other feedstock for the manufacture of fertilisers are briefly indicated below:

Natural and Coke oven gas: On the basis of domestic availability, the Committee had concluded that the scope in this direction would also be limited.

Imported Liquefied Natural Gas (LNG): In view of the fact that any economic use of imported LNG would require processing and transportation of the gas in very large quantities for beyond the requirements of one or two fertiliser units, as well as on other considerations, the Committee had found that its use as feedstock in the immediate future may not be practicable.

Imported ammonia: Import would be expensive in terms of foreign exchange outgo compared to the import of the basic feedstocks like naphtha/fuel oil and there would also be certain limitations on the product pattern when straight nitrogenous fertilisers were required to be produced. The Committee had, therefore, felt that the import of ammonia could be thought of only to a limited extent in special circumstances when it could be converted into complex fertilisers at port locations.

Heavy crude, fuel oil, naphtha: Use of crude as feedstock for fertiliser production at inland locations excluded on practical considerations, leaving naphtha and fuel oil as the major alternative available in the choice of the feedstock. Between these two, the use of fuel oil/heavy petroleum fractions had been recommended by the Committee as the major feedstock for the fertiliser capacity to be developed in the Fifth Plan for the following reasons:

- (a) Naphtha would be in short supply even to meet the committed requirements of the fertiliser and petrochemical projects and would continue to be so in the foreseeable future.
- (b) Though the initial investment on a fuel oil based plant and its foreign exchange component would be somewhat high compared to that of naphtha based plant, the recurring foreign exchange expenditure in case of the former is much lower.
- (c) while the recurring foreign exchange requirement favours the use of fuel oil as feedstock even when both naphtha and fuel oil are to be imported, it is possible to make available the feedstock requirements of fuel oil for the fertiliser industry from out of local production within a relatively shorter time with development of more refining capacity.

The Feedstock Committee had, however, found that while economic consideration favoured the use of fuel oil as feedstock, its commercial profitability did not match the use of naphtha as feedstock. According to its studies, in order to attain comparable profitability, the price of fuel oil had to be cheaper by about Rs. 108/- per tonne compared to that of naphtha at a given location. In this context, the Committee had stressed the need for adjustment in the pricing of fertiliser feedstocks and waiver of all duties on fuel oil, when used as feedstock for fertiliser production.

5.32. As regards the use of coal (which is abundantly available in the country) as a feedstock for the manufacture of fertilisers, a representative of the Ministry of Petroleum and Chemicals had informed the Estimates Committee (1972-73) as follows:

“Coal is an integral part of the fertiliser strategy and it is for that reason that there were three plants of large size based on coal. It is particularly anticipated that in areas close to the coal availability in the country, future development should be oriented towards coal-based fertiliser plants. But, we would like to get some experience on large-sized plants at Talcher, Ramagundam and Korba, before expanding the coal-based plants on any sizeable scale or putting up new plants on any sizeable scale.”

5.33. The Committee, therefore, desired to know whether in the matter of establishing coal-based fertiliser plants, we had proceeded expeditiously enough, particularly in the context of easy and abundant availability of coal and the economic advantages likely to accrue to the country. The Secretary, Department of Fertilisers and Chemicals stated in evidence:

“The Planning Commission and the Cabinet have decided to go in for the three coal-based plants—Talcher, Ramagundam and Korba. Of the three, in two actually the implementation is going on. Korba plant has slowed down not because of any other reason but because of finance. In the case of Talcher and Ramagundam, they are in full swing. We have assessed that they can be commissioned in the year 1977. This is the first time that we are putting up two major coalbased plants in India; unfortunately for us, these are the only coalbased plants. They do not exist anywhere else in the world except in South Africa. The only comparable plant to Talcher and Ramagundam is at a place called Modders fontein in South Africa. We are getting intelligence as to how it is faring. But we are not able to send our engineers there. We are only trying to get the intelligence from the ICI which has put up this plant. We are keeping our fingers crossed as it is the first time we are commissioning large coal-based plants and one does not know; there may be technological problems. a specific question arose before the Government as to whether they should now go in for more massive investment in coal-based plants or they should watch first how Talcher and Ramagundam fare.”

5.34. Since it had been stated that coal-based fertiliser plants did not exist anywhere else in the world except in South Africa, the Committee asked whether a plant of the size and magnitude of Talcher and Ramagundam

had been successfully commissioned elsewhere to justify the experiment with coal-based plants in India. The Secretary, Department of Fertilisers and Chemicals replied:

“There is a plant of large size in South Africa, which had been commissioned approximately nine months ago. This is an ICI plant with the similar technology—Koppers Technology—which we are using in Ramagundam and Talcher. Of course, we have some constraints in regard to sending people there or getting information from there. But, we are keeping in touch with the situation and we are getting reports from our consultants about the progress of this particular plant. From what we have heard so far, things are a little better than perhaps feared and the plant had been successfully commissioned and is in operation.”

He stated further:

“The bulk of the plants in the world are based on Gas or on Naphtha. Fuel oil-based plants are very few. There is only one coal-based plant. We are having in Talcher and Ramagundam in a sense, a major experiment. There is an obvious investment risk and one cannot say. We do not have any past experience of running major coal-based plant. Technologically they are quite sound. We are in touch with the experts having this knowledge in the world. Those who have commissioned the South African plants are helping us to Commission these plants.”

In view of the fact that foreign multinationals like ICI were highly secretive about their processes and technological developments, the Committee desired to know whether the viability of the proposal had been examined in detail before venturing upon a ‘major experiment’ of this kind.

The witness stated:

“The ICI plant is there. The consultants are KOPPERS from Germany. The consultants who gave the process, knowhow for coal gassification—the same people have given it to us. We have an inter-link.”

Asked whether the relationship with KOPPERS of Germany was good, the witness replied that they were excellent. To another question as to when the two coal-based plants were expected to go on stream, the witness replied:

“The mechanical commissioning of Talcher will be fairly certain in the month of June 1976. Thereafter, the other streams will be mechanically completed and even the pre-commission trials will start and we expect them to be in production in 1977.”

He added:

"I say that experimentation is not to be interpreted as implying that there would be no sort of misgivings on our part."

5.35. In view of the apparent risks and uncertainties involved in the experiment with coal-based fertiliser plants, the Committee desired to know whether before going in for large-sized plants, which were going to take a longer time to commission and also involve larger capital outlay, smaller plants could not have been initially experimented with. The witness stated:

"These are standard size plants producing 900 tonnes of ammonia and 1050 tonnes of ammonia respectively."

He added:

"...we could perhaps have had pilot scale experiments. We would be postponing further the possibility of using coal in any significant scale."

Elaborating on this point further, the witness stated:

"About the feasibility of coal based technology, there was an international seminar held in Delhi on coal-based technology. Technologists were invited from various parts of the world and papers were read out. All aspects of coal plants were taken up."

5.36. On the Committee pointing out in this context that the possibility of evolving a coal-based technology had been suggested and supported by Indian scientists like the late Dr. A. C. Ghosh more than two decades earlier and that had the suggestion been pursued to finality, a good deal could perhaps have been learnt from the experience earlier instead of relying on the somewhat uncertain outcome of foreign knowhow, the Secretary, Department of Fertilisers & Chemicals replied:

"We have no reason to doubt. When you mentioned 2 decades, you must recollect the fact that investment policy has changed because of the change in the oil prices. Prior to that oil was cheap. Correspondingly the price of Naphtha and fuel oil was cheap. Coal was not a competitor. Today coal is a competitor. I am not sure whether two decades ago one could have prudently made coal-based investments."

Asked whether in spite of the certainty in regard to the abundance of coal resources and views of Indian scientists of calibre, the feasibility of using coal as a feedstock for fertilisers had been overlooked completely because

of the powerful lobbying of oil interests in Government, the witness replied:

“I would not accept that. In our planning we are making investments in fuel oil-based plants, coal plants, naphtha plants and gas plants. We have spread risks in respect of all the feedstocks, coal being one of them.”

Drawing attention again, in this context, to the abundance of coal in the country and to the fact that even in the field of textiles, in spite of the sophisticated and modern technologies, khadi and handlooms were also simultaneously being encouraged as they had a role to play, the Committee desired to know why small coal-based ventures had not been started earlier and whether this had not been given the serious attention that it rightly deserved on the advice of the oil magnets. The witness stated:

“I very much doubt it; a decade ago there was not this problem of oil.”

On the Committee pointing out that even in respect of oil, the country at that time was largely dependent on foreign supplies and that it *prima facie*, appeared that to foster cooperation with oil and other foreign interests, coal-based technology had been rather neglected in the past, when smaller coal-based units for fertiliser production could perhaps have been established alongwith plants using petroleum bye-products as feedstock, the witness replied:

“We will make a note of this. This technology for coal gassification is a recent one. This was not available in India. This has come in fairly recent years.”

Asked whether some studies in this regard started in the Dhanbad Institute had not been abandoned to the detriment of the country's wider national interests, the witness replied:

“Studies were made in Dhanbad some years ago. But they had not resulted in coal-based technology in the sense that we understand the technology of gassification of coal. Whether this might have emerged, if more encouragement was given, on this point, I am not really in a position to give a firm answer.”

He, however, added:

“Let me make some firm statement. There was no technology in India on the basis of which one could have a coal-based fertiliser plant. It is true that Dhanbad Institute was making some studies. Those studies did not throw up the technology as such. If your question is, had they been given

encouragement, would they have done, well, on that, I am not entirely sure whether I could give an answer to that question. At that time, the availability of oil and the position of naphtha, gas and fuel also did not really force us into a position to consider coal with the kind of seriousness with which we are considering it today."

5.37. With reference to a statement made earlier by the witness (*vide* paragraph 5.28) that while fertiliser plants based on gas and naphtha were the cheapest and fuel oil-based plants were more expensive, coal-based plants were 'still more expensive', the Committee desired to know now the coal-based plants could be more expensive. The Secretary, Department of Fertilisers & Chemicals stated:

"The difference between the two would work out to about Rs. 25 to 30 crores. Of course, there is this advantage in the case of coal-based plant that the feedstock is very cheap; the feedstock is coal which is cheap and does not involve any foreign exchange."

Asked whether only the initial investment cost was higher or whether the average cost over a period of time would also be higher in the case of coal-based plants, the witness replied:

"There are two things: one is investment cost and the other is production cost. The investment cost in the case of coal-based and fuel-oil based plants is higher than that of gas or naphtha. This does not mean that the production cost will be higher because the input cost in the case of coal is the lowest."

He added:

"The feedstock coal is considerably cheaper than the feedstock fuel oil or naphtha. The point really is this. In the cost of production, you have the question of meeting your interest and depreciation charges, you have the feedstock cost and so on. If coal-based plants operate at 80 to 85 per cent capacity, they would be producing fertilisers at a comparable cost or it may even be cheaper. At this stage, it is too early to say anything. As I mentioned, this is our first experience. All over the world there is not adequate experience as yet of the coal-based technology."

To another question whether, on account of the oil crisis and the consequent increase in the cost of petroleum-based bye-products, there was any rethinking on the part of the Department of the Planning Commission to convert some of the earlier naphtha-based projects under implementation to coal-based ones and whether this had also led to delays in the completion and commissioning of these projects, the witness replied:

"You are hundred per cent right. But the other aspect is that each plant can be run only on an easily available feedstock. It is wholly to the advantage of our country that we have a feedstock which is available within the country and coal is the classical example. We have adequate stocks of coal and very cheap coal. Today coal is being produced in India at a pithead price of one-fifth of the cost in UK or Western Europe."

He added:

"A decision was taken by us that the plants at Bhatinda and Panipat which are now under construction should be based on fuel oil. There again the philosophy is similar, that we would be producing in this country from our own refineries all the end products including naphtha and fuel oil to feed these fertiliser plants. Fuel oil is much cheaper than naphtha and the difference in price is anywhere between 35-40 dollars per tonne and an average sized plant requires 250,000 tonnes of feedstock. It is for this reason that the foreign exchange cost of importing fuel oil would be considerably lower than naphtha and we are also trying to reduce our dependence on sources abroad.

I would again repeat that the programme must be viewed in the context of the size of investments in fertilisers."

5.38. The Committee desired to know the extent of delay in the commissioning of various fertiliser plants programmed for execution during the Fourth and Fifth Five Year Plans and the reasons for the delay in the commissioning of coal-based fertiliser plants at Ramagundam, Talcher and Korba and the present status of these plants. In reply, the Ministry of Chemicals and Fertilisers have furnished a detailed note which is at Appendix XXII.

5.39. In the present context of short supply and high prices of chemical fertilisers, the development of local manurial resources and the use of organic measures assume great importance. Besides, the use of organic manures in conjunction with chemical fertilisers is also very essential

for preserving nutritional balance and fertility of the soil. Unfortunately, however, a full scale national drive for the development and use of organic manures, particularly from cattle dung and other waste matter which are available in abundance, is yet to be launched to reduce the almost excessive dependence on and stranglehold of chemical fertilisers.

5.40. One perennial source of rich natural manure—cattle dung (Gobar)—is yet to be exploited fully, in spite of the fact that this should receive top priority. According to an article featured by the United Nations Environment Programme (UNEP), based on a study by Prof. Amulya Kumar N. Reddy, Convener of ASTRA (Application of Science and Technology to Rural Areas) at the Indian Institute of Science in Bangalore, the Gobar Gas plant is the right choice of technology for making fertiliser in a developing country and “will increase self-reliance in two fundamental needs—fertiliser for growing more food and energy for cooking it.” (Gobar Gas plants break-down human and animal wastes into rich fertiliser and release energy in the form of methane gas which can be used for cooking). The study points out that to produce 230,000 tonnes of nitrogenous fertiliser a year, a developing country can build one large coal-based plant in the city or 26,150 small, village level bio-gas (Gobar Gas) plants, which would generate 130 times as much employment in poor, rural areas where employment is most needed. Besides, bio-gas plants, each of which will produce 660 units of energy a day, will, according to the study, “speed up development and eventually slow down population growth by making it unnecessary to have large families.”

5.41. The importance of Gobar Gas technology has also been recognised by the United Nations Conference on Trade and Development (UNCTAD). A Press Trust of India Report appearing in the ‘Economic Times’ of 17 December 1975, cites an UNCTAD progress report on Transfer of Technology, according to which Gobar Gas technology is one of the priority areas where “global action would be desirable” and the village scale bio-gas plants developed in India “show promise of savings in capital cost, foreign exchange and money.” The report also said that the technology developed in India for producing cooking gas and improved nitrogen fertilisers as an alternative to the existing fertiliser technology, which was advanced and oil-based and also costly, “is expected to generate substantial employment in the rural sector and save transport.”

5.42. Yet another article entitled “Bio-gas (Gobar Gas) Plant in Perspective” by R. K. Awasthi, appearing in the 6 November 1975 issue of “Young India”, cites the following views of Dr. H. M. Sethna (Chair-

man, Atomic Energy Commission) in his article 'A Total View' (published in "Seminar" of October 1974):

"... there is a great deal of potential in non-commercial fuels like vegetable waste, firewood and cattle dung. It is estimated that in 1975-76 around 324 million tonnes of cattle dung will be available in India. In 1972, we have used only 0.15 million tonnes of cattle dung in Gobar gas plants located in different parts of the country to produce methane gas and manure."

Awasthi further quotes Dr. Sethna as observing that the design for the Gobar gas plants have been standardised long ago and they have a very high potential for satisfying local energy and fertiliser needs of the rural areas and that as the material was available in a large quantity, there was potential to set up one plant in every large-sized village. According to another 'expert', cited by Awasthi in his article, the burning of the cattle dung in the whole of the country at present amounts to losing annually as much fertiliser as eight Sindri plants can produce and that it is capable of generating energy equivalent to 24 billion litres of kerosene.

5.43. Writing of the experience of an Indian delegation to China in 1956, in his article 'Organo-Mineral-Fertiliser for Indian Agriculture', Dr. S. P. Dua, Chief Agricultural Scientist, Fertiliser Corporation of India, says:

"About 85 per cent of the total cultivated area in China is manured through organic manure such as night soil, stable manures, compost, green manure crops, mud from the bottom of the canals and ponds rich in organic matter, oil cakes, etc. It is estimated that some 50 per cent of the manure used is night soil and stable manure, 20 to 30 per cent compost and 10 to 15 per cent green manure."

5.44. Pointing out that while cheap organic manure could be obtained without a great deal of effort in the rural areas millions of rupees were being spent for the purchase of fertilisers from abroad, the Committee desired to know why the use of organic manures, which would be ideal for a tropical country like ours, had not been given adequate and serious consideration. The Additional Secretary of the Department of Agriculture stated in evidence:

"I may briefly mention that we have been giving importance to the mobilisation and the utilisation of organic fertilisers and green manures and so on and this has given an added emphasis in the context of the increased prices of fertilisers. As a matter of fact we are also subsidising utilisation of sewerage and

sullage to the extent of 33-1/3 per cent from the Government of India to the States and also for erecting mechanised compost plants in the municipalities and also for Gobar gas plants to the extent of 33½ per cent and 25 per cent respectively. As a matter of fact, there are States who give concessional water for growing green manure crops so that the cultivators are encouraged to grow these and also raise farm yard manure. Actually, in view of the shortage and the increased prices of fertilisers, this is getting added importance and emphasis and is being implemented."

Another representative of the Department added in this connection:

"It is true that we must make use of all the organic manures that are with us. Recently, a committee was appointed by ICAR which submitted a report which indicates that there is a possibility of increasing the use of organic manures in the country and today roughly, they say, we can raise the usage by about 30 per cent more of manure by improved methods. The Department of Agriculture has taken certain action and advised the State Governments in the matter of the fullest utilisation of organic manures and also increase their production by cultivation of green manures crops, use of compost and use of the wastes in the cities by converting them into composts properly. There is a scheme for making use of the gobar which is being burnt in the country through gobar gas plants. A start has been made possibly within this plan about a lakh gobar gas plants will be set up by providing a subsidy of 25 per cent. Certainly I would agree...that there is a need of stepping up the use of organic manures. I must also say here that our overall agricultural production programme certainly depends upon the actual utilisation of the nutrients available in the country in the form of organic manures and also in the form of inorganic manures. Whatever levels of consumption today we have in the form of organic manures, it will take sometime to improve its utilisation. In the meantime we need more production for which a certain amount of inorganic fertilisers are needed and therefore action has to be taken simultaneously with regard to the improved utilisation of the two types of fertilisers."

5.45. In view of the fact that the utility of organic manures was only too well-known and even in more developed countries, pleas were being made in international conferences for the use of organic manures, the Committee asked whether the Central Government was still only at the

stage of making suggestions and proposals to the State Governments in this regard. The Secretary, Department of Fertilisers and Chemicals replied:

"My Minister, Mr. Malaviya, is the strongest proponent of organic fertilisers and although he is heading the Department of Chemicals & Fertilisers he is all the time emphasising that we should take the lead now in the development of organic fertilisers and he has set up a group under my own chairmanship. We have invited the representatives of the Department of Agriculture to work out a specific programme where we can commercialise some of the ideas which are being suggested by people like Dr. Dua. One of the suggestion is that Dr. Dua himself who is a very knowledgeable person on the subject should be appointed as a director of one of our companies specifically in charge of producing organic fertilisers on a commercial basis. One of our suggestions is that we will have mixtures of organic fertilisers with pyrites as a soil conditioner for alkaline soil and mixtures of organic fertilisers with rock phosphates as soil conditioners for acidic soil. We are working on this right now. Here again one comes across some problems like allocation of business with regard to which, as far as we can see, the subject of organic fertilisers is a subject with the Ministry of Agriculture. But we do not draw any dividing line and we are trying to collaborate with them as to what best we can do."

Dealing, in this connection, with the economics of this question, the witness added:

"With regard to the economic aspect of the matter, the point really is that to produce economically, you have to collect the organic matter at one place. Our impression is and this impression is also supported by certain preliminary studies made, that in the case of city sewerage schemes you can economically collect the organic matters for commercial production. So, in the case of municipal and city areas you can make this into a practical proposition. But, in the case of rural areas it is a lot more difficult because the collection of manures is a lot more difficult in the sense that we do not have concentrated areas as in Europe. In the case of Europe you have stabling of animals like cattle stable and horses stable where an enormous amount of dung is available at one place while in India it is not so. In rural areas the dung is spread all over the countryside and the question of collecting it at one place is very difficult."

Asked whether these alleged difficulties could not be overcome with a little effort, the witness replied:

"As a specific recognition of this, there is a specific programme approved by the Planning Commission and the Finance and Agriculture Ministries for subsidising and promoting the idea of compost plants and bio-gas plants."

5.46. To another question whether a judicious solution could not be found to these problems and difficulties and whether any model scheme had been conceived for the purpose, the Joint Secretary (Inputs), Department of Agriculture replied:

"We have been mobilising organic manure in city and rural areas. That is why in the Fifth Plan we have come up with the scheme that the waste can be utilised if we give some assistance to the urban cooperatives, the corporations and municipalities to set up compost plant. Similarly, for Gabar Gas Plant, 10,000 units have already been established last year. This year because of an increase in the demand from the State Governments, we have gone to the Planning Commission to increase the number of units from 12,000 to 26,000. Sewerage and siltage utilisation scheme might give them necessary assistance to utilise the waste."

5.47. The Ministry of Agriculture and Irrigation (Department of Agriculture) have furnished the following note* on the implementation of the suggestions made by Dr. S. P. Dua on production of organic mineral fertilisers:

"No formal Committee has been set up in this Ministry for planning the development of organic fertilisers. However, Inter-Departmental meetings have been held in this Ministry from time to time in the past to consider the promotion of direct application of minerals like pyrites and rock phosphate produced by Pyrites, Phosphates and Chemicals Limited, a public sector undertaking, and also for development and promotion of suitable admixture of these minerals with organic manures, Fertilizer Corporation of India have already conducted some laboratory and field tests for the development of organo-mineral fertilizers and are presently drawing up proposals based on the ideas of Dr. S. P. Dua, Chief Agronomist, FCI, for setting up pilot plants for production of organic mineral fertilizers which would cover *inter-alia* study of factors such

*Not vetted in Audit

as cost of production, cost of marketing of organo-mineral fertilizers and the cost per unit to the farmer as compared to the cost per unit of chemical fertilizers. Further action for taking up the development of organo-mineral fertilizers on a commercial scale would be considered depending on the results of pilot plant tests and other studies to be conducted by FCI and also by various agronomic institutions about the efficacy of such fertilizers."

5.48. In a note furnished at the Committee's instance, on the steps taken by Government to encourage the use of organic manures and to establish gobar gas plants, the Department of Agriculture stated:

"Various schemes for the development of local manurial resources both in urban and rural areas, notably the following ones have been in operation with varying degree of success during the Plan periods:

- (a) Urban Compost.
- (b) Sewage and Sullage Util'sation.
- (c) Rural Compost.
- (d) Green Manuring.

The above programmes have assumed greater importance than ever before, in the context of fertiliser shortage faced from time to time. Comprehensive programmes have, therefore, been formulated both under the State and Central Sectors for stepping up production of organic manures in the country, largely with the objective of supplementing the requirement of plant nutrients vitally needed for increasing agricultural production in the 5th Plan.

The target is to produce 205 million tonnes of rural compost and 4.8 million tonnes of urban compost during 1974-75 and to raise it to 350 million tonnes and 7.5 million tonnes a year respectively by the end of the 5th Plan period. Green manuring programme will also be intensified to the extent feasible. It is also planned to utilise sewage/sullage for irrigation to the maximum extent possible.

An outlay of Rs. 9.00 crores have been provided under the Central sector for the following programmes which would bear definite and quick results.

- (1) **Setting up of 27 mechanical compost plants in cities having population of 3 lakh and above to manufacture compost manure from city wastes. Central Assistance by way of grant-in-aid to the extent of 33 per cent of the capital cost will be given to Municipal Corporations/Agro-Industries Corporations volunteering to set up these plants. Construction of one compost plant at Ahmedabad was taken up in 1974-75 which has been completed and put into successful operation. A sum of Rs. 20.0 lakhs has been sanctioned as grant to Gujarat Agro Industries Corporation Ltd., Ahmedabad. Administrative approval for setting up another 56 plants has been communicated during 1975-76.**
- (2) **200 sewage/sullage utilisation schemes in cities/towns where such potentialities exist, which will irrigate an area of 16,000 hectares. Central assistance by way of grant-in-aid to the extent of 33 per cent of the capital cost will be given to the Municipal Committees/Corporations taking up such schemes. 59 schemes costing Rs. 157.35 lakhs were approved by the Government of India during 1974-75. Grant of Rs. 33.66 lakhs in respect of 30 schemes was sanctioned and released during 1974-75. During 1975-76 administrative approval for implementation of 127 schemes costing about Rs. 435.15 lakhs (revised for 127 schemes upto 1975-76) has been given up. Rs. 2.7 crores has been given.**
- (3) **Setting up of 1,00,000 gobar gas plants in rural areas for production of gas for fuel purposes and good quality manure for agricultural production; 20,000 plants are being set up in 1974-75 and 1975-76 under a 'Seeding Programme' for which 25 per cent subsidy on the capital cost will be given to the beneficiaries. Besides, loan assistance from the nationalised banks will also be provided. Under the seeding programme 29,403 gobar gas plants have been completed upto 1975-76. Subsidy amounting to Rs. 224.81 lakhs has been released for 28,224 plants. (Upto 1975-76).**
- (4) **Award of Prizes to local bodies and gram panchayats doing excellent compost work. Under this programme no prize could be accorded during 1974-75 due to late commencement of the scheme. Enteries have been called for in the current year.**
- (5) **Organisation of demonstration-cum-training camps by the Farmers' Associations regarding production and use of organic manures. 200 such camps will be organised every year and**

a grant of Rs. 250/- per camp will be made available to these associations. 135 camps were organised during 1974-75 for which grant amounting to Rs. 33,750 (Out of this amount a sum of Rs. 1,100 was refunded in September, 1975 being unspent balance) has been released. Allotment of camps for the year 1975-76 has already been made to the various associations.

Besides, the programme undertaken in the Central Sector, the various State Governments have undertaken a number of activities pertaining to the development of local manurial resources under the State sector. State Governments have been requested to take the following steps in regard to promoting the use of organic manures :

- (a) Organising compost weeks/campaigns.
 - (b) Training of farmers in the techniques of composting.
 - (c) Intensive promotional propaganda/publicity through AIR, TV and press.
- (6) States have also been advised to lay stress on the following programmes which will augment production of compost in rural areas:
- (a) Construction of improved cattle-sheds permitting collection of cattle urine also.
 - (b) Night soil conservation on community basis in selected villages—provision of Wardha type laterines and movable latrines.
 - (c) Construction of suitable latrines/urinals in schools to conserve and utilise night soil and urine for manuring school fields/vegetable plots.
 - (d) Construction of urine and compost pits and manure sheds in goshalas and pinjrapoles for better conservation of cowdung and urine.
 - (e) Construction of manure sheds in coastal areas.
 - (f) Construction of roofed pits/heaps for storing manure under severe cold climate.
 - (g) Compost making by landless labourers as ancillary occupation to supplement their income.
 - (h) Preparation of poultry manure as an adjunct to poultry development.

- (i) Popularisation of improved pens for goats/sheep and pigs with roofing and pucca manure pits which are considered necessary for the health of animals as also for conservation of droppings in the pits for manure making.
- (j) Extension programmes of Farm/Social Forestry including Reforestation of Degraded Forests and raising of Shelter Belts, Mixed plantation on Waste Lands and Panchayats lands, for raising fuel wood species."

5.49. The Committee desired to know the actual progress made so far in the development of organic fertilisers and the results achieved in the field. In reply, the Ministry have furnished the following note*:

"Recognising the need for supplementing the use of Chemical Fertilizers and to increase their efficiency, various schemes for development of organic manures viz., Rural and Urban Compost Production, Sewage/Sullage Utilization and Green Manuring have been in operation through the Plan periods.

2. To intensify the programme for production and use of compost and other organic manures, a comprehensive programme has been taken up during the 5th Five Year Plan. The target is to produce 350 million tonnes of Rural Compost & 7.5 million tonnes of Urban Compost a year, by the end of the Plan period. Against this, the present production is of the order of 200 million tonnes and 5.3 million tonnes of rural and urban compost respectively. Green manuring and sewage/sullage utilisation programmes are also being intensified. Presently, the area receiving sewage irrigation and the coverage under green manuring is 30000 hectares and 5.69 million hectares respectively.
3. In addition, certain key programmes capable of yielding definite and quick results have been taken under the central sector. Initially, an outlay of Rs. 9.0 crores for the Fifth Plan period was approved for various components of the Central Plan Scheme. This has since been enhanced to Rs. 16.54 crores.

Various components of the integrated scheme and also the Plan outlay and provision for the current year (1977-78) for each are indicated in Appendix XXIII."

5.50. As pointed out earlier in this Report, though the growth of the indigenous fertiliser industry has been no doubt impressive in terms of installed capacity, actual production of fertilisers in the country has, however,

*Not vetted in Audit.

not kept pace commensurately with the capacity and estimated demand, necessitating large imports to bridge the gap. The Committee have been informed that with a view to achieving self-sufficiency in fertilisers, the country has embarked on a very large programme for capacity expansion as a part of which 21 projects (with a total capacity of 2.16 million tonnes of nitrogen and 0.46 million tonnes of P_2O_5) were in different stages of implementation and another 8 projects (with a total capacity of 1.58 million tonnes of nitrogen and 0.46 million tonnes of P_2O_5) had been approved in principle and were expected to be taken up for implementation depending, among other things, on the availability of resources, and that with the completion of all these projects, the total capacity would rise to about 6.5 million tonnes of nitrogen and 1.78 million tonnes of P_2O_5 (as against the installed capacity of 1.94 million tonnes of nitrogen and 0.56 million tonnes of P_2O_5 at the end of the Fourth Plan). While it is thus anticipated that the increased production arising from the substantial addition to capacity would help in narrowing appreciably the gap between demand and indigenous availability of fertilisers, the Department of Fertilisers and Chemicals have nevertheless stated that though the Fifth Plan document envisaged a capacity target of about 6 million tonnes of nitrogen and a capacity of about 1.7 million tonnes of P_2O_5 , it had become necessary, on account of financial constraints, to rephase some of the projects as a result of which production by 1978-79 (the terminal year of the Fifth Plan) was expected to be only about 3.0 million tonnes of nitrogen and 0.9 million tonnes of P_2O_5 , as against the assessed requirements of 5.2 million tonnes of nitrogen and 1.8 million tonnes of P_2O_5 , and consequently there would still be a gap between demand and indigenous availability which may have to be bridged by imports. Some of the projects for augmenting the indigenous capacity for production of chemical fertilisers will also be taken up only in the closing stages of the Fifth Plan and be really implemented or be operational only in the Sixth Plan period, and if past performance in this regard be any guide, the Committee are doubtful how many of the new projects would actually go on stream and achieve stability in production as scheduled. It would, therefore, appear prima facie that even with an improved utilisation of expanding capacity, domestic availability of fertilisers would not be sufficient in the near future to ensure a significant spread across the entire agricultural economy and the country may still have to go a long way to reach the goal of self-sufficiency when imports could be dispensed with.

5.51. In these circumstances and also in view of the fact that fertiliser plants are highly capital intensive and require a considerable period for stabilisation of production, it is imperative to ensure optimum utilisation of the capacity already established at considerable cost and maximise production in the existing plants. However, as has also been pointed out

earlier by the Estimates Committee in paragraph 2.86 of their 40th Report (Fifth Lok Sabha), it is nothing short of a tragedy that at a time when the country requires more and more fertilisers to step up agricultural production, the existing fertiliser plants, particularly in the public sector, have not been able to produce according to their installed capacity. (In 1973-74, the last year of the Fourth Plan, production of nitrogenous and phosphatic fertilisers in the country amounted respectively to only 58.4 per cent and 57.7 per cent of the installed capacity. The capacity utilisation of nitrogen during 1974-75 was 59.5 per cent). It has, however, been contended by the Department of Fertilisers and Chemicals that the capacity utilisation of the operating plants in the country requires to be viewed with reference to the spread of investment in extremely old plants and those with built-in constraints (like Sindri, the FACT plant at Udyogamandal and to some extent the original investment in Trombay), in stabilised plants (like the Gorakhpur and Namrup plants of the Fertiliser Corporation of India in the public sector, the IFFCO plant at Kalol in the cooperative sector and the GSFC plant at Baroda in the private sector), and in the new plants (at Madras, Goa, Durgapur and Cochin) which have to go through an initial period of teething troubles till they reach stabilisation, and that viewed against this background, the capacity utilisation of the existing fertiliser plants has been reasonably good. It has also been argued that the international norm for comparable chemical and fertiliser plants is about 82 per cent and that, by and large, the overall performance of the industry in India in respect of nitrogenous fertilisers was comparable both with the developed and developing countries and during 1972, productivity in India was higher than the world average. As regards phosphatic fertilisers, the Department have informed the Committee that relevant comparative data were available only for the period 1965-67, which showed that the performance in India was lower than that in the developed countries, though the present position was likely to be quite different in the context of the steps taken in the recent past to improve the productivity of the P₂O₅ units in India.

5.52. An analysis of the performance of some of the individual plants in operation however, reveals in rather disquieting picture, which would indicate that there is scope for considerable improvement. For instance, though it was stated by the representative of the Department of Fertilisers and Chemicals that the assumption made in Government's investment decisions was that the new plants would operate at 50 per cent capacity in the first year, build up to about 65 per cent in the second year and reach 80 per cent capacity utilisation in the third year, the Committee are concerned to note that while the aggregate utilisation of capacity of the new plants in operation during the period 1971-72 to 1976-77 ranged between 17 and 43.2 per cent only, the utilisation of capacity of the Durgapur plant was

as low as 3.9 per cent in 1973-74 and 9.9 per cent in 1974-75 and that of the Cochin plant was only 9.2 per cent in 1973-74 and 26.3 per cent in 1974-75. Similarly, the utilisation of capacity of some of the stabilised plants was also below 70 per cent in some of the years. The Committee need hardly emphasise that the factors responsible for the under-utilisation of capacities should be critically analysed and necessary remedial measures taken at the earliest to maximise the production so as to reach as near the installed capacity as possible. In this context, the Committee find that a World Bank Mission, which visited the operating units of FCI and the Udyogamandal Division of FACT in 1969 to assess their performance and suggest remedial measures for overcoming various difficulties in attaining higher capacity utilisation, had also emphasised the need for taking necessary measures to improve capacity utilisation and had suggested, inter alia, that it would be greatly to country's advantage to make some marginal balancing investments on optimising the capacity in the existing plants rather than go in for bigger programmes for new investments.

5.53. In this connection, the Committee have been informed by the Department of Fertilisers and Chemicals that the need for maximising fertiliser production from existing capacity has constantly been engaging Government's attention and that the under-utilisation of capacity of individual plants was attributable to various factors like (i) power cuts and instability of the power systems, (as in the case of Nangal, Baroda, Vizag and Kanpur), (ii) occasional labour troubles (as in the case of Kanpur), (iii) breakdowns of plant and equipment on account of poor maintenance and mechanical problems (Trombay, Broda and Vizag), (iv) unplanned shutdowns on account of unforeseen technological difficulties (Namrup, Durgapur and Cochin), (v) defective design and obsolescence of technology (Neyveli), (vi) reduced quantum of critical inputs (like inadequate availability of coke oven gas in the case of Rourkela and non-availability of power in the case of Nangal), and (vii) extreme age of some of the plants (Sindri, where the equipments were stated to be worn out and to have outlived their normal life, and Udyogamandal, where certain sections of the plant have been operating over a long period of time with equipment which have outlived their normal life). The Committee have also been informed that from 1975-76, learning from past mistakes, the monitoring systems have been improved considerably not only in the Department of Fertilisers & Chemicals but in other Ministries as well and various programmes initiated for de-bottlenecking for most of the existing plants under a 'Plant Operations Improvement Project' (POIP) launched with the support of the World Bank. As part of the monitoring operations, the production performance of the operating units is stated to be monitored on a weekly and monthly basis and the reasons for shortfalls in production carefully scrutinised and necessary corrective measures taken, "not on any theoretical basis but as

a regular production plan", and the project management and operating management had also been separated. As regards the steps taken under the 'Plant Operations Improvement Project', the committee have been informed that on the basis of the suggestions of the World Bank and of a Technical Coordination Group constituted to review the performance of the operating units of FCI and FACT and identify areas where modifications and improvements could be carried out for achieving better levels of production, as well as the advice given by specialists and consultants in regard to problems faced by certain individual plants like Durgapur, Cochin and Trombay, various programmes to improve capacity utilisation have been evolved and are being implemented. The representative of the Department of Fertilisers & Chemicals also stated during evidence that it was Government's endeavour "to bring all the plants to a high degree of stability" and that they would not be satisfied unless 80 per cent capacity utilisation was reached and that as a result of the de-bottlenecking measures undertaken it was expected that capacity utilisation would register an increase of 12½ per cent, from 58.5 per cent to 71 per cent, during 1975-76. . . The Committee are informed that as a result of various measures taken to augment production, the capacity utilisation of nitrogen during 1975-76 and 1976-77 has substantially improved, being 70 per cent and 72.5 per cent respectively. They hope that Government would keep a contemporaneous watch on the implementation of various capacity augmentation measures so as to improve the capacity-utilisation further in the years to come. It should also be ensured, particularly in the context of the massive investment involved (for the FCI and FACT schemes alone a credit of 17 million dollars has been negotiated with the World Bank) that these measures actually subserve the objectives envisaged.

5.54. In order to correct the present imbalances between installed capacity and production of fertiliser plants in the country, the Committee would also suggest the following measures for implementation on high priority:

- (a) The cost of production of individual units should be critically examined and conclusive steps taken to effect economies in costs which could generate funds for re-investment in programmes for de-bottlenecking—and improved capacity utilisation. For instance, it should be possible to reduce inventories and thus cut down the inventory carrying charges by scientific inventory planning and control.
- (b) Adoption of scientific materials management and maintenance management principles would go a long way in reducing idle capacity caused by non-availability of raw materials and spares for maintenance. There should also be a proper schedule of

preventive maintenance and repairs and it should be ensured that maintenance is carried out according to this schedule so that there may not be any loss of production on account of inadequate maintenance.

- (c) Special R&D efforts should be directed towards the development of technology to meet shortages in respect of feed stock, raw materials and spare parts.
- (d) Government may also examine the feasibility of establishing a centralised 'Spares Bank' where costly and important spares in common use could be stocked instead of each individual unit carrying this heavy burden on itself and the resultant economies in costs channelised into more productive activities which might have been deferred on account of financial constraints.

5.55. Yet another factor which has necessitated continued imports of fertilisers at heavy foreign exchange outflow is the serious delays that have taken place in the implementation and commissioning of new projects. According to the information furnished by the Ministry of Petroleum and Chemicals to the Estimates Committee (1972-73) delays ranging from six months to three and a half years had taken place in the commissioning of various projects of the Fertiliser Corporation of India. Similarly, in respect of Cochin, Phase I and Udyogamandal Fourth Stage Expansion projects of FACT delays ranging between one to four years had occurred in completing and commissioning various components of the projects. It has also been conceded by the Department of Fertilisers and Chemicals that slippages in the commissioning of new projects had led to the periodical revision downwards of the estimates of indigenous production, on the basis of which the import strategy was worked out, necessitating larger imports than were anticipated initially. Besides, such delays have also led to an inevitable escalation of costs. That important projects vital to the country's agricultural economy should have thus lagged considerably behind schedule, in spite of the fact that the public sector has more resources at its command and also the backing of the entire governmental machinery, causes serious concern to the Committee.

5.56. According to the Department of Fertilisers and Chemicals, the following factors were responsible for the delays in completing and commissioning of new projects under implementations:

- (a) Delay in supply of equipment, both indigenous and imported, required for fertiliser plants which, in turn, was attributable to unforeseen factors, like labour unrest in the fabricators workshops, power cuts, difficulty in obtaining material for fabrication, etc.

- (b) Difficulties in fabrication of some sophisticated equipment being indigenised for the first time.
- (c) Extended time taken in arranging credits and finalising contract arrangements.
- (d) Delays by entrepreneurs in finalising their own plans and financing arrangements.
- (e) Delay on the part of construction contractors.
- (f) Difficulties in procurement of construction and structural items like cement, steel, etc.
- (g) Failure of critical items of equipment including imported equipment.
- (h) Delays due to adoption of new technology on a large scale.
- (i) Constraints in taking up new schemes on account of paucity of funds.

The Committee are of the view that some of these problems were, by no means, insurmountable and could have been solved by more effective coordination between the different agencies involved, and by reviewing critically the progress of the projects at regular intervals. The delays and gestation periods could have also been minimised by an efficient system of monitoring and adoption of techniques like PERT, CPM, etc.

5.57. The Committee note in this connection that, though late than never, a number of remedial measures, like streamlining of the distribution procedure for steel materials, expeditious disposal of individual requests received from fabricators for the import of tools and for obtaining foreign technical know-how for the manufacture of sophisticated equipment, timely placement of orders for equipment on the fabricators as soon as possible after the projects are sanctioned, ensuring that the items produced by the indigenous manufacturers are of the requisite quality, etc., have been taken in pursuance of the recommendations of a committee (Kastuirangan Committee) appointed to examine the reasons for the delays in commissioning of public sector plants. The Committee have also been informed that "a careful watch" is being kept by the Department of Fertilisers and Chemicals on the progress of all the projects under implementation through monthly progress reports and quarterly performance review meetings. As regards the steps taken to eliminate delays in the supply of equipment for fertiliser plants, particularly by Bharat Heavy Plates and Vessels Ltd., the Committee learn that the Ministry of Heavy Industry have taken "very strong monitoring steps" to reduce delays in deliveries and a number of remedial measures like

allocation of blanket foreign exchange for import of components and materials, streamlining of procedure for authorisation of imports, monitoring of processing of orders placed on foreign suppliers, off-loading of some of the items on other manufacturers, monitoring of progress of major orders by means of CPM|PERT charts, etc. have been adopted and that with these measures, further slippages in delivery schedules would be avoided. The Committee need hardly emphasise the imperative need for reducing the gestation period and expediting the commissioning of various new plants in the context of achieving self-sufficiency in fertilisers in non-too-distant a future and they trust that the measures now stated to have been taken would produce the desired results. Their adequacy should also be kept under constant review and timely corrective action taken whenever deficiencies come to notice.

5.58. With a view to expediting increase in the growth rate of installed capacity, a decision appears to have been taken to speed up investment in new fertiliser projects and to sanction at one time a large number of projects and to ensure their completion simultaneously instead of staggering the implementation of new projects. Thus, a massive investment of Rs. 1,100 crores in the public sector had been provided in the Fifth Plan for the purpose and with the escalation in costs, the investment necessary, has been presently estimated at Rs. 1,700 crores, which represents a five-fold increase over the investments made in the public sector fertiliser industry during the last four years of the Fourth Plan period (1970-71 to 1973-74). In the context of the sizeable shortfalls that had occurred in the achievement of financial as well as physical targets envisaged for augmentation of fertiliser production capacity during the Fourth Plan, the already over-loaded order book position of units manufacturing fertiliser plant equipment, problems of feed-stock and raw materials and other constraints that have come in the way of realisation of targets earlier, the Committee are doubtful how far the ambitious programme now proposed is capable of attainment. There is also need for a balanced approach to evolve a workable system to ensure that the fertilisers reach the farmer at the right time and place in the right quantities and at minimal cost. All this, therefore, naturally calls for the most careful planning, effective coordination and scientific monitoring. The organisational machinery also needs to be properly re-oriented and geared up to face the challenges likely to be posed by such a gigantic task, so as to be in a position to tackle effectively the multitude of problems likely to crop up in the implementation of any programme of such magnitude. The Committee would, therefore, urge Government to ensure that the fulfilment of the programme is not hampered in any way and to have the progress achieved so far properly and expeditiously evaluated by a body of experts and take conclusive steps to remedy deficiencies, if any.

5.59. In this connection, the Committee also feel that it would be worthwhile to have a critical appraisal of the targets proposed for the Fifth Plan particularly in the light of certain weighty observations contained in the Reserve Bank of India study referred to earlier in Chapter I. The study rightly points out that under existing conditions, the scope for further growth of fertiliser consumption is rather limited and that unless there was a breakthrough in the technology of cultivating commercial crops (such as cotton, jute and oilseeds) on the scale achieved in wheat, areas under multiple cropping were stepped up for improving the off-take of fertilisers and steps were taken to aid small farmers in taking to fertilisers on a much larger scale than they had done so far, the country might well reach a point of stagnation in fertiliser use. These facts only serve to underscore the importance of an integrated and multi-pronged approach to the entire question and the Committee would, therefore, like to be reassured that all these factors have been duly taken note of and necessary supporting measures initiated while arriving at a decision to speed up investment in new fertiliser projects.

5.60. Another aspect over which there has been considerable uncertainty and shift in policies from time to time relates to the feedstock to be adopted for fertiliser production. Till recently, naphtha had been the preferred feedstock for production of nitrogenous fertilisers. However, in the wake of the oil crisis and in view of the anticipated deficits in naphtha supplies on account of hardening of world supplies, increase in prices and uncertainties in regard to internal availability to sustain a major expansion programme for the production of fertilisers and also in the light of the findings of the Feedstock Committee, a policy decision appears to have been taken that there should be maximum diversification of the feedstock and that, as far as possible fertiliser capacity should be developed on other feedstock like fuel oil, heavier petroleum fractions and coal. The Committee, however, understand that with the prospect of improved availability of naphtha following the oil strike in Bombay High, there appears to be a shift once again towards the use of naphtha as feedstock as is seen from the recent decision to use this as the feedstock for the Mathura Fertiliser project. While the Committee concede that the issue involved in the determination of an appropriate feedstock are complex and that the various options available stand that with the prospect of improved availability of naphtha following nevertheless stress the need for evolving a definite and long-term feedstock policy to facilitate timely and correct investment decisions being taken. In view of the fact that considerable time has also elapsed since the various options available were last gone into in detail by the Feedstock Committee (1969), the Committee also feel that it might be worthwhile for an expert body to have a fresh look at the entire question. The Committee would also like Government to consider whether it is not possible to provide "built in" option in the new plants to enable them to switch over to naphtha, fuel oil

etc., or any other fraction of crude oil as may be most economic and advantageous to be used in given circumstances.

5.61. The Committee find that in spite of the fact that coal is abundantly available in the country and would, therefore, appear to be the most suitable feedstock from the point of view of self-reliance, adequate and serious attention had not been given to the use of coal for fertilisers until recent years, when a decision was taken to establish three coal-based plants at Ramagundam, Talcher and Korba, of which implementation of the Korba project has also been slowed down on account of financial constraints while the Ramagundam and Talcher plants were expected to be commissioned in 1977. What is more disconcerting is the fact that some doubts have also been raised about the very success of the coal-based project, which has been described as a 'major experiment'. The Committee have been informed in this connection that apart from an ICI plant in South Africa, coal-based technology had not been used as yet the world over and that as it was the first time that a large coal-based project was being taken up for implementation in the country, an "obvious investment risk" was involved. The Department of Fertilisers and Chemicals have, however, sought to reassure the Committee and have stated that they were in touch with the experts possessing the requisite experience in coal gassification processes and that the consultants for the project were also the consultants for the earlier South African projects which had been successfully commissioned and was in operation. While the Committee are not averse to forward technology being employed in establishing projects, they cannot, however, help feeling that in view of the apparent risks and uncertainties involved in and the misgivings expressed by Government spokesmen over the experiment with coal-based fertiliser plants, a smaller pilot project with a view to ensuring that the technology was a proven one might have been more prudent to begin with before going in for large-sized plants involving larger capital outlay and which were also going to take a longer time for commissioning. No doubt, this would have postponed further, as has been contended by the representative of the Department of Fertilisers and Chemicals, the possibility of using coal in any significant scale. However, such a step would have ensured that the country's meagre resources were not expanded injudiciously in major experiments whose outcome is uncertain. In any case, the performance of the two coal-based plants at Ramagundam and Talcher should be closely watched and monitored and timely action taken to remedy the deficiencies in these plants as well as the new project coming up at Korba.

5.62. The Committee would also like to recall in this context that more than two decades earlier, the possibility of evolving a coal-based technology had been suggested and supported by Indian scientists like late Dr. A. C. Ghosh and some studies in this regard had also been started subse-

quently at the Dhanbad Institute. The Committee cannot resist the impression that had these suggestions and studies been given positive encouragement and pursued to their finality, a good deal could perhaps have been learnt earlier from the experience instead of relying now heavily on the somewhat uncertain outcome of foreign know-how. It is sad that coal-based technology had not been considered then with the seriousness that it rightly deserved.

5.63. Incidentally, the Committee find that the Feedstock Committee had also examined the economic feasibility of using electricity as a feedstock for fertiliser production had felt that certain developments then in experimental stage might be of interest for adoption if proved successful for commercial use in fertiliser production. While the Committee would like to be informed, in some detail, of the outcome of these experiments, they would also stress the importance of directing indigenous R&D efforts towards the development of a suitable technology for low cost electrolysis which could be profitably utilised, among other things, for the economic production of fertilisers. Similarly, R&D efforts should also be oriented towards the development of simpler processes to reduce costs and newer methods of potash recovery from all available sources to reduce the country's dependence on imports of potassic fertilisers, which are at present being imported cent per cent. There is no dearth of technical and scientific talent in the country and given the requisite encouragement and resources there is no reason why they should not be able to find solutions to these problems.

5.64. In the present context of short supply and high prices of chemical fertilisers, the development of local manurial resources and the use of organic manures assume great importance. Besides, the use of organic manures in conjunction with chemical fertilisers is also very essential for preserving nutritional balance and fertility of the soil. While the Committee note that some organised steps are at long last being taken to produce organic fertilisers from the abundantly available urban and agricultural wastes in the country and to promote their use, (like the establishment of mechanical compost plants in cities with a population of 3 lakhs and above, of sewage and sullage utilisation schemes, setting up of 1 lakh gohar gas plants in rural areas during the Fifth Plan for the production of gas for fuel purposes and good quality manure for agricultural production, organisation of demonstration-cum-training camps for popularising the production and use of organic manures, etc.), they, however, feel that a lot more still needs to be done to tap the vast potential available in the country for the purpose. For instance, the Committee find from an article by Dr. Sethna (Chairman, Atomic Energy Commission) that while it was estimated that around 324 million tonnes of cattle dung would be available in India in 1975-76, only 0.15 million tonnes had been utilised in 1972 in gohar gas plants located in different parts of the country to produce methane gas and manure.

According to another expert cited in an article entitled "Bio-gas (Gobar Gas) Plant in Perspective" by R. K. Awasthi, the burning of the cattle dung in the whole of the country amounts to losing annually as much fertiliser as eight Sindri plants can produce. Yet another article featured by the United Nations Environment Programme (UNEP), based on a study by Prof. Amulya Kumar N. Reddy, Convener of ASTRA (Application of Science and Technology to Rural Areas) at the Indian Institute of Science in Bangalore, points out that to produce 230,000 tonnes of nitrogenous fertiliser a year, a developing country can build either one large coal-based plant in the city or 26,150 small, village level biogas (Gobar gas) plants, which would also generate 130 times as much employment in poor, rural areas where employment is most needed. That a lot more needs to be done in this regard is also evident from a report submitted by a committee appointed by the Indian Council for Agricultural Research, which indicates that there is a possibility of increasing the use of organic manures by about 30 per cent by adopting improved methods. The representative of the Department also conceded that there was a need for stepping up the use of organic manures.

5.65. The Committee note that Government have taken up a comprehensive programme during the Fifth Five Plan to intensify production and use of compost and other organic manures. The target fixed for the production of rural compost and urban compost a year by the end of the Plan period is 350 million tonnes and 7.5 million tonnes respectively as against the present production of the order of 200 million tonnes and 5.3 million tonnes of rural and urban compost respectively. Green manuring and sewage/sullage utilisation programmes are also being intensified. The Committee hope that Government will keep a watch over the implementation of these programmes so as to achieve the targets laid down. The Committee expect that the various programmes for increasing production of organic fertilisers during the Fifth Plan would be energetically implemented and concrete and conclusive steps should also be taken concurrently to tap the available potential on a much larger scale. The Committee have been informed in this connection that a committee has been set up under the chairmanship of the Secretary, Department of Fertilisers and Chemicals, for the development of organic fertilisers and that the Department of Agriculture have been asked to work out a specific programme with a view to commercialising some of the ideas suggested by people like Dr. S. P. Dua, Chief Agricultural Scientist, Fertiliser Corporation of India. Considerable time having elapsed since then, the Committee would like to be apprised of the outcome of these efforts and the specific steps taken as a sequel thereto.

NEW DELHI;
December 6, 1977.

C. M. STEPHEN,
Chairman,
Public Accounts Committee.

Agrahayana 15, 1899 (S).

APPENDIX I

(Vide para 1.21 of the Report)

Note on the basis on which the estimates of fertiliser requirements were worked out.

In 1971 the Committee of Economic Secretaries set up a Working Group Under the Chairmanship of Shri Y. T. Shah to go into the question of realistic assessment of fertiliser requirements in the context of import. After considering the various factors concerning fertiliser consumption, the Group recommended that the assessment should be based on an increase of 15 per cent to 20 per cent over consumption of the previous Kharif season, for Kharif, and an increase of 20—25 per cent over consumption of the previous Rabi season for Rabi season. Accordingly for Rabi 1972-73 and Kharif 1973 the method of assessment was on the basis of an increase of 17 per cent for Kharif and 22 per cent for Rabi over previous Kharif and Rabi season respectively.

The application of the method mentioned above evoked criticism from many State Governments, who held that the method had no relation to the agricultural production programmes of the States. Accordingly a method was evolved by the Ministry linking the requirements to the production programmes and this method was used for assessing the fertiliser requirements of the States for Rabi 1973-74 season. The method consists of the following steps:—

1. Selection of the best fertiliser consumption season in the State, since 1969-70.
2. *Standardisation of the area under different crops in State for this year.* The standardisation was done by converting the area under different crop figures into area under one crop. For instance if a State grows, HYV Wheat, local Wheat, HYV Barja, Local Bajra, sugarcane, Potatoes and Cotton the area under these various crops would be reduced into one area, say area under HYV Wheat. The conversion was achieved by assuming certain conversion ratios, based on recommended doses. Thus it was assumed that if HYV Wheat requires one Unit of fertilisers, Non HYV Wheat will take $\frac{1}{2}$ Unit, Cotton will require 1 Unit, HYV Bajra $\frac{1}{2}$ Unit and local Bajra $\frac{1}{2}$

Unit etc., the standardised areas of different crops were added to arrive at one figure.

3. *Calculation of the average dose.* The average dose was calculated by dividing the consumption as at (1) above by the area as at (2) above.
4. On the average dose thus calculated, a 50 per cent increase was granted for each season. Thus if the average dose has been calculated for Rabi 1970-71 season, 5 per cent increase was given for Rabi 1971-72, another 5 per cent for Rabi 1972-73 and yet another 5 per cent for Rabi 1973-74. Thus the revised dose for the season under consideration was worked out.
5. The revised dose was multiplied by the standardised area for Rabi 1973-74. And thus the requirements for Rabi 1973-74 season were worked out.
6. However, in case for a State, Rabi 1972-73 season came to be the best season, the State was granted yet another 5 per cent increase over the requirements worked out at (5) above. This was so because during Rabi 1972-73 season there was shortage in the availability of fertilisers. If more fertilisers were available the consumption would have been comparatively a little more.

However, a choice was given to the States to choose between the results, given by the method of 22 per cent increase over the consumption previous Rabi and the method based on production programmes. Since it was felt that the method may need improvement it was announced in the Zonal meetings that a committee would be formed to suggest alternative suitable method or any modification in the proposed method if desired. Accordingly, a Committee under the Chairmanship of Joint Secretary (I) was constituted by Government to go into the question of the assessment of fertiliser requirements. The Committee studied the method and after several meetings and discussions, it broadly approved of the method adopted by the Ministry with the modification that comparatively backward States should be accorded a higher rate of increase in the dosage rate to enable them to gradually catch up with the progressive States. As a result, while assessing the fertiliser requirements of the States for Kharif 1974 season, the States were grouped into 8 classes on the basis of their consumption per hectare in a year of no shortage and a different percentage increase in the average dose was granted to each group of States. The percentage increase granted varied between 5 per cent to 12 per cent for these 8 classes. States like Punjab were given an increase of 5 per cent only, while the States like Assam, Tripura etc. an increase of 12 per cent. Many States, however, complained that the

percentage increase accorded to backward States was too meagre. As a result for assessing Rabi 1974-75, requirements, the States were grouped in 9 classes with the percentage increase in average dose rate varying from 5 per cent to 20 per cent for these 9 classes. (Classification attached *See Annexure*). The same method and classification has been adopted for assessing fertiliser requirements for the subsequent period.

ANNEXURE

Classification adopted for Rabi 1975-76

1. Pondicherry & Punjab	5%
2. Chandigarh & Tamil Nadu	6%
3. Delhi	8%
4. Andhra Pradesh, Kerala and Uttar Pradesh	11%
5. Gujarat, Haryana and Goa	13%
6. Karnataka and West Bengal	14%
7. Maharashtra and Bihar	16%
8. Jammu & Kashmir, Himachal Pradesh, Orissa and Madhya Pradesh	17%
9. Rajasthan, Manipur, Assam, Tripura and others	20%

APPENDIX II

(Vide para 1.21 of the Report)

Method employed by the Ministry of Agriculture to collect data on consumption of fertilisers.

The Department of Agriculture collects figures of opening stocks, receipts during Kharif/Rabi season and the closing stock, for each of the two seasons. (Kharif is defined as the season from 1st April to 30th September and Rabi as the season from 1st October to 31st March.)

2. The Ministry holds Zonal Conferences at 5 different centres in the 5 zones of the country so that the States and manufacturers could conveniently attend these meetings. A detailed proforma is sent to the States about a month in advance of the meetings. In this proforma the States are required to indicate the stocks physically existing in the States and those for which the various units like cooperatives Agro-Industries etc. have paid for and are in transit, both on the opening day of the season and the closing day of the season, as well as receipts and retail sales during the season. The States are required to and, indeed, hold advance meetings with the manufacturers, cooperatives, Agro-Industries. Corporations and other important distributors to arrive at these figures. The stocks and the sales figures are of those *upto and including the retailer*. Once the retailer sells the material to the farmer it is assumed to be consumed so that retail sales are treated as equivalent to consumption. The States also have a Standing Committee on Fertilizers which hold meetings with the manufacturers and distributors every month in order to review the stocks and sales. In some States such Standing Committees have worked well and in some States they have been dormant. Thus, the States come to the Zonal Conferences with detailed statistics product-wise, of opening and closing stocks and also receipts during the season and urge that the differences between total availability and closing stock should be taken as consumption. Often the Zonal Conferences are held a month or so before the conclusion of the season; and in such circumstances the States show best possible estimates of closing stock and of sales, even though the season is not yet ended. They are allowed then to make minor changes after the season is ended in the light of data concerning actuals.

3. In the Zonal Conference, if any exaggerated account of consumption or an under-estimated account of the stock is given by the State

Government, the manufacturers and distributors operating in the area immediately challenge the State Government's figures since their interests are likely to suffer. Moreover, the officials of the Fertilizer Division themselves carry with them the figures of despatches from the Pool and the manufacturers State by State in order to check the figures given by the States of receipts and of consumption. These checks and balances operate effectively and yield a fairly accurate picture of stocks and consumption.

4. While the above system throws up the required figure once in six months, it was felt that a month-wise flow of data would be more useful to the States and the Centre for effective import planning. It is in this connection that the Indian Institute of Management, Ahmedabad at the request of the Ministry suggested a system of data reporting from the retailer upward. Their suggestions include rationalisation of the report format, avoidance of double accounting and streamlining of the reporting machinery. This system was tried in Punjab and Tamil Nadu. It was found that there were large scale defaults in the reporting by the retailers, despite a legal obligation cast on them; and the State Agriculture set-up did not have a strong enough machinery for enforcing the law. It is proposed to change the system by making the wholesalers rather than retailers, as the reporting base. The figures of consumption of all the States are again cross-checked with the opening and closing stocks with the Pool, the manufacturers and the various units in the States and the despatches made by the Pool & manufacturers in order to check up the consistency between National and the State figures.

APPENDIX III

(Vide para 1.28 of the Report)

Note on the basis on which the estimates of indigenous production are worked out and the reasons for the revision.

The estimates of production, are worked out broadly on the following basis:—

1. Targets of production of fertilizers both nitrogenous and phosphatic are fixed for each year of the plan periods, much in advance of the commencement of the year on the basis of the estimate of capacity to be built up at the beginning of each year and the likely production as against the capacity expected to be installed. At the beginning of each year, however, the estimates of production are worked out on a more realistic basis, keeping in view (a) the likely production from the units in operation at the beginning of the year, taking into account, *inter alia*, their performance in the previous year, the condition of the operating plants and other known constraints limiting production; and (b) the likely production from units expected to go on steam during the year. These estimates are drawn up in consultation with the manufacturers. In doing so, it is assumed that the supply of power and other essential inputs and labour relations would remain normal through out the year.

2. Notwithstanding the above, variations do occur between the Plan targets and the estimates as worked out at the commencement of each year; these are mainly attributable to the unexpected delay in the commissioning of new projects under implementation. The production targets of 14.20 and 18.20 lakh tonnes of nitrogen in 1971-72 & 1972-73 (mentioned at page 100 of CAG's Report) fixed in October, 1970, took into account contributions from the following projects under implementation:—

(Estimates of Production '000 tonnes of 'N')		
Unit	1971-72	1972-73
1. Durgapur	95	125
2. Cochin	65	120
3. Madras	65	130
4. Barauni . . . . .	..	95
5. Namrup II . . . . .	..	95
6. Goa . . . . .	..	30
7. Kota (Expansion) . . . . .	..	5
	225	600

3. However, barring a small contribution from MFL, there was no contribution from these projects, since they could not be commissioned during these years. The expectation that there would be a production of 1.60 lakh tonnes during 1971-72 and 4.70 lakh tonnes of N during 1972-73 from these units did not materialise.

4. A brief analysis of the estimates and the reasons for revisions made in the targets of production during 1971-72 and 1972-73 is given below:
1971-72.

In the beginning of the year 1971-72, the production estimates of N were revised to 13.20 lakh tonnes. This revision took into account a production of 80,000 tonnes of N, against the earlier 160,000 tonnes from Durgapur and Cochin, and 45,000 tonnes of N as against the earlier estimates of 65,000 tonnes of N from MFL unit taking into account the progress made in the implementation of these projects at the beginning of 1971-72.

(ii) A further review was made in the middle of the year, taking into account the actual production during the period April—September, 1971 which was of the order of only 4.09 lakh tonnes of N. In October, 1971, therefore, the estimates were revised down to about 12 lakh tonnes of nitrogen.

(iii) In December, 1971, the estimates were further revised to 10.28 lakh tonnes of nitrogen taking *inter alia* into account the fact, that no production from Durgapur and Cochin projects was likely to be available. The year 1971-72, however, actually ended with a production of 9.52 lakh tonnes of nitrogen.

(iv) The reasons for shortfall in production of N as against the original estimates for 1971-72 together with the losses suffered on account of various imponderables are given below:—

	Production loss in '000 tonnes N
1. Power cut/interruptions (upto Dec. 71)	30.5
2. Poor operation by Neyveli, Rourkela & FACT (for 1971-72)	135.0
3. Low quality and inadequate supply of gypsum, coal in inadequate supplies of naphtha (upto Dec. 71) at Sindri	9.5
4. Gypsum shortage (upto Dec. 71), at GSFC Baroda	1.1
5. Labour problems/strikes at Neyveli, Alwaye, Kanpur (upto Dec. 71)	26.1
6. Shortage of naphtha at Gorakhpur (upto Dec. 71)	2.4
7. Shortage of raw materials (upto Sept. 71) at Vizag.	3.3
8. Delay in commissioning Durgapur, Cochin and MFL	85.0
9. Maintenance and other problems and the estimated loss of production for the remaining three months of the year on account of problems mentioned at 1 to 7 above	77.1
	370.0

1972-73

(v) Against the plan target of 18.20 lakh tonnes of nitrogen fixed in October, 1970, as stated in para (2) above, the production estimates had to be revised in February, 1972 to 14.05 lakh tonnes of nitrogen on account of:—

- (1) Three new plants viz., Durgapur, Cochin and Goa would be going into production in 1972-73 and contributing between them above 2,20,000 tonnes of nitrogen.
- (2) MFL plant was commissioned in late 1971-72 and contributed only 42,000 tonnes of N. Production from this unit during the year 1972-73 was estimated at 1,30,000 tonnes of N.
- (3) Better utilisation of installed capacity of other operating units on the assumption that certain essential conditions like availability of stable and requisite power supply, industrial harmony and availability of key inputs would be fulfilled.

(vi) The estimates were further lowered in June, 1972 to a production in the range of 12-13 lakh tonnes of nitrogen due to unforeseen developments, some of which are briefly as follows:—

- (i) Various mechanical problems/breakdowns in the commissioning phase of Durgapur and Cochin projects which were expected to go into commercial production in April, 1972. These developments made it difficult to forecast any production from these projects and only a token production of 40 to 45 thousand tonnes as against 190,000 tonnes estimated in February, 1972, were taken into account.
- (ii) Unforeseen factors such as power cuts/fluctuations and strikes accounting for loss in production at Vizag, Madras, Udyogamandal in April-May, 1972.

5. The year 1972-73, however, actually ended with a production of 10.60 lakh tonnes of nitrogen, representing a shortfall of 3.45 lakh tonnes of nitrogen. This shortfall was accounted for by the following factors:—

- (i) The assumption made in February, 1972 that the new plants viz., Durgapur, Cochin and Goa would between them contribute a production of 2.20 lakh tonnes of nitrogen did not materialise, as none of these plants went into production in 1972-73.

- (ii) The remaining shortfall of 1.25 lakh tonnes was accounted for by factors such as power cuts failures (69,700 tonnes), labour trouble (23,400 tonnes) and unplanned shutdowns and plant breakdowns (21,500 tonnes), etc.

6. The analysis of shortfall in production during the two years 1971-72 and 1972-73 has been presented above with a view to elucidating the various reasons responsible for shortfall in production targets at different times. In brief, these factors can be summarised as under:—

- (i) Power cuts and instability of power systems;
- (ii) Occasional labour troubles;
- (iii) Breakdowns of plants and equipments;
- (iv) Unplanned shutdowns because of unforeseen technological difficulties.
- (v) Shortage in supply of critical inputs like feedstock and raw materials;
- (vi) Old and ageing equipments in some of the plants like Sindri and Always;
- (vii) Slippage in the commissioning of new projects.

7. Arising out of past experience in estimating production of fertilizers, the Department has now revised the methods of estimation for the year 1975-76. The estimates of production made for 1975-76 are based entirely on the performance of operating units; no credit has been taken for production that is likely to come out of units expected to go on stream during the year 1975-76. Even in estimating production from the operating units, a suitable provision has been made for likely loss in production arising out of known constraints such as power cuts/fluctuations, shortage of raw-material, labour problems etc. It is, therefore, expected that the actual production during the year 1975-76 would not vary from the target to any appreciable extent. It is, however, proposed to take mid-year review in October, 1975.

APPENDIX IV

(Vide para 1.41 of the Report)

Import of Fertilisers by the MMTC.

The procurement programme of 1972-73 is to be viewed against the background of performance in the years 1970 and 1971. During the year 1970 and 1971, following quantities of Urea were contracted for from different countries:

(In Metric Tons.)

Name of the country	Qty. contracted for 1970	Qty. contracted for 1971
Poland	1,20,000	1,00,000
Bulgaria	1,89,500	1,80,000
Romania	34,000	40,000
Hungary	10,000	Nil.
USSR	40,000	8,000*
	<u>3,03,500</u>	<u>3,28,000</u>

*Against backlog

The fertilizer purchases from East European countries are contracted by MMTC on the basis of requirements indicated by the Ministry of Agriculture. In respect of the year 1970 even by the end of June, 1970, the Ministry of Agriculture authorised MMTC to contract for a quantity of only 54 thousand m/t of Urea. It was after a great deal of persuasion that they finally agreed to authorise negotiations for a total quantity of 3,84,000 tonnes—most of which was for delivery during the year 1971. In respect of the year 1971, the Ministry of Agriculture had indicated the requirements of 3.1 lakh tonnes out of which only a quantity of 1.5 lakh tonnes was for delivery during the year 1971. In both the years 1970 and 1971, East-European countries were prepared to offer much larger quantities as per the delivery schedule. They, in fact, expressed dissatisfaction over the small quantities for which they were given the firm delivery schedule. Since the production of urea is on a regular monthly basis.

the suppliers want regular deliveries so that they do not accumulate stocks.

2. Against contracts concluded by MMTC with Bulgaria and Poland in 1971, a quantity of 1.6 lakh tonnes was to be shipped during the period February to June, 1972 as per the delivery schedule indicated by the Ministry of Agriculture. These contracts were signed on 29-6-71 and 1-7-71 respectively. However, the world fertiliser position, by the end of 1971, started deteriorating. By the end of October, 1971, the Ministry of Agriculture intimated that they would like deliveries to be expedited. The matter was again taken up with both the suppliers who agreed to advance the delivery schedule. So, the carry over of quantities contracted against 1971 agreement was 1.3 lakh tonnes on 1-1-72. The carry over on 1-3-72 was 54 thousand tonnes.

3. The Ministry of Agriculture revised the estimates of imports in the meeting of the Standing Committee held on 4th November, 1971. Accordingly, urea import was pitched at 6.3 lakh tonnes for the year 1972-73. The reason for a higher requirement was on account of fall in indigenous production and rise in consumption. As regards MMTC's import programme for 1972-73, it was expected that on the basis of past offerings of fertilisers by the East-European countries and also the assurances of the trade representations of these countries, the estimate for 1972-73 was placed by MMTC at 6 lakh tonnes as follows:

Poland	. . . . .	2,00,000 m/t
Bulgaria	. . . . .	2,00,000 m/t
Rumania	. . . . .	1,00,000 m/t
USSR	. . . . .	1,00,000 m/t
		6,00,000 m/t

Further, considering the backlog from 1971 contract, it was considered by MMTC that the total import from East-Europe could be about 7.5 lakh tonnes.

4. These estimates were sent to the Department of Economic Affairs on 1st December, 1971. In a meeting held in the Department of Economic Affairs on 6-12-71, it was decided that 6 lakh tonnes of urea could be imported from the rupee payment countries. The Committee of Economic Secretaries in their meeting held on 7th December, 1971, constituted a working group to go into the total picture of fertilizer demand, indigenous production and inscapable imports. The Working Group reported its

findings to the Committee of Economic Secretaries on 13th December, 1971. According to this Report, MMTC was to be authorised to import 6 lakh tonnes of urea from East European countries during 1972-73 out of which 3 lakh tonnes was to be imported by the end of May, 1972. Subsequently, on 9th February, 1972, the Department of Economic Affairs requested the Department of Agriculture to increase the procurement of urea from East European countries from 6 lakh tonnes to 7.5 lakh tonnes and agreed to allocate the necessary rupee exchange for the purpose.

3. The fertiliser import programme from East-European is dependent on the relevant provisions in the Trade Plans. The East-European countries took a difficult line regarding Trade Plan provisions for urea with the result that the provisions were short of the requirement of 6 lakh tonnes of additional import. The following were the Trade Plan provisions:

1972 Trade Plan Provisions:

Name of the country	Date of finalization of the Trade Plan	Provision (Figures in brackets corresponding 1971 provisions)
Poland	16-12-71	Rs. 70 million (Rs. 55 to 75 million)
Bulgaria	29-11-71	Rs. 75 million (Rs. 55 to 75 million)
Rumania	17-2-72	Rs. 60 million (Rs. 47 million)
Hungary	17-1-72	Rs. 6 million (Rs. 11 million)
USSR	24-12-71	80,000 M/T, (nil)

Thus, the 1972 Trade Plan provided for an import of about 4.5 lakh tonnes only, though there was an assurance that if larger quantities of urea could be arranged the needed rupee exchange would be made available.

6. As soon as the Trade Plans were finalised, negotiations were started with these countries by the MMTC. They were asked to send their offers and also their negotiating teams. Only Poland responded to the request. Rumania and Bulgaria did not offer urea. Rumania also did not indicate willingness to supply urea. They were more interested in the supply of CAN. It appeared that these countries had collectively decided to hold back supplies to India in anticipation of higher prices as the world demand and supply position had undergone a sudden and sharp change. Further, Rumania claimed that their plant had a breakdown and was working well below the installed capacity and that their own consumption of fertilizer had increased due peculiar weather conditions necessitating a second application of fertilizer. Bulgaria claimed that because of the drying of gas in the well from early 1972, the production of urea at this major plant had come down substantially.

7. Poland declared force majeure in respect of this supply of urea to India and it was with considerable difficulty that they could be persuaded to lift the same.

8. Thus during the first part of 1972, the position regarding availability of urea from East-Europe radically changed on account of a large number of factors which could not be foreseen by the MMTC.

9. It must be added that during Chairman, MMTC's visit to Europe in February, 1972, he made detailed enquiries about the position and found that East-Europe had sold large quantities to other parties. The larger sales in February, 1972 were on account of the mild winter in Europe and setting in of an early spring which made the fertilizer season commence 2 months before the usual time. Normally, these two months' stocks would have been available for sale to India. Further a balance of payment position in favour of Poland, Bulgaria and Rumania made these countries reluctant to commit fertilizer to India which they could sell to West-Europe against hard currency. Chairman, MMTC informed the Ministries of Agriculture, Foreign Trade and Economic Affairs as early as 7th March, 1972, that the anticipated quantities of urea were not likely to be available from East-European areas and suggested the following to avoid short-fall in the availability of fertilizers:

- (a) purchase of fertilizers against barter deals from West-European sources;
- (b) immediate start of negotiations with Japan, Nitrex and ICI for delivery in May-June, 72;
- (c) additional allocation of free foreign exchange for 3 lakh tonnes of urea; and
- (d) since supplies from East-Europe were not merely commercial transactions, political pressure to be brought on USSR, Bulgaria, Rumania and Poland to speed up deliveries under the Trade Plan Provisions.

10. Therefore, the comment attributed to the Department of Agriculture in the Audit Report that "with better economic intelligence this could have been foreseen and alternative arrangements could have been made in time" is not justified. The MMTC did receive the necessary market intelligence as early as in March, 1972 that the anticipated supplies from East-Europe would not be forthcoming and MMTC brought this to the notice of the Department of Agriculture, Foreign Trade and Economic Affairs for taking necessary corrective action to avoid shortfall in the availability of fertilizers for food production.

APPENDIX V

(Vide para 1.47 of the Report)

Note on the Quantity of Fertilizers in Stock and Steps taken for their disposal

The position regarding fertilisers stocks as on 1st July, 1975 is as follows:—

(In lakh tonnes of nutrients)

	N	P	K	Total
1. Stocks with domestic manufacturers	0.82	0.54	..	1.36
2. Stocks with the Central Fertiliser Pool	2.18	0.95	0.20	3.33
TOTAL STOCKS	3.00	1.49	0.20	4.69

2. About 50 per cent of our requirements of fertilisers are met through imports. Imported fertilisers, most of which arrive at the major ports have to be moved over long distances to the various consumption centres. The fertilisers indigenously produced have also to be moved over considerable distances to the various consumption points which are located in far flung villages spread all over the country. It has to be ensured that these fertilisers reach the retail outlets which are about 70,000 in number well in time for the cultivating season. Accordingly the need for a sizable pipeline stocks in order to ensure easy availability of fertilisers all over the country has been recognised since long. The quantum of this pipeline would be between 10 and 20 per cent of the annual fertilisers consumption target. For instance, the Committee on Fertilisers set up under the Chairmanship of the Secretary, Agriculture, in its report dated the 2nd June, 1975, has recommended that a pipeline provision to the extent of 10 per cent of the requirements should be taken in to account. This is the quantity which would be at various points in the distribution system and not be available for immediate use. On the basis of the consumption target of 36 lakh tonnes of nutrients for 1975-76, the pipeline provision was worked out as 3.6 lakh tonnes of nutrients by the Committee.

3. For a country which imports such a large quantity of fertilisers like India, the need for a sizable market buffer has also been recognised for long. Such a market buffer would ensure a strong bargaining position for the country in the international market. This would also ensure that the supply is not affected by sudden slippages in domestic production, which have been all too common in the past. The maintenance of a sizable market buffer would ensure that fertilisers can be rushed to any point when a sudden demand for them develops. Thus the Committee on Fertilisers recognised that a market buffer equal to 20 per cent of the annual requirements (*i.e.* 7.6 lakh tonnes of nutrients) is necessary. This buffer, of course, was not to be completely built up in one year but was to be built up over a period of time. Thus the present stocks of 4.69 lakh tonnes is considered to be a reasonable stock holding which would enable the Government to ensure the uniform availability of fertilisers at reasonable prices all over the country.

4. The production of fertilisers in the domestic factories occurs more or less uniformly throughout the year. The imports also continue more or less throughout the year. It is physically not possible to import the entire requirements just prior to the consumption season for the following reasons:—

- (i) The production in foreign factories is continuous and they would like lifting to be done uniformly throughout the year.
- (ii) Shipping space would not be available for importing our entire requirements just prior to the consumption season.
- (iii) It would not be possible for the ports to handle the very heavy volume of traffic which would result if imports are being made just prior to the consumption season.
- (iv) Imports have to be made at an appropriate time taking into account the trends of fertiliser prices in the international market.

5. The last 3 or 4 months have been a period of relatively heavy import arrivals caused by easy availability of fertilisers in the international market. The domestic production has also picked up since January, 1975. On the other hand, the period from February to June, 1975 is a period of relatively negligible consumption of fertilisers. Consumption of fertilisers generally occurs in two peaks, one in July-August and the other in November-December. It thus becomes necessary in practice for sizable stocks of fertilisers to remain with the domestic manufacturers and with the Central Fertiliser Pool during most parts of the year.

6. After a period of shortages in availability of fertilisers in the country from 1972 to '74, the availability of fertilisers has been relatively easy during

the past 6 months or so. As a result, both the distributing agencies and the cultivators tend to purchase fertilisers only just before the application season and only in such quantities as are immediately required. Taking all these factors into consideration, it is felt that the present stocks of fertilisers in the country namely 4.69 lakh tonnes is a very reasonable figure.

7. A number of steps have been taken for ensuring the speedy off-take of fertilisers. The Special Group of Secretaries appointed a Committee on Fertilisers under the Chairmanship of the Secretary, Agriculture, on the 5th May, 1975. The Committee submitted its report on the 2nd June, 1975. Most of the recommendations of the Committee have already been acted upon. These include the following:—

- (i) As a result of the steep rise in prices of fertilisers, amounting on the average to 80 per cent made with effect from 1st June, 1974 the requirements of farmers credit and distribution credit for fertilisers increased all of a sudden. Instructions were, therefore, issued by the Reserve Bank of India to provide adequate credit taking into consideration the increased prices. The various procedural difficulties involved in this have now been sorted out and both the distribution credit and the cultivators credit have been increased almost in all cases. Steps have also been taken to ensure that the cultivators actually avail of the increased credit. Wherever difficulties are noticed, the matter is being taken up with the Reserve Bank of India at the highest level.
- (ii) During the period of shortage of fertilisers, most of the States imposed rigorous internal distribution controls. When it was observed that these controls were acting as a bottleneck in the smooth offtake of fertilisers, the State Chief Ministers were addressed by the M(A&I) requesting them to review the distribution of fertiliser controls and as a result most of the states have completely removed the internal distribution controls. Wherever these exist they do not serve as a bottleneck in the smooth offtake of fertilisers.
- (iii) The distribution margins given to the distributors of fertilisers had remained unchanged since 1968, inspite of three-fold increase in fertiliser prices. These margins have now been increased with effect from 18th July, 1975 by about 40 per cent on the average.
- (iv) Fertilisers have been taken to the likely consumption centres so as to ensure ready availability when demand for fertilisers picks up.

- (v) The provision for a short-term loan for inputs for the year 1975-76 has been increased from Rs. 60 crores to Rs. 90 crores.
- (vi) During the Regional Zonal Conferences, the State Governments have been told to take all steps to ensure free availability of fertilisers and to ensure the maximum possible consumption of fertilisers.
- (vii) The steep rise in prices had adversely affected the offtake of fertilisers. Accordingly the prices of fertilisers have been reduced from the 18th July, 1975. The domestic manufacturers have also been persuaded to reduce the prices of fertilisers whose prices are not statutorily controlled. Prices of the most of the fertilisers issued from the Central Fertiliser Pool have also been reduced. The Rajasthan Government has been persuaded to reduce the prices of rock phosphate by Rs. 75 per tonne. This in turn would reduce the cost of production of fertilisers.

8. As regards the present stock position of pool fertilisers, the following points are note-worthy:—

- (1) Since a large number of variables are involved in the determination of agricultural production targets, fertiliser consumption targets, fertiliser production targets and consequently the fertiliser import projections, it is well recognised that it is not possible to have a continuous or exact equilibrium between demand and availability of fertilisers.
- (2) If there is to be a choice between a marginal surplus situation and a marginal deficit situation, it is better to have a surplus situation keeping in view the vital nature of agricultural production programmes.
- (3) The Expert Committee on Storage set up by the Planning Commission went into the entire question of the level and quantum of storage required for different commodities. In respect of Pool fertilisers, they recommended that the storage available with the Central Pool at any given time should be roughly 50 per cent of the annual distribution by the Pool. According to this yardstick for distribution of about 35 lakh tonnes of material every year the pool should have a storage accommodation of about 17.5 lakh tonnes. Keeping this in view the present level of fertiliser stocks to the tune of 13 lakh tonnes would not be considered excessive.

- (4) The National Commission on Agriculture in their Interim Report on Fertiliser Distribution (November, 1971) recommended that "in order that the timely supplies to the farmers are assured" storages for one and half month's receipts at the ports and two months stocks in the interior depots should be arranged, making a total of 3.5 months' total buffer stocks which comes to about 30 per cent of the annual distribution. With an annual Pool distribution of 35 lakh tonnes, even at this yardstick the pool should have a buffer stock of about 10.50 lakh tonnes. Considering that the stock of about 13 lakh tonnes with the Pool is during slack season and before the effect of the recent rain-fall and the reduction of price has been felt, it would not appear to be any cause for alarm.
- (5) The requirements of fertilisers to be supplied from the Pool during Rabi 1975-76 as recently assessed in the Zonal Conferences come to about 24 lakh tonnes of materials, which amount to a monthly requirement of about 4.0 lakh tonnes. The total stocks with the Pool at the beginning of this season to the tune of 12.7 lakh tonnes and that too including the pipeline stocks amount only even to 3 months' requirements. It may, therefore, not be correct to treat these stocks as excessive.

APPENDIX VI

(Vide para 2.43 of the Report)

Note—explaining the basis on which Commercial Representatives abroad are selected and trained.

The Chairman of the Public Accounts Committee, during discussions in the meeting held on the 13th August 1975, desired that the Ministry of Commerce should submit a Note to the Public Accounts Committee explaining the basis on which Commercial Representatives in our Missions abroad are selected and the training given to them for efficient discharge of their duties. Pursuant to the directions of the Chairman of the Public Accounts Committee, this matter was considered in consultation with the Ministry of External Affairs.

2. The Indian Foreign Service was created as a specialised service for the conduct of the whole range of India's foreign relations—political, consular and commercial—by a decision of the Cabinet in October 1946, who felt that "The new service of our conception will man all India's posts abroad, whether diplomatic, consular or commercial. Since in the conditions of modern world, economic policy cannot be divorced from other aspects of foreign policy, the new Service will man all the three categories of posts. An officer will naturally be employed as far as possible in the type of post for which he shows most aptitude, but it is contemplated that all members of the service will have experience of diplomatic and consular as well as 'Commercial diplomatic' work and the highest posts in the Service will be open to all."

3. The Indian Foreign Service (Pillai) Committee in 1965 addressed itself to the task of reviewing the structure and organisation of the IFS with particular reference to recruitment, training and service conditions and other matters conducive to the strengthening and efficient functioning of the Service, as the "primary requisite is a strong, dynamic and resilient Foreign Service consisting of an integrated professional cadre of officers well-qualified and trained to handle all political, economic, commercial and information work abroad." According to the Committee "while political relations remain paramount, these are often secured and strengthened by bilateral or regional relationship in the social, economic, cultural, educational, scientific, technological and similar fields of human endeavour."

The diplomatic work of the Foreign Service, therefore, forms the base for all its functional tasks, whether they be political, commercial or publicity.

4. The Committee observed that "we were interested to note that the interdependence of the economic and commercial branch; with the other work of the Foreign Service has been recognised as far back as 1947 when the Foreign Service was being constituted by providing for a single cadre of officers to perform commercial along with other work." The Committee made a number of observations in this regard which have, by and large, been implemented. These recommendations are as follows:—

- (i) The Commercial Representatives abroad should have economic background and commercial experience with a considerable amount of diplomatic expertise and this combination is best achieved by training of Foreign Service Officers at an early stage even for commercial work since political work is no longer clearly distinguishable from commercial work and cannot be dealt with in isolation. Foreign Service Officers must have a grounding for economic affairs and also develop a flair for commercial matters. Economic and Commercial functions should, therefore, be considered as essential and indivisible part of the work of the Foreign Service and also such work could be handled by officers belonging to the single Foreign Service cadre.
- (ii) Heads of Missions should play their full part in Commercial work; relations with Chamber of Commerce must be cultivated as sedulously as contact with, say, a political group. Many Ambassadorial assignments today entail involvement in economic and commercial matters and an officer who has expertise is likely to prove more successful than another whose expertise has been limited to the political purposes.
- (iii) Every officer should be familiar with the basic principles of international economics and commerce and with the technical language of the foreign trade. Officers appointed to commercial posts should be given adequate briefing in the Ministries dealing with commerce and industry and the Department of Economic Affairs. Discussions for them should be arranged with private and semi-official bodies like the Export Councils, Boards and Trade Associations connected with the export trade. Arrangements for supply of information to commercial officers abroad must be better organised. If the specific needs of the Commercial Wing are to be effectively met, particular attention must be paid in the Ministry of External Affairs to the speedy dissemination of such information. The Economic Division of the Ministry of External Affairs should be made responsible for collecting all such material and information from the Com-

merce and other concerned Ministries and transmitting them promptly to Missions abroad through the teleprinter links.

- (iv) Commercial officers abroad should concern themselves more with promotional activities. Their success is determined by the openings they have been able to secure for Indian traders and for this purpose they must be in the market place as often as they are in their own office.

5. Some of the commercial delegations which have been to countries abroad have shown their appreciation of work and assistance rendered by the Embassy/Commercial Representatives abroad. To quote a few instances during the 1971 itself, the Report of the Market Orientation Scheme of handicrafts issued in September 1971 observed that:—

“We received very good support from the Indian Councils and Missions. They provided us with very good contracts.”

The Programme Committee of the IIFT recorded on the 15th September, 1971 that:—

“All the teams have reported that they got invaluable support and assistance from Missions in almost all the countries and were able to establish contacts with firms to whom they would not have gone on their own.”

The Chairman of the S.T.C. on his return from tour of Latin America in 1971 has the following in his report:—

“Our Missions in South America for whom we have nothing but genuine praise, to their great credit showed the impressing and sensitive concern for developing commercial relations.”

6. According to the Cabinet decisions (with the exception of a few posts) all posts in the commercial sections in missions abroad which are under the administrative and budgetary control of the Ministry of Commerce are manned by IFS and IFS(B) personnel. The consensus has been as explained above that in the context of close inter-dependence of political and commercial work, it is better to have commercial representatives drawn from the IFS with a considerable amount of diplomatic expertise rather than officials with limited even though specialised knowledge of commercial and economic work and no knowledge of diplomatic lore. In fact more and more of our Missions including their Heads are now concentrating on economic and commercial work. We have of late received reports of high performance of IFS officers dealing with economic work from Kuwait, Qatar, Geneva, New York, Tehran, Paris and Brussels. Some of the IFS(B) officers have done well in commercial posts. The policy of integrating com-

mercial and diplomatic service is providing more befitting than ever. It has also been recognised that our diplomacy will be able to serve national interests best if economic work comes in the forefront.

7. The Foreign Service Board of the Ministry of External Affairs of which the Commerce Secretary is a Member selects eligible officers for posting to missions abroad. In selecting Commercial Representatives abroad the Ministry of Commerce as also the Ministry of External Affairs take into consideration the economic background and the commercial experience of the officers concerned as also their diplomatic expertise. Only such officers are selected as Commercial Representatives who have established a flare for commercial and economic work. The Ministry of Commerce is very strict about the selection of Commercial Representatives and only those who have got outstanding records are selected for manning these posts. In some cases, Commerce Secretary sponsors names of other than IFS officers on the basis of their experience in the Ministry of Commerce itself and where on the basis of his personal knowledge of the economic and commercial work of the officers concerned, he feels that they would be suitable for the post.

8. All the probationers in the IFS have to spend a few months in the Institute of Foreign Trade which is an adjunct of the Ministry of Commerce. They also undergo attachments with the Ministry of Commerce S.T.C., M.M.T.C. etc. A Bharat Darshan Tour is also arranged for those who are posted abroad for the first time to acquaint them with export industries and those with export potential. This proves useful especially to those who have followed economic courses in the University and who have an aptitude for commercial work. The Trade Missions are supplied various journals to keep them abreast of the economic developments within the country and the changing pattern of our export trade and its direction and the fresh lines of our planning and thinking for promoting exports. They also take advantage of the literature that may be available on the subject of Commerce in the country to which they are accredited. They are required to send periodical reports showing the economic situation in the countries concerned and the export opportunities that they afford.

9. All the Heads of Missions are required to devote their personal time and energy to important commercial work. The role of the Head of Mission is even more important than the role of a Commercial Attache. In major commercial negotiations, the Ambassador's intervention at higher level is always helpful and even necessary. It is also pertinent to quote the observations of the IFS Committee in this connection, "the success of his Missions depends largely on his ability to establish extensive personal contacts, not only with those within the Government but also with other important elements in the country. As part of his functions he has often to enter into negotiations with foreign Governments on matters of political

and economic nature. The primary responsibility for these, lies on the Head of the Mission but to a varying extent the responsibility is shared by all diplomatic officers".

10. The work of the Commercial Representatives abroad is judged by the Ambassador in the country concerned. Again final assessment of his work in this field is made by the Commerce Secretary/Commerce Minister. If any officer has done exceptionally well in an assessment, he is granted a suitable extension also in that post or his expertise and experience are made use of to the extent possible. All the same, the Ministry of Commerce has an open mind in the matter of entertaining suggestions aimed at improving administrative and functional efficiency of our Commercial Representation abroad.

APPENDIX VII

(vide para 2.48 of the Report)

Department of Supply

Statement showing the composition of delegation, countries visited, period of visit and total expenditure incurred on each delegation during the years March, 1971 to January, '72, 1972-73, 1973-74 and 1974-75

S. No.	Composition of delegation	Countries visited	Period	Amount	Remarks
<i>March 1971 to January, 1972</i>					
				Rs.	
I.	1. Shri K. Ram, Secy. Deptt. of Supply.	Japan	8-7-1971 to 22-7-1971	25,750.00	
	2. Shri R. Dayal, Dy. Secy. Deptt. of Supply				
II.	1. Shri K. Ram, Secy. Deptt. of Supply.	Japan	4-11-1971 to 10-11-1971	13,961.00	
		1972-73			
I.	1. Shri K. Ram, Secy. Deptt. of Supply.	Europe U. K.	16-4-1972 to 3-5-1972	33,776.00*	*Excluding the expenditure on Shri Y. Krishan
	2. Shri R. Dayal, Dy. Secy. Deptt. of Supply.				
	3. Shri Y. Krishan, Jt. Secy. Ministry of Finance.				
II.	1. Shri K. Ram, Secy. Deptt. of Supply.	Japan	15-5-1972 to 27-5-1972	23,416.00*	*Excluding the expenditure on Sh. KBL. Chabra
	2. Shri R. Dayal, Dy. Secy. Deptt. of Supply.				
	3. Shri KBL. Chabra, Director, Deptt. of E. A. Ministry of Finance.				

S. No.	Composition of Delegation	Countries visited	Period	Total Expenditure incurred	Remarks
1972 - 73 (Contd)					
				Rs.	
III.	1. Shri K. Ram, Secy. Deptt. of Supply.	Europe, U. K.	27-7-1972	33,075.00	
	2. Shri R. Dayal, Dy. Secy. Deptt. of Supply.	Kuwait.	to 13-8-1972		
IV.	1. Shri K. Ram, Secy. Deptt. of Supply	Japan	4-9-1972	29,770.00*	*Excluding the expenditure on Sh. S. K. Majumdar.
	2. Shri R. Dayal, Dy. Secy. Deptt. of Supply.		to 20-9-1972		
	3. Sh. S. K. Majumdar, Jt. Secy. Ministry of Finance.				
V.	1. Shri K. Ram, Secy. Deptt. of Supply,	Europe, U. K.	24-11-1972	32,401.00*	*Excluding the expenditure on Sh. S. K. Majumdar.
	2. Shri R. Dayal, Dy. Secy. Deptt of Supply.	Kuwait.	to 8-12-1972		
	3. Shri S. K. Majumdar, Jt. Secy. Min. of Finance.				
VI.	1. Shri K. Ram, Secy. Deptt. of Supply.	Japan	28-1-1973	25,320.00*	*Excluding the expenditure on Shri S.K. Majumdar and Sh. S. Krishnaswami.
	2. Sh. R. Dayal, Dy. Secy. Deptt. of Supply.		to 8-2-1973		
	3. Sh S. K. Majumdar., Jt. Secy. Min. of Finance.				
	4. Sh. S. Krishnaswami, Jt. Secy. Min. of Finance.				
VII.	1. Shri K. Ram, Secy. Deptt. of Supply.	U.S.A., U.K.	17-3-1973	34,670.00*	*Excluding the expenditure on Sh. S. Krishnaswami.
	2. Shri R. Dayal, Dy. Secy. Deptt. of Supply.		to 26-3-1973		
	3. Shri S. Krishnaswamy, Jt. Secy Min. of Finance.				

NL o.	Composition of Delegation.	Countries visited	Period	Total Expenditure incurred.	Remarks.
			1973-74	Rs.	
I.	1. Shri P. P. Agarwal, Secy. Deptt. of Supply.	Europe U.K.	7-8-1973	52,907.00*	*Excluding the expenditure on Shri S. Krishnaswami.
	2. Shri R. Dayal, Dy. Secy. Deptt. of Supply.	Canada U.S.A.	to 1-9-1973		
	3. Shri S. Krishnaswami, Jt. Secy. Min. of Finance.	Kuwait			
II.	1. Sh. P. P. Agarwal, Secy. Deptt. of Supply.	Japan	14-9-1973	23,663.00*	*Excluding the expenditure on Shri M. K. Nair.
	2. Sh. R. Dayal, Dy. Secy. Deptt. of Supply.		to 22-9-1973		
	3. Sh. M. K. Nair, F. A. & Joint Secy. Ministry of Finance.				
I.	1. Sh. P. P. Agarwal, Secy. Deptt. of Supply.	1974-75 Kuwait, Italy	14-4-1974	19,316.00*	*Excluding the expenditure on Shri M. K. Nair.
	2. Sh. M. K. Nair, Jt. Secretary, Ministry of Finance.	U. K. Saudi Arbia	to 27-4-1974		
II.	1. Sh. P. P. Agarwal, Secy. Deptt. of Supply	Japan	19-5-1974	15,055.00*	*Excluding the expenditure on Sh. J. S. Baijal.
	2. Sh. J. S. Baijal, Jt. Secretary, Ministry of Finance.		to 24-5-1974		
III.	1. Sh. P. P. Agarwal, Secy. Deptt. of Supply.	Europe, U. K.	16-6-1974	33,176.00*	*Excluding the expenditure on Shri A. K. Sen
	2. Sh. A. K. Sen, Jt. Secy. Ministry of Finance.	U.S.A.	to 5-7-1974		
IV.	1. Sh. P. P. Agarwal, Secy. Deptt. of Supply.	Bahrein, Dharan, Italy, Holland, U.S.A. and U.K.	21-11-1974. 8-12-1974	31,503.00*	*Excluding the expenditure on Shri A. K. Sen
	2. Sh. A. K. Sen, Jt. Secy. Ministry of Finance.				

**EXPENDITURE INCURRED ON BEHALF OF REPRESENTATIVE OF FINANCE
MINISTRY.**

Delegation No.	Composition of Delegation.	Countries visited,	Period	Total expenditure incurred,
1972-73				
I.	Shri Y. Krishan, Joint Secretary	Europe U.K.	16-4-1972 to 3-5-1972	(Rs.) 9,347.62
II.	Shri KBL Chhabra, Director.	Japan	15-5-1972 to 24-5-1972	5,966.00
III.	Shri S.K. Majumdar, Jt. Secretary.	Japan	4-9-1972 to 20-9-1972	8,791.82
IV.	Shri S.K. Majumdar, Jt. Secretary	Europe UK Kuwait	24-11-1972 to 8-12-72	9,960.32
V.	Shri K. Majumdar, Jt. Secretary	Japan.	28-1-1973 to 8-2-1973	7,230.35
	Shri S. Krishnaswami, Jt. Secretary	Do.	Do.	11,734.65
VI.	Shri S. Krishnaswami, Jt. Secretary	USA UK	17-3-1973 to 26-3-1973	6,402.94
1973-74				
I.	Sari S. Krishnaswami, Jt. Secretary	Europe U.K. Canada USA Kuwait	7-8-1973 to 1-9-1973	11,983.72 + Foreign currency £74.76 \$120.70 Canadian dollars 81.10 Kuwait Dinars 3.300
II.	Shri M.K. Nair, Joint Secretary	Japan	14-9-1973 to 22-9-1973	8,690.10
1974-75				
I.	Shri M.K. Nair, Joint Secy.	Kuwait Italy UK Saudi Arabia	14-4-1974 to 27-4-1974	9,946.25
II:	Shri J.S. Baijal Joint Secy.	Japan	19-5-1974 to 24-5-1974	7,948.47
III.	Shri A.K. Sen, Jt. Secy.	Europe U.K. U.S.A.	16-6-1974 to 5-7-1974	16,156.9
				<u>1,14,159.22</u>

Mineral and Metals Trading Corporation

(a) Number of delegations sent:

Between March 1971 and January, 1972	Nil
During 1972-73	2
During 1973-74	2
During 1974-75	Nil

(b) Statement indicating the composition of each delegation along with the expenditure incurred by each of the delegations.

Ans:

Sl. No.	Name	Designation	Countries visited	Total expenditure incurred (in rupees)
1971-72				
No delegation				
1972-73				
1	P. P. Dhir	Director	Romania, Poland & Bulgaria	16,861.31
2	S. K. Agarwal	General Manager	Romania, Poland & Bulgaria	15,923.00
1973-74				
1	P. P. Dhir	Director	East Germany	10,222.21
2	S. K. Agarwal	General Manager	Bulgaria & Poland	12,981.47
				55,987.99
1974-75				
No delegation				

APPENDIX VIII

(Vide para 2.80 of the Report)

*Note on the purchase of 0.60 lakh tonnes of di-ammonium phosphate—
Reasons for delay of about two months in floating the tenders.*

The Department of Agriculture vide their D.O. dated 17-2-70, addressed to the Department of Economic Affairs requested release of foreign exchange for entire imports for 1971-72 indicated therein. The requirements of DAP were indicated as 120,000 MT made up of 60,000 MT for Kharif 1971 and 60,000 MT for Rabi 1971-72. In the endorsement, the Supply Department were asked to initiate procurement action for entire imports. The shipment period for DAP was given as:—

February, 1971	10,000 MT
March, 1971	10,000 MT
April, 1971	20,000 MT
June, 1971	25,000 MT
July, 1971	35,000 MT
August, 1971	20,000 MT
Total :	<u>120,000 MT</u>

On 19-12-70, Department of Agriculture requested the Department of Economic Affairs for allocation of funds for a further quantity of 75,000 MT of DAP, required for M/s Dharamsi Morarjee Chemical Co. Ltd., Bombay. However, on 2-1-1971, Department of Agriculture requested the Department of Economic Affairs for abeyance of action regarding 75,000 MT required by Dharamsi Morarjee. In a D.O. dated 4-1-71 from the Department of Economic Affairs to the Department of Supply, source-wise allocation of foreign exchange was indicated. It was stated that 60,000 MT of DAP was to be procured from Canada and 60,000 MT of DAP to be imported from USA under Canadian Loan & US AID. In the meeting of the FPC on 4-1-71, the Department of Agriculture indicated that the total requirement of 120,000 MT of DAP included 40,000 MT for Trombay Project and 80,000 MT was required for States. The following delivery

schedule was indicated by Department of Agriculture vide D.O. dated 4-1-1971 :—

March 1971	20,000 MT
April 1971	20,000 MT
June, 1971	25,000 MT
July, 1971	35,000 MT
August, 1971	20,000 MT
Total :	<u>120,000 MT</u>

The Department of Economic Affairs stated in the FPC on 4-1-71 that half of 120,000 MT should be purchased from USA and half from Canada. It was decided that a tender should be issued simultaneously both in the USA and Canada for same quantities and delivery periods. On 8-1-71 ISM Washington were asked to consult US AID and Canada about dates of issue/opening of tenders. ISM Washington intimated on 8-1-71 that CIDA confirmed that delivery from March onwards was feasible if tender was issued soon. ISM were told vide cable dated 11-1-71 that we proposed to issue tender on 14-1-71 for opening on 4-2-71, for shipment—March, 10,000 MT; April 10,000 MT; June 12,500 MT; July 17,500 MT; and August 10,000 MT; and they should ask CIDA whether tender may issue accordingly. FPC had decided in the meeting on 4-1-71 that both the tenders against US AID and CIDA should be issued simultaneously. However, there was some hitch in the issue of tender against US AID as indications had been received that supplies from USA may not be possible before June. Therefore, it was proposed on 20-1-71 in consultation with the Ministry of Finance to go ahead with the issue of tender in Canada. The matter was discussed in the FPC meeting on 1-2-71 and it was decided to issue tender in Canada for shipment period 20,000 MT in March/April and 40,000 MT in May/June. ISM, Washington was asked by Cable on 2-2-71 to get CIDA's clearance regarding date of issue; opening of tender and validity of offers. On 4-2-71, ISM Washington was told that CIDA had informed Department of Agriculture that tendering time could be reduced to 15 days if requirements were urgent and that since in this case requirements were most immediate, tendering period should not be more than 15 days. ISM, Washington was expedited for reply on 8-2-71. Reply was received from ISM, Washington on 10-2-71 stating that bulk DAP by March was impracticable and that CIDA however, confirmed availability of 10,000 MT in April; 10,000 MT in May; 20,000 MT or 30,000 MT in June and balance in July and that ABC of delivery could be met only if enquiry was issued on 15-2-71 due for opening on 2-3-71 and awards by 15-3-71. Department of Agriculture was informed on 10-2-71 of the monthwise prospects of availability of DAP as conveyed by ISM and told that we proposed to issue tender for delivery of

10,000 MT by April; 10,000 by May; 30,000 by June and 10,000 MT by July and that tender will issue on 15-2-71, opening 2-3-71 and awards by 15-3-71. On 11-2-71 High Commissioner for Canada, New Delhi, stated that after surveying the trade, CIDA had indicated that the delivery proposed by ISM for 20,000 MT in March and 40,000 MT in May/June was not possible but if deliveries were extended from April to July, there would be a response to DAP tender and they proposed delivery period 10,000 MT in April; 10,000 in May; 20,000 June and 20,000 July or 10,000 MT each in April and May and 30,000 MT in June and 10,000 MT in July. They also mentioned about the change in specification with regard to particle size from 90 per cent to 88 per cent and stated that while this would ease the ability to manufacture, it will not improve the availability picture. On 12-2-71 ISM, Washington, were informed by cable that tender for 60,000 MT DAP was being issued on 15-2-71, opening on 2-3-71 and awards 15th March and shipment April 10,000; May 10,000; June 30,000; and July 10,000 MT. Tender was accordingly issued on 15-2-71 inviting offers by 2-3-71. Department of Agriculture confirmed on 17-2-71 that the tender notice issued for DAP from Canada was in order. The tender was opened on 2-3-71.

Procurement action could be initiated by Supply Department only after allocation of funds, which was made on 4-1-71 by the Department of Economic Affairs. Some delay also occurred because the Canadian Government had to be consulted about the timing of the issue of tenders. At all stages, the Department of Agriculture were kept informed of developments.

APPENDIX IX

(Vide para 2.156 of the Report)

Copy of D.O. letter dated 4 November, 1975 from Dy. Secretary, Department of Agriculture to the Director, Department of Supply.

Kindly refer to your D.O. No. PII-8(3)/74 dated the 9th October, 1975 in connection with para 56 of the PAC query referred to therein.

In this Department's letter No. 1—9/71-MPR dated 24th March, 1972, it was proposed to use the Canadian Credit of 10 million dollars for the purchase of 75,000 MTs of NPKs. It was further proposed to purchase 47,000 MTs of NPKs out of the foreign exchange of 25 million dollars. A tender for the purchase of *inter alia* NPK 15-15-15 under Canadian Development Loan was floated on the 28th March, 1972. Since the suppliers were only from Canada, the offers of suppliers who quoted the lowest price for NPK 15-15-15—a price higher than the price which could have been obtained in a global tender—had to be accepted. Among these was I.C.E.C. to whose offer a reference has been made in the Audit paragraph.

A tender for purchase of NPK 15-15-15 out of free foreign exchange was floated on 5th April, 1972. One of the offers which was accepted was that of M/s. Interore. Since this was a global tender, naturally we could get a lower price than what was possible under the Canadian Development Loan tender.

During the course of evidence of PAC, it was stated by the representative of the Department of Agriculture that initially purchase against credit had to be made because the amount of free foreign exchange available was not adequate to meet full import requirements. It was further stated that, to the extent of availability of free foreign exchange, it was made use of for the import of fertilisers. This point was made specially in the context of the acceptance of offers for fertiliser at a higher price quoted under loan as against offering for purchase against free foreign exchange.

It was never the intention of this Department to suggest before the PAC that, as soon as any free foreign exchange was available, this Department had intimated that entire credit purchase should stop. I hope this clarifies the position.

APPENDIX X

(Vide para 2.172 of the Report)

STATEMENT ON PURCHASE OF DI-AMMONIUM PHOSPHATE IN AUGUST-SEPTEMBER, 1972.

Sl. No.	Name of Supplier	Country	Rates initially quoted		Rates accepted after negotiations		Date on which orders were placed	Shipment schedule		Actual Deliveries effected		Remarks		
			Rate		Quantity M/T	Rate		Quantity M/T	Period	Qty. M/T	Date		Quantity M/T	
			FOB \$	Estt. C&F \$		FOB \$								Estt. C&F \$
1	M/s. Woodward & Dickerson (Canada) Canada, Ltd.	Canada	92.00	103.50	6,000 +10%	92.00	103.50	6,600	19-9-72	Dec. 72	6,600	7-12-72 27-12-72	2099.350 4500.000	
2	Do.	Do.	92.00	103.50	12,000	92.00	103.50	12,000	19-9-72	Dec. 72	12,000	29-12-72	11818.91	
3	M/s. Mitsubishi International Corpn., USA	Korea	95.25	103.50	12,500	95.25	103.50	12,500	19-9-72	Feb. 73	12,500	10-3-73	12500.00	
4	M/s. Woodward & Dickerson International, USA	U.S.A.	95.25	107.25	5,000	95.25	107.25	5,000 +5% =5,250	19-9-72	Dec. 72	5,250	9-1-73	5228.069	

1	2	3	4		5		6		7		8		9
5	M/s. Kaiser Trading Co., U.S.A.	Canada	95'00	108'00	13,500	93'75	106'75	13,500	19-9-72	Feb. 73	13,500	8-4-73	13492'48
6	M/s. Continental Fert. Co., N. York	U.S.A.	97'25	109'25	10,000	93'45	105'45	10,000	19-9-72	Feb./ March 73	10,000	11 14-4-73	10000'75
7	M/s. I.C.E.C., New York	U.S.A.	98'74	110'74	6,500	98'74	110'74	6,500	19-9-72	Dec. 72	6,500	23-12-72 6-2-73	5002'18z 1500'408
8	M/s. H.J. Baker & Bros., U.S.A.	Canada	105'00 Dec. 72 shipment ALTERNATI- VELY	116'50 shipment +25% S.O.	15,000 +25% S.O.	100'00	111'50 +25% S.O.	15,000 +25% S.O.	19-9-72	Dec. 72	15,000 +25% S.O.	Laydays 10-12-72 to 29-12-72	11,500
			108'00 Feb. 73 ship- ment.	119'50								26-6-73	4,208'97
9	M/s. Interore, New York	U.S.A.	98'00	110'00	*20,000	98'00	110'00	20,000	19-9-72	Oct. 72 Nov. 72 Jan./ Feb. 73 March/ April 73	5,000 5,000 5,000 5,000	9/17-11-72 17/23-12-72 20-1-73	7245'486 10336'544 17528'849
			98'00	110'00	*17,000	98'00	110'00	17,000	19-9-72	Sept.- Nov. 72 Jan-- Mar, 73	7,000 10,000	28/31-10-72 30-11-72	4999'998 5245'030
			99'00	111'00	*10,000	99'00	111'00	10,000	19-9-72	Sept. 72 through Jan. 73	10,000	30-4-73	2906'468
											47,000		

1	2	3	4	5	6	7	8	9					
10	M/s. Mitsui & Co. Ins. New York	U. S.A.	..	105.50 *6,000 C&FFO ±10% West Coast, India 106.00 C&FFO	..	105.50 C&FFO W.C.I. 106.00 C&FFO	6,000 ±10%	22-9-72	Sept./ Early Oct. 72	6,000	5-10-72	6487.22	
				East Coast, India		E.C.I.							
11	M/s. Mitsui & Co. Ltd., Japan	Japan	105.00	113.90	5,000	..	106.61 C&FFO E.C.I.	5,000	24-11-72	Jan/ Feb 73 Extend- ed upto 30-4-73	5,000	30-4-73	5,000.00
12	M/s. I.C.E.C., New York	U.S.A. Revised	99.74 98.24	111.74 110.24	15,000 15,000	98.24	110.24	15,000	19-9-72	Dec.72 Chang- ed to Feb.73	15,000	2-2-73	15,068.554
13	M/s. Woodward & Dickerson Inc., U.S.A.	U.S.A.	101.00	113.00	5,000 +10%	99.50	111.50	5,000 +10% =5,500	19-9-72	Nov./ Dec.72	5,000	9-1-73	5498.344
14	M/s. Agricochemical Co., U.S.A.	U.S.A. Revised	103.50 99.50	115.50 111.50	10,000 45,000	99.50	111.50	45,000	22-9-72	Nov./ Dec.72 Jan.73 Feb.73	15,000 15,000 15,000 45,000	17-11-72 6-12-72 14-1-73 25-1-73	7,471.790 8,173.132 4,223.524 2,447.291
												10-2-73 26-2-73 12-3-73 16-4-73	4,507.896 5,005.305 10,507.792 3,328.086

26

1	2	3	4	5	6	7	8	9					
15	M/s. Continental Fert. Co., New York . . .	U.S.A.	102'04	114'04	15,000	94'75	106'75	5,000	19-9-72	Nov.72	5,000	2/6-12-72	5,022'38
			Revised	94'75	106'75	5,000							
16	M/s. Interore, New York . . .	U.S.A.	<i>From U.S. Gulf</i>			103'00	110'25	10,000	19-9-72	Oct/ Nov. 72	10,000	16/12/72	10,500
			98'25	110'25	*10,000	<i>from Chinhae or or from Chinhae or Ulsan, S. Korea</i>			/				
			103'00	110'25									
17	M/s. I. C. E. C., New York . . .	U.S.A.	99'45	111'45	*15,000	99'45	111'45	15,000	22-9-72	Sept. 26 & Oct. 6, 72	15,000	3-10-72 6-12-72	13529'530 2094'409
18	Do.	Do.	99'45	111'45	*5,000	99'45	111'45	5,000	22-9-72	Jan. 73	5,000	6/10-2-73	5001'587
19	Do.	Do.	99'45	111'45	*5,000	99'45	111'45	5,000	22-9-72	Dec.72/ Jan. 73	5,000	6-2-73	4,999'455
20	M/s. Woodward & Dickerson, New York	Do.	99'50	111'50	*10,000	99'50	111'50	10,000	22-9-72	Nov. 72	10,000	27/30-11-72	10052'922
21	M/s. Phibro Asia Ltd. New York . . .	U. S. A.	98'00	110'00	*20,000	98'00	111'00	20,000	22-9-72	Oct./ Nov. 72 Jan. 73	10,000 10,000	28-10-72 21/25-1-73	10339'460 10200'00

*These offers were not received initially in response to the tender enquiry dated 17-7-72, but were submitted after negotiations were held between the Secretary (Supply) and various suppliers.

APPENDIX XI

(Vide para 2.173 of the Report)

STATEMENT ON PURCHASE OF DI-AMMONIUM PHOSPHATE IN MARCH, 1973.

Sl. No.	Name of Supplier	Country	Rates initially quoted			Rates accepted after negotiations			Dates on which orders were placed	Shipment schedule		Actual Deliveries effected		Remarks
			RATE		qty. MT	Rate		qty. MT		Period	qty. MT	Date	quantity MT	
			FOB \$	Estt. C&F \$		FOB \$	Estt. C&F \$							
			1	2	3	4	5	6		7	8	9		
1	M/s. Phibro	Asia,												**
	N.Y.	USA (a)	102.00	120.50	15-20,000	101.75	120.25	20,000	10-4-73 (a)	Aug. 73	20,000	4,10-73	11801.058	
										<i>Amended as:</i>				
										Dec. 73				
										Jan. 74/	11,000			
										Jan. 74/				
										Feb. 74	9,000	15-1-74	5973.919	
		(b)	104.00	122.50	12-15,000	103.75	122.25	15,000	(b)	Aug./		11-1-74	4840.978	
										Sep. 74	15,000			
								35,000		<i>Amended as:</i>				
										Aug./				
										Sep. 73	11,500			
										Jan./				
										Feb. 74	3,500			

**A quantity of 12384 M/T was subsequently cancelled and covered under contract No. F. P. 55/3612, dated 24-6-1975

1	2	3	4	5	6	7	8	9					
2	M/s. Woodward & Dickerson, U.S.A.	USA	109.75	128.25	30,000	104.50	123.00	23,000	10-4-73	Ist half			
										May, 73	10,000	20-5-73	10000.036
										June, 73	13,000	30-7-73	14710.092
										<i>Amended as :</i>			
										June/July, 73 :			
										Aug. 73	5,000	16-8-73	4009.752
										S pt. 73	20,000	17-9-73	11637.485
											25,000	23-9-73	4859.498
												18-10-73	3575.433
3	M/s. Agrico Co. USA	USA	106.00	124.50	10,000	104.00	122.50	20,000	10-4-73	Aug. 73	10,000	9-9-73	12840.733
										S pt. 73	10,000	22-10-73	8410.917
											20,000		
4	M/s. Agricultural & Industrial Chemi- cals Ltd, N.Y.	USA	107.45	125.95	17,500	104.50	123.00	35,000	10-4-74	May/ Jun, 73	5,000	6-5-73	5002.926
			109.23	127.73	17,500					Jun./ July, 73	12,500	25-6-73	12746.050
										July/ Aug 73	12,500	29-6-73	1179.348
										Aug. 73	5,000	16-8-73	11223.003
											35,000	23-9-73	6955.502

1	2	3	4	5	6	7	8	9				
5	M/s. USS Agri Chemicals, USA . USA	106.00	124.50	30,000	104.50	123.00	30,000	10-4-73	April to Sept. 73 (Seller's option)	30,000	25-6-73 19-6-73 5-8-73 10-9-73	6095.490 3443.255 11133.538 10219.108
6	M/s. Continental Ore Corpn., USA . USA	105.40 104.75 118.00	123.90 123.25 126.00	10,000 30,000 5,000	103.50	122.00	40,000	10-4-73	Aug. 73 } Sep. 73 } Oct. 73 } ***extended up to ***extended upto	**10,000 10,000 20,000	11-6-73 25-9-73 12-12-73 to Oct., 73 upto Nov., 73	12179.296 11576.317 11327.06
					103.75	122.25	15,000		May, 73 May, 73	10,000 5,000	8-2-74 6-9-73	17192.656 2540.143
7	M/s. Transammonia International Ltd., New York . USA	105.80	124.30	20,000	104.50	123.00	20,000	10-4-73	June/ July 73 Aug. 73	10,000 10,000	3-8-73 16-8-73	12091.082 18443.797
		105.95	124.45	10,000	104.45	122.95	10,000		July/ Aug. 73	10,000	6-9-73	10191.188
		106.45	124.95	10,000	104.50	123.00	10,000		July, 73	10,000		

APPENDIX XII

(Vide para 2.174 of the Report)

Copies of extracts from the minutes of the meetings of the Fertiliser Purchase Committee held on 17-8-1972 and 29-8-72.

Extracts from the Minutes of the meeting of the Fertiliser Purchase Committee held on 17th August, 1972

* * *

7. The Committee then took up for consideration the global tenders invited for the purchase of Ammonium Phosphate and Di-Ammonium Phosphate and for urea. It was pointed out by Shri Shenoj that the offer for Ammonium Phosphate was considerably higher than the offers received for DAP on the basis of cost per nutrient. It was, therefore, decided that while no A. P. should be purchased a quantity of 100,000 tonnes of DAP might be purchased. The lowest offers for DAP were from the following three firms which were accepted:—

Name	Quantity	FOB/C&F
1. M/s Shaw Wallace/Sherritt Gordon-Canada	6,000 + 10%	92.00/103.50
2. M/s Shaw Wallace/Cominco, Canada	12,000	92.00/103.50
3. Mitsubishi/Korea	10,000 + 25%	96.25/103.50

These offers would make up a quantity of 31,100 MT. For the balance quantity it was decided that in addition to the above three suppliers, all the other suppliers may be called for negotiations and an effort made to persuade them to reduce the prices to the extent possible.

* * *

Extracts from the Minutes of the meeting of the Fertiliser Purchase Committee held on 29th August, 1972

* * *

3. . . . Miss, George stated that the present decision was not to purchase any quantity of ammonium sulphate but the matter was being re-examined and if any change in the policy was visualised, the delegation would be apprised of the position. She also stated that the Department of Agriculture had a requirement of 3 lakh tonnes of DAP. She further mentioned that in the case of NPK, the question had been raised whether NPK as such should be procured or only the basic raw material should be imported and the NPK should be formulated in India. . . .

* * *
* * *

6. *DAP Tender*: Secretary mentioned that the local representatives of the various firms who had quoted for DAP had been called and negotiations had been conducted. While some of them had offered interim reductions, most of them had stated that the final position would be intimated within the next day or two. He enquired as to what quantity should be purchased on the basis of these negotiations. Miss George stated that earlier she had indicated that a quantity of 1 Lakh tonnes should be purchased but if further additional quantities could be purchased she would be happy and, if necessary, the deliveries could be extended beyond February, 1973 which had been indicated in the tender. The FPC approved of a certain ceiling upto which purchases might be effected.

* * *

Copy of the notes, dated 1-9-72 and 2-9-72

As decided vide notes at page 8-9/n contracts have already issued for a quantity of 31,100 MT at a c&f price of \$ 103.50. The Fertiliser Purchase Committee in its meeting on 17-8-1972 also decided that all the firms who had quoted against the tender may be asked to come for negotiations and that efforts should be made to persuade them to reduce the offers further. Negotiations were conducted with all the firms on 28-8-1972. The result of these negotiations were discussed in the meeting of the FPC on 29-8-1972 and the Committee decided that offers received up to \$111.50 c&f may be accepted. The representative of the Department of Agriculture had also agreed that they would have no objection to the purchase of more quantities than 1 lakh tonnes which they had decided to purchase earlier. The representative of the Department of Agriculture also confirmed that although in the tender they had asked for deliveries upto February 1973, but they would have no objection if deliveries are extended further by two to three months. Offers have now been

received and the offers which come within the ceiling of \$ 111.50 are as follows:—

Name of the agent/manufacturer	Indian Country of origin	Quantity	Period of Delivery	Price		
				FOC	C&F	
				\$	\$	
1	2	3	4	5	6	
1. Shaw Wallace & Co. Baker Export Corp.	USA	5,000	Dec., 72	95.25	107.25	
2. British Metal Corp./ Belladonna Fert. Corp.	Canada	13,500	Feb., 73	93.75	106.75	
3. International Trd. National Phosphates	USA	10,000	Feb. March '73 (Seller's opt.)	93.45	105.45	
4. MDPC/JR Simplot	USA	6,500	Dec. to Feb. (Buyer's opt.)	98.74	110.74	
5. Socotra/North West Nitro Chem.	Canada	15,000 +25%	Dec., 72	100.00	111.50	
6. Mitsui/Nissan & Tatsan	Japan	5,000 3,000*	Jan. to Feb. 73	..	106.61 [Firm's C&F (EC-1)]	
7. Interore Occidental.	USA	5,000	Oct. 72	98	110	
		5,000	Nov. 72			
		5,000	Jan.-Feb. 73	} at seller's option		
		5,000	March/April			
		20,000				
8. Mitusi/National Phosphates	USA	6,000	Sept./early Oct.	..	105.50 WCI 106.00 ECI	

Offers at Serial Nos. 7 and 8 above are new offers, while the others are the revised reduced rates.

Including the quantity of 31,100 which has already been accepted in all a total quantity of 1,15,100 MT is now being purchased. Some of the firms have told us that they are still awaiting for final reply from their principals. As soon as the replies are received within the validity period of the tender and these are below our ceilings we will accept the same.

Sd/-(R. Dayal)
1-9-72

O.E. 1-9-1972
Sd/- S. K. Majumdar, 1-9-72
Sd/-(K. Ram) 1-9-72

Sd/- (S. S. Puri)
1-9-72

*Originally offer was for 5,000; addl. 3,000 offered subject to their option which they will let us know by 15th October, 72.

S. Nos. 58, 59

The contracts as approved above have issued. In addition we have received an offer for the supply of 15,000 tonnes from MDPC at a c&f price of \$ 110.24. This offer had been made earlier, but had expired and now the suppliers have confirmed the same c&f price.

We have received another offer from M/s. Interore for supply of 17,000 MT at \$ 98 equivalent to \$ 110 c&f. This was the same rate which we accepted from them earlier vide their offer at Sr. No. 7 at pre-page. Contracts have to issue today.

In the above note it has already been agreed that offers which may be received within the ceiling of \$ 111.50 c&f may also be accepted provided these are received by the 8th of September, 1972. It is felt that since it has been accepted in principle to accept the offers upto \$ 111.50, JS(P) may be authorised to conclude contracts in the absence of the Fertiliser Delegation and for this file need not be put up in Finance again.

O.E. 2-9-1972.

Sd/-(R. Dayal)
2-9-1972.

Sd/- (S. S. Puri)
2-9-1972.

Sd/- (K. Ram)
2-9-1972.

Concurred in, except that any additional offer from Japan higher than \$106.61 per tonne should be considered by the delegation in Japan.

Sd/- (S. K. Majumdar)
2-9-1972.

Ministry of Supply.

APPENDIX XIII

(Vide para 2.228 of the Report)

Note on the expression 'Force Majeure' in the Contracts

The Audit paragraph deals with the conditions of contracts issued by ISM, Washington. As regards purchases through ISM, Washington, the following provisions have been made in the conditions of contract ISM, 826.Rev/70:—

Delayed Deliveries: Subject to the operation of 'Force Majeure' time is of the essence. Claims for extensions of time on account of 'Force Majeure' shall be granted subject only to the prompt notification to India Supply Mission of the particulars thereof, and the furnishing to India Supply Mission if required, of reasonable supporting evidence. Any waiver of time in respect of partial instalments shall not be deemed to be a waiver of time in respect of remaining deliveries.

"Provided that where supplies are made within 21 days of the contracted original delivery period, ISM's Freight Forwarders, or the inspecting Agency where so specified, may accept the stores for shipment/inspection unless it is stipulated in the relevant contract that such grace period shall not be applicable to the contract."

Ordinarily above clause was included in all contracts financed out of free resources. With regard to contracts out of US AID Funds, US AID insisted on inclusion of following clause which formed part of such contracts:—

"A. Time is of the essence of this agreement, provided, however, that neither party shall be liable to the other nor shall this agreement be deemed breached, except as provided in this paragraph, for delays or interruption in performing its obligations hereunder proximately resulting from the following events: War, whether declared or undeclared, Civil disturbances, including but not limited to riots or insurrections; severe accidents and severe destructions, including but not limited to fires, strikes/explosions; or any other cause beyond the reasonable control of the party concerned.

B. The party whose performance may be impaired by the occurrence of any of the events referred to above (hereinafter referred to as 'The

Affected Party') shall promptly notify the other of that fact indicating the steps required to minimise the impairment and its probable effect on the delivery date or the schedule of delivery dates.

C. If the probable effect of the said impairment is to delay performance of this agreement for a period in excess of sixty (60) days, the affected party shall furnish to the other party weekly reports, together with any reports of other significant events which may affect the situation, unless this agreement is terminated by said other party pursuant to this paragraph (D) below.

D. If the probable effect of said impairment is to delay performance of this agreement for a period in excess of ninety (90) days, either party may elect to terminate this agreement. Such election shall be exercised by a party depositing written notice thereof in the United States mail, registered and postage prepaid, to the other party."

Ministry of Law has perused the 'Force Majeure' clause incorporated in the contracts entered into with the American firms by ISM, Washington. The opinion of the Ministry of Law is as under:—

"Force majeure is normally defined to mean any event which takes place on account of act of God or as a result of natural forces. But in number of cases the courts have given a wider meaning, namely, it will also take within its fold any circumstances which are beyond the control of the Parties and which could not be foreseen. In this context it may also be useful to refer to the following observations of the Supreme Court in the case of *M/s. D. Govind Ram v. M/s. Shanji K and Co.* (1961) A.I.R.S.C. 1285 (.....that where reference is made to force majeure, the intention is to save the performing party from the consequences of anything over which he has no control. This is the widest meaning that can be given to force majeure clause).

In view of the fact that force majeure can be given also a wider meaning. It would be neither feasible nor desirable to define force majeure exhaustively in any context for the reason that the contracting firm may take this opportunity to include in the said definition as many events as possible which in their opinion would constitute to be beyond their control. In order to save such a situation the balance of convenience would lie more in favour of not defining the force majeure exhaustively but only to include such events as the firm in their quotation may ask for inclusion.

In this context it may be mentioned that in so far as contracts placed with the American firm are concerned, there may not be enough time to consult the Law Ministry in at Delhi. Moreover, we would like to add that in the ISM contract No. 826 vide clause 10 there is a provision to

the effect that claim for extension of time on account of force majeure shall be granted subject only to the prompt notification to India Supply Mission and on reasonable supporting evidence. On account of this stipulation we had also stated that the firm while raising a plea of force majeure were also required to adduce reasonable supporting evidence to satisfy the India Supply Mission that the factual force majeure condition did exist."

It would thus be seen that the existence of force majeure circumstances have to be decided on the facts and circumstances of each case, in consultation with LA to ISM, Washington and Ministry of Law, New Delhi if enough time is available to determine whether the suppliers can validly take shelter under force majeure.

It may however be noted here what the Department of Supply is no longer concerned with the purchase policy of Missions abroad as the administrative control of ISM, London and ISM, Washington has since been transferred to the Ministry of External Affairs with effect from 1st April, 1975. The work relating to import of fertilisers from Western Countries and from Japan has also been taken over by MMTC with effect from 1st August, 1975.

APPENDIX XIV

(Vide para 4.16 of the Report)

Note on the machinery that is available to ensure the timely and equitable distribution of fertilisers to the farmers and the checks exercised by the Central Government in this regard.

1. The Ministry of Agriculture holds six-monthly Zonal Conferences at the commencement of each crop season which have been roughly divided as Period I (Kharif)—February-July and Period II (Rabi)—August-January to assess fertiliser requirements for the ensuing season. While assessing the overall gross requirements of each State, the computation is made on the basis of the agricultural production programme of the State during the season under consideration taking into account the area to be cultivated under different crops and the average dosage per hectare achieved in the past and after allowing a percentage increase in the dosage itself. The increase in dosage allowed in different States is different and in this context the need for the developing States to increase their level of fertiliser consumption is kept in view by allowing them a somewhat higher increase in dosage.

2. After assessing the gross requirements, the opening stock with the State as estimated by it to be available with them at the commencement of the crop season is deducted to arrive at the net requirement of the State. The supplies to be made by the manufacturers to different States are decided in keeping with a rational distribution plan in which various factors like the logistics of railway operations and the economic marketing zones of the factories etc., are kept in view. Thereafter the percentage of availability of fertiliser in the country from domestic and imported sources to the total net approved requirements of all the States etc., is worked out. Keeping in view this level of availability, the overall share of each State (from the Central Fertiliser Pool and manufacturers), is determined by and large proportionately. The deficit registered for supply by Pool is determined by deducting from the overall share of each State, the supplies to be made by the manufacturers in that State as decided in the Zonal Conference. After this the supplies of all non potassic imported fertilisers are made by FCI/CWC/SWC to the State Government agencies as per Despatch Instructions received from them. Potassic fertiliser is distributed by India Potash Ltd. in keeping with the quantities decided in the Zonal Conferences. The State Governments have the authority

to legally enforce the supplies by manufacturers which are notified under the E.C.A. They have also the discretion under an arrangement with the industry to indicate to the manufacturers the districts/areas in which the supplies of different fertiliser may be made by the distributors of different manufacturers.

3. In case the actual arrivals of imported fertiliser from abroad are less than the allotments from the Central Fertiliser Pool, instructions to Food Corporation of India are to make supplies proportionately to different States. The system of supplies being proportionate to residual quantities as mentioned above, implies a built in system for correction of imbalances. The position is, however reviewed from time to time, at least monthly, and action taken to make specially enhanced supplies to the States concerned in order to quickly reduce any major imbalances. In doing so, the position is seen mainly in the context of Pool supplies but the overall relative position in different States of Pool and Non-Pool supplies is also kept in view.

4. Internal arrangements for the distribution of Pool fertilisers within a State is the concern of the State Governments. However, in view of the fact that fertiliser distribution through public institutionalised agencies, particularly the cooperatives, which can render a package of facilities including credit, is expected to ensure better distribution of fertilisers within the States, one of the conditions of Pool supplies to the State Governments (this does not apply to Commodity Boards) is that they can reallocate Pool fertilisers only to public institutionalised channels except for (a) Private granulation units for mixing purposes; and (b) seeding programme material (which may be distributed by the manufacturers having the seeding programme, partly through public institutionalised channels and partly through private trade like their domestic production). It will thus be seen that virtually distribution of Pool fertilisers is only permitted through public institutionalised channels, like the Co-operatives etc.

5. In the case of plantations controlled by Commodity Boards, allotment is made by the Ministry in favour of the Government Commodity Boards set up for Tea, Coffee, Cardamom and Rubber. The Boards themselves appoint distributors to the plantations subject to such policy directions as may be given to them by Government from time to time.

6. So far as distribution of indigenously produced fertilisers is concerned, the Fertiliser Corporation of India has been advised to distribute at least 50 per cent of the fertilisers through Public institutionalised channels like the Cooperatives etc. Other manufacturers have also been advised to distribute the largest possible quantities of their products through cooperative societies. It is estimated that roughly 50—60 per cent of the

indigenous production is also distributed through public institutionalised channels like Cooperatives.

7. It will thus be observed that the entire Pool fertiliser (which is roughly 50 per cent of the total availability) and about 60 per cent of the domestic production is distributed through public institutionalised channels (like the Cooperatives) over which the State Governments have full control. Even for the balance the districts/areas where different fertiliser from the domestic manufacturers is to be supplied by the distributors of the manufacturers can be decided by the State Governments (as mentioned in para 2 above) although the actual marketing may be through private distributors of the manufacturers. The entire fertiliser distribution within the State in the context of areas and priorities is thus under the control of the State Governments who have the responsibility for agriculture production in their State.

8. The position of fertiliser supplies to each State is watched regularly every month from the Ministry both in respect of Pool and domestic fertiliser and corrective action taken. The offtake in each State is also watched by the Ministry every month and factors affecting it adversely are taken up for remedial action.

9. Recently a number of measures have been taken to ensure availability of fertiliser adequately and in time to the State Government agencies and cultivators:—

- (1) Sizeable buffer stocks of Pool fertiliser have been built up in order to guard against shortages and also to be able to negotiate prices in world market from a position of strength.
- (2) Efforts have been made to step up domestic production.
- (3) The Pool buffer stocks have been located near consumption centres (and not only near the ports) so that supply can be made to the cultivators quickly when required.
- (4) Prices of fertiliser have been reduced w.e.f. 18-7-75 to make it easier for the cultivator to purchase fertiliser.
- (5) Movement of imported and domestic fertiliser has been rationalised and is done on an "advance programming" basis from time to time, which enables Railways to give priority to movement without affecting their operations or the movement of other essential commodities.

APPENDIX XV

(Vide Para 4.24 and 4.28 of the Report)

**STATEMENT SHOWING SAVINGS ACTUALLY ACHIEVED AND LIKELY TO BE ACHIEVED AS A
RESULT OF RE-NEGOTIATIONS BY THE FERTILISER DELEGATION**

S. No	Supplier	Material	Original quantity and price		Unshipped quantity (In Mts)	Revised price (In \$)	Savings (In million \$)
			Quantity (In Mts.)	Price (In \$)			
1	2	3	4	5	6	7	8
1	Complexfert	ANP 20:20 NPK 15:15:15 & ANP 24:24	1,70,000	254.03	1,28,500	(30,000) of ANP 20:20 free of cost	7.62
2	Gardinier	ANP 24:24	70,000	305.00	51,620	250.00	2.84
3	Seabright, U.K.	NPK 15-15-15	40,000	210.00	20,250	165.00	0.91
4	Chemie Linz	Do.	30,000	209.00	14,250	165.00	0.63
5	Simcona Austria	ANP 20-20	15,000	245.00	3,398	220.00	0.08
6	Anic, Italy	(1) Urea	35,000	338.00	8,540	265.00	0.62
		(2) A/S	50,000	138.00	11,250	105.00	0.37
7	W.R. Grace	DAP	24,500	378.00	10,000	248.00	1.30

1	2	3	4	5	6	7	8
8	IMCC	DAP	50,000	378.00	33,500	245.70	4.43
9	ICEC	"	15,000	376.00	15,000	250.00	1.89
10	A & I	"	(1) 25,000	378.00	5,000	} 249.00	2.54
			(2) 15,000	375.00	15,000		
11	Fibro Asia	"	40,000	378.00	19,995	230.00	2.96
12	Agrico	"	(1) 30,000	365.00	30,000	} 225.00	13.50
			(2) 70,000	357.86	70,000		
13	Inter Ore	"	(1) 11,000	378.00	11,000	} 235.00	5.77
			(2) 30,000	375.00	30,000		
14	Transammonia	"	46,500	378.00	35,500	235.00	5.08
15	Collier Carbon	Urea	50,000	225.00	50,000	200.00	1.25
16	Safco	"	20,000	243.00	20,000	215.00	0.56
17	Anic Italy	"	20,000	243.00	20,000	215.00	0.56
18	Nitrex (Holland)	"	50,000	224.00	50,000	198.00	1.30
19	Kuwait	"	60,000	256.37	60,000	207.00	2.96
20	Japan	"	(1) 1,60,000	203.00	1,60,000	205.90	14.62
			(2) 90,000	225.56	90,000	191.30	8.22

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2434 LS-25.

	2	3	4	5	6	7	8
21	Poland	Urea	(1) 1,80,000	334.00	1,68,562	242.00	18.88
		CAN	(2) 50,000	170.00	6,000	116.00	0.32
22	USSR	(1) Urea	2,00,000	413.61	85,000	247.02	14.16
		(2) Amm. Sul.	67,000	209.37	25,600	Rs. 1600/ FOB	2.00 *Agreed to accept 11,000 MTs urea in lieu of 25,000 MTs Amm. Sul.
23	Romania	(1) CAN	75,000	2095	29,000	Rs. C&F 928.00	2.39
		(2) Urea	25,000	3450	5,000	Rs. FOB 1900.00	0.64
24	Romania	(1) CAN	75,000	2095	30,000*	750.00	11.98 Agreed to accept only 30,000 M.T.
		(2) Urea	25,000	3450	50,000@	1500.00 @ (-)	0.16 @ Agreed to accept 50,000 M.Ts.

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\$ 130.22 Million.

Say Rs. 105.53 Crores.

APPENDIX XVI

(Vide para 4.30 of the Report)

Note on the computation and the mechanics of projection of the figures reflected in the Budget Estimates reflecting to the Fertiliser subsidy.

The financial position of the Central Fertiliser Pool is reviewed from time to time and the pool prices are regulated in order to ensure the running of the fertiliser pool on no loss no profit basis. As the C&F cost of the imported fertiliser and the ocean freight charges and other incidentals were found to be on the increase, it was observed during the periodical financial review in the beginning of 1974 that the pool was incurring a huge loss. This necessitated an upward revision of the issue prices of the imported fertilisers w.e.f. 1-6-74. The prices of three main fertilisers Urea, Ammonium Sulphate and Calcium Ammonium Nitrate are statutorily controlled under the fertiliser control order 1957 which is applicable to the indigenously manufactured fertilisers as well. It was noticed that the fair delivery prices of the indigenously manufactured Urea, Ammonium Sulphate and Calcium Ammonium Nitrate (including distribution margin) as worked out by the Ministry of Petroleum & Chemicals were lower than the controlled prices of imported Urea, Ammonium Sulphate and Calcium Ammonium Nitrate, thus giving an unintended profit to the domestic manufacturer of these fertilisers. On the other hand, even with the increase in the control prices of imported fertilisers, the Central Fertiliser Pool was expected to incur a deficit of approximately Rs. 164.54 crores. It was, therefore, decided that the unintended profit, accruing to the domestic manufacturers of the three statutorily controlled fertilisers should be mopped up and the manufacturers asked to deposit the difference between the controlled prices and the fair delivery prices of these three fertilisers in favour of the Government. This is being done through the voluntary agreement of the domestic manufacturers. This differential amount was termed as "Fertiliser Pool Equalisation Charge" and the quantum of this charge was fixed w.e.f. 1-6-74:—

Name of Fertiliser	Statutory retail price Rs. Per MT.	Fair Delivery prices for indigenous manu- facturers indicating margin in Rs. per M.T.	Fertiliser Pool Equi- sation charge in Rs per M.T.
Urea	2000	1390	610
A.S	935	740	195
C.A.N..	1095	800	295

2. The detailed instructions for remittance of the Fertiliser Pool Equalisation Charge to the Government of India are indicated in this Ministry's Circular letter No. 1-15/74-FA.(G) dated the 3rd August, 1974 issued in consultation with the Ministry of Petroleum & Chemicals (Copy annexed).

3. As regards the mechanics of projection of the figures reflected in the Budget Estimates, it may be mentioned that after assessing the total requirements of the fertilisers of the country and taking into account indigenous production, the import plan for the year is drawn up for the import of fertilisers. Accordingly Ministry of Finance allocates the foreign Exchange for this purpose for making payment of C&F Value to Foreign suppliers for the quantities to be imported.

4. On this C&F value, other incidentals such as Departmental charges to the agencies who arrange the imports, Customs duty, which includes basic duty Auxiliary duty and Countervailing duty etc. and other incidental expenditure on handling charges to be incurred in India are added. The other incidental handling charges include payments of remuneration to I.P.L. for handling Potassic consignments, payments to the Food Corporation of India for handling non-potassic fertilisers, inland railway freight, cost of gunnies, Road-movement charges, charges on account of godowns and compensation as a reduction in pool Prices to State Governments and Cooperatives etc. In this way the total expenditure on imports during a particular year is arrived at. Similarly the recoveries which are likely to be effected from these imports are worked out. A credit facilities of 60 days is allowed to the consignees. Thus the issues which are likely to be made during the months of February and March are excluded for the purpose of computing the recoveries would be effected during that particular year as the actual recoveries for these quantities would be effected during the next financial year. Similarly there are imports for which C&F value is paid at time of shipment for they are still on the high seas by the close of the financial year. Thus the recoveries of these quantities are also excluded for the purpose of recoveries during the year. Thus for arriving at the recoveries during a particular year, the value for the quantities that are likely to be shipped by 31st January are taken into account. The difference between the expenditure and the recoveries is the net expenditure for the year *i.e.* the deficit in cash balance of the Central Budget.

5. The figure of Rs. 170 crores mentioned in this item is not appearing in any Budget Estimates either for the year 1975-76 or 1976-77. This figure of Rs. 170 crores was assessed as a result of review of the financial

position of the Pool in July, 1975, in the context of the following decisions taken with effect from the 18th July, 1975:—

- (a) That the pool issue prices of the fertilisers, should be reduced;
- (b) That the distribution margin to the distributing agencies should be increased;
- (c) That the fair Delivery price for indigenous manufacturers of urea, Ammonium Sulphate and C.A.N. should be increased.

ANNEXURE

Copy of the letter of the Department of Agriculture dated 3 August, 1974 issued to all fertiliser manufacturers and State Government regarding collection and remittance of 'Fertiliser Pool Equalisation Charge' on Urea, Ammonium Sulphate and Calcium Ammonium Nitrate.

I am directed to say that in response to letter No. 3 (3) 74-Fert. IV dated 31-5-74 from Secretary to the Government of India, Ministry of Petroleum and Chemicals, you have undertaken to collect and credit to the Government of India, a Fertiliser Pool Equalisation Charge equal to the price differential between the statutorily fixed maximum retail prices and the delivery prices of Urea, Ammonium Sulphate and Calcium Ammonium Nitrate. The Fertiliser Pool Equalisation Charge for these three fertilisers are with effect from 1-6-1974, as under:

Fertiliser	Retail price per M.T. (Rs.)	Delivery price of indigenous manufacturers per MT (Rs.)	Fertiliser Pool equalisation charge per M.T. (Rs.)
Urea Ammonium . . .	2000	1390	610
Sulphate Calcium . . .	995	740	195
Ammonium Nitrate . . .	1095	800	295

2. Detailed instructions for remittance of the 'Fertiliser Pool Equalisation Charge' to the Government of India are indicated below in consultation with the Ministry of Petroleum & Chemicals and Ministry of Finance.

- (i) The Fertiliser Pool Equalisation Charge should be credited to the Govt. of India once in a month on or before the last working day of the month.

Note—In respect of the quantity cleared from the factory in June, 1974 as also the quantities removed to your godown/depots outside the factory before 1-6-74 but sold on or after 1-6-74 the remittance may, however, be made not later than 9-3-74.

- (ii) The amount of Fertiliser Pool Equalisation Charge to be credited to the Govt. of India in any month shall be the charge calculated on the quantities of fertilisers of the three varieties referred to in para 1 above at the rates indicated in para 1

above, cleared from the factory during the next preceding month. The quantity cleared in any month shall be the quantity shown in the Form RT-12 prescribed in Central Excise Rules and accepted as correct by the Excise Authorities.

- (iii) The manufacturers will be liable to penal interest at the rate fixed by the Govt. of India on delayed remittances, if any.
- (iv) The Fertiliser Pool Equalisation Charge calculated in the manner indicated above shall be deposited in the nearest Government Treasury by means of Treasury Challan. The name of the Accounts Officer by whom the credits are to be adjusted shall be indicated as "The Deputy Chief Pay and Accounts Officer, Ministry of Agriculture, New Delhi." The full particulars of remittance shall be indicated as Fertiliser Pool Equalisation Charge on Urea, Ammonium Sulphate or Calcium Ammonium Nitrate as the case may be. The head of Account should be indicated as "505—Capital Outlay on Agriculture—Manure and Fertilisers—Deduct Receipts and Recoveries on Capital Account—other Receipts."
- (v) The Central Excise Officer incharge, competent to assess the Excise Duty leviable on the fertilisers cleared from the factory will send to the Deputy Chief Pay & Accounts Officer, Food and Agriculture, Akbar Road, New Delhi and to the Director (Accounts) Fertiliser Division, Ministry of Agriculture IVth Floor, Super Bazar Building, Connaught Circus, New Delhi, a copy each of Form RT-12 immediately after signing the assessment memorandum thereto, in respect of fertilisers cleared upto the last day of the previous month. The manufacturer may for this purpose ensure that additional copies of Forms RT-12 duly filled in are submitted to the excise authorities.
- (vi) Immediately after depositing the amount in the Treasury, the manufacturers will forward under Registered Posts AD to the Deputy Chief Pay and Accounts Officer (F&A), Akbar Road, New Delhi, the following documents under a covering letter:—
 - (a) A copy of FORM RT-12 showing the quantities of fertilisers cleared.
 - (b) The original copy of the Treasury Challan.
- (vii) A copy of the letter addressed to the Deputy Chief Pay and Accounts Officer (F&D), Delhi will also sent under Registered Post to the Director (Accounts) Fertiliser Division,

Ministry of Agriculture, IV-th Floor, Super Bazar, Connaught Circus, New Delhi, enclosing a copy of the form RT-12 and a copy of Treasury Challan.

3. The above procedure is subject to a review by the end of February, 1975.

4. This issues with the approval of Ministry of Finance *vide* their U.O. No. 4293/AF.II/ dated 31-7-74.

Yours faithfully,

Sd/- T. BALARAMAN,
Deputy Secretary (jert.),

APPENDIX XVII

(*Vide* para 4.31 of the Report)

Note on the measures taken by Government to bring down the prices of fertilisers and to prevent hoarding and blackmarketing.

The cultivator's prices of fertilisers had to be revised upwards rather steeply with effect from 1st June, 1974 as a result of abnormally high prices in the international market, increased Ocean freight and increased cost of production of the indigenously produced fertilisers, which again was due to overall increase in prices of raw materials, operating cost, etc. As a result of the unusual situation prevailing in the World market and because of hike in prices, the Central Fertilizer Pool, which distributes all the imported fertilisers, was incurring very heavy losses. Though the Pool is supposed to be run on 'No-profit-no-loss' basis, Government had been resisting all attempts to increase the farm-gate prices and was thus indirectly subsidising the sale of imported fertilisers. However, with the import bill mounting very high, had the prices not been increased with effect from 1st June, 1974 the Pool would have incurred a loss to the extent of over Rs. 400 crores, an eventuality which would have been seriously detrimental to the notional economy at that stage. At that very time, the fertiliser industry had been vociferously demanding that prices of controlled varieties fertilizers be increased as they were incurring very heavy loss because of mounting operational and other costs. The hike in the prices of Nephtha and petroleum products as a result of Oil crisis had already worsened the situation. There was, therefore, no other alternative left for the Government but to increase the prices. However, it may be pointed out that even with the price increases effected, the Pool continued to incur loss although it was less than what it would otherwise have been.

Some time after the increase in fertilizer prices referred to in the preceding paragraph, when the availability of fertilizers in the country became easier, it was noticed that the off-take of fertilisers was going down and that there was a possibility of this affecting the agricultural production efforts. Thereupon, the Government of India reduced the prices in July, 1975, which was also found more easily possible because of all in international prices. Simultaneously, the distribution margins for the distributing agencies were increased without corresponding increase in the prices of fertilisers so that the difficulties being experienced by the distribution

channels including Cooperative could be ameliorated without affecting the cultivators' prices. Though the reduction in prices improved the consumption of nitrogen nutrients, it did not have the desired impact on the consumption of phosphatic and potassic fertilisers. The Government had again reduced the prices of phosphatic, potassic and complex fertilisers with effect from 1st December, 1975. With effect from 16th March, 1976, Government introduced a scheme of subsidy at the rate of Rs. 1250 per tonne of P_2O_5 , on phosphatic fertilisers, which was meant to be passed on by the domestic manufacturers concerned to the farmers by way of reduction in prices. The prices of fertilisers were also reduced again with effect from 20th April, 1976 and again on 8th February, 1977.

Besides reducing the prices of fertilisers, Government extended a number of fiscal concessions and effected reduction in the cost of raw materials used by the domestic industry, in order to bring down the cost of production of indigenous fertilisers. These measures included reduction in the import duty on phosphoric acid from 45 per cent to 15 per cent, abolition of countervailing duty on Muriate of Potash, reduction in excise duty on single superphosphate from 15 per cent to $7\frac{1}{2}$ per cent, subsidy on phosphatic fertilisers mentioned above, announcement of additional reduction of 25 per cent in excise duty on fertilisers for production over and above the base production and reduction in the prices of indigenous and imported rock-phosphate and imported sulphur.

A statement indicating retail prices of some of the major imported fertilisers as they existed on 1st June, 1974 and the reductions effected thereafter, is enclosed.

As it was felt that inadequacy of credit was a major factor affecting the off-take of fertiliser, every endeavour was made to remove this bottleneck, in all the three fields of manufacturers credit, distribution credit and production credit.

In the Budget for the year 1975-76 originally an allocation of Rs. 68 crores had been made for the grant of short-term loans to the State Governments for the purpose of stocking seeds, fertilisers and insecticides and for the purpose of granting loans to the farmers for the purchase of these inputs over and above the normal provision for grant of such loans in the State Budgets. This provision was increased to Rs. 95 crores. During 1967-77 the provision made for short-term loans was Rs. 110 crores. The Reserve Bank of India also relaxed certain conditions for advancement of cooperative loans like relaxing the conditions for loans to non-wilful defaulters etc.

The credit limits were raised taking into account the increase in fertiliser prices.

Simultaneously, the prices of the domestically produced urea, ammonium sulphate and calcium ammonium nitrate which are statutorily controlled, were reduced to the same level as the retail prices of these fertilisers sold from the Central Fertiliser Pool, the loss being made good through a corresponding reduction in the contribution which the manufacturers were to make in the form of Fertiliser Pool Equalisation Charge to the Central Fertiliser Pool. The domestic manufacturers were persuaded successfully to reduce the prices of other fertilisers which are not statutorily controlled.

As stated earlier in this Note, the increase in the domestic prices of fertilisers in India was mainly due to increase in International prices. For instance, the f.o.b. price of one tonne of urea which was around \$ 62 in 1972 rose to about \$ 370 in 1974 and of D.A.P. increased from \$ 98 in 1972 to \$ 380 in 1974. Efforts were therefore made to seek the assistance of world bodies connected with fertiliser and agricultural production efforts as well as through bi-lateral negotiations to bring down the prices. Even for those quantities for which firm contracts had already been entered into at higher prices, re-negotiations were conducted with the concerned Governments/authorities and these effort were quite successful. As a result of such renegotiations, we were able to get a benefit of Rs. 105.53 crores. With the assistance of some of the developing importing countries, India, time and again, raised the question of need for both emergent and long-term steps being taken at the International level to check the violent fluctuations in the prices of fertilisers in the international market. The F.A.O. has set up a special Commission called the International Fertiliser Commission which is at present considering all the aspects of fertiliser availability, supply and prices etc., in the World Market. These efforts were made by India with a view to achieving some sort of stability in the World market which in turn would help India to stabilise the prices at a reasonably low level in the country.

However, mere reduction of prices is not an end in itself. What is required and what is being attempted through Government fertiliser policy is to ensure sufficient and regular availability of fertilisers and to avoid the situation of serious shortages which developed in 1973-74. Long-term contracts have been/are being entered into with the Suppliers, Pool fertilisers are being taken as near to the likely consumption centres as the logistics permit and a buffer stock is being maintained. In respect of domestic fertilisers, they have also been requested to take the fertilisers to the likely consumption centres where the fertilisers can be stored in the godowns. With a view to popularising the use of fertilisers more and more as well as in a balanced manner, efforts initiated in the Fourth Plan are continuing. At present every endeavour is being made to reach the fertilisers to every nook and corner of the country. At present there are over lakh retail points in the country.

It will thus be seen that the Government policies are directed towards making fertiliser available to the farmers in adequate quantities and at reasonable prices. In fact the situation created by the shortages and extraordinarily high prices in 1973-74 was tackled in an integrated manner.

As regards the steps taken to prevent hoarding of fertilisers by black-marketeers and profiteers, sufficient powers have already been delegated to the State Governments under the Essential Commodities Act and the Fertiliser Control Order. It is being impressed upon the State Governments from time to time that States should exercise these powers effectively so as to prevent the prevalent mal-practices in the distribution of fertilisers. The Fertiliser Control Order has been declared as a Special Order under the Essential Commodities Act enabling the State Governments to try the offenders under the Fertiliser Control Order in a Summary way thereby making their prosecution and conviction quicker and easier. The State Governments are already vigilant about the malpractices and those indulging in these malpractices. A month to month monitoring of the performance of the fertiliser quality control laboratories in analysing fertiliser samples for detecting sub-standard material is made and the State and Union Territories which do not have these facilities are being asked periodically to send samples to the Central Fertiliser Control Laboratory. Under the Fertiliser Movement Control Order, unauthorised inter-State movement of fertilisers is prohibited. The Central Government is also keeping a vigil over the possibility unscrupulous persons indulging in malpractices through periodical reports from the State Governments. Moreover the question of hoarding and black-marketing in fertiliser arises only in a situation of shortage and efforts being made to keep a buffer stock and prevent shortages are likely to go a long way in preventing these malpractices.

The following Table indicates the retail prices of some of the major imported fertilisers as they existed on 1-6-74 and the reductions effected on 18-7-75, 1-12-75, 16-3-1976, 20-4-1976 and 8-2-1977.

Name of Fertiliser	Retail price w.e.f. 1-6-74.	Reductions effected on					Total reduc- tions effected (Col. 3+ 4+5+ 6+7)	
		18-7-75	1-12-75	16-3-76	20-4-76	8-2-77		
	1	2	3	4	5	6	7	8
Urea	2000	150	..	100	..	100	350	
Muriate of Potash	1220	50	85	185	..	105	425	
Di-Ammonium Phosphate (18-46-0)	3005	200	205	..	300	..	705	
Ammonium Nitro-Phosphate (24-24-0)	3080	..	430	335	25	225	1025	
(20-20-0)	1855	75	120	..	..	70	265
N.P.K. (15-15-15)	1700	..	55	..	75	50	180	
N.P.K. (17-17-17)	2590	..	165	300	155	160	780	

APPENDIX XVIII

(Vide para 5.3 of the Report)

Details of the Plants in Operation and their installed capacity

PLANTS IN OPERATION

A-NITROGENOUS FERTILISERS

Name of the factory	Installed capacity in terms of ni- trogen (tonnes)
PUBLIC SECTOR:	
1. Sindri	90,000
2. Nangal	80,000
3. Rourkela	1,20,000
4. FACT (Alwaye)	82,000
5. Trombay	81,000
6. Neyveli	70,000
7. Gorakhpur	80,000
8. Namrup	45,000
9. Madras	1,64,000
10. Durgapur	1,52,000
11. Cochin	1,52,000
12. By-product from public sector coke/coke oven plants	12,000
	11,28,000
<i>Co-operative Sector :</i>	
13. IFFCO (Kalol)	2,15,000
<i>Private Sector :</i>	
14. Gujarat	2,16,000
15. Ennore	16,000
16. Vizag	80,000
17. Kota	1,52,000
18. Varanasi	10,000
19. Kanpur	2,00,000
20. Goa	1,71,000
21. By-product from private sector coke/coke oven plants	8,000
	8,53,000
Total installed capacity	21,06,000

B—PHOSPHATIC FERTILIZERS

Name of the factory	Installed capacity in terms of P ₂ O ₅ (tonnes)
<i>Public Sector :</i>	
1. Single Superphosphate	44,500
2. F.A.C.T. (Alwaye)	36,500
3. F.C.I. (Trombay)	36,000
4. Madras	85,000
	2,02,000
<i>Co-operative Sector :</i>	
5. IFFCO (Kalol/Kandla)	1,27,000
<i>Private Sector :</i>	
6. Single Superphosphate	1,71,500
7. Ennore	10,300
8. GSFC (Baroda)	50,000
9. Vizag	73,000
10. Goa	42,000
11. DMCC (Triple Super-phosphate) Ambernath	11,200
	3,58,000
Total installed capacity	6,87,000

PROJECTS UNDER IMPLEMENTATION

Public Sector	Capacity in '000 of tonnes of nutrient	
<i>I. Projects in advanced stages of completion.</i>		
	N	P ₂ O ₅
1. Barauni	152	—
2. Namrup II	152	—
3. Khetri . . . . .	..	90
<i>Private Sector:</i>		
4. Viza	3	31
5. Tuticorin	258	51
		(Commissioned in June and presently under trial production)
	<u>565</u>	<u>172</u>
<i>II. Other projects under implementation</i>		
<i>Public Sector :</i>		
1. Trombay (debottle-necking)	18	18
2. Talcher	228	..
3. Ramagundam	228	..
4. Haldia	152	75
5. Gorakhpur (Expansion)	51	..
6. Cochin II	40	114
7. Korba	228	..
8. Sindri Rationalisation . . . . .	..	156
9. Nangal Expansion	152	..
10. Sindri Modernisation	129	..
11. M.F.L. . . . .	..	20
12. Bhatinda	235	..
13. Trombay IV	75	75
14. Panipat	235	..
<i>Co-operative Sector :</i>		
15. Phulpur	220	..
<i>Private Sector :</i>		
16. Mangalore	160	..
	<u>2159</u>	<u>458</u>

Public Sector	Capacity in '000 of tonnes of nutrient	
<i>III. Projects approved/approved in principle for implementation</i>		
1. Mathura	235	..
2. Paradeep	345	300
3. Trombay V	130	..
<i>Private Sector :</i>		
4. Kota (Expansion)	345	..
5. Kakinada	228	82
<i>Co-operative Sector : Joint Sector.</i>		
6. Maharashtra Co-operative Fertilizers & Chemicals Ltd.	51	..
7. GSFC (Expansion)	243	..
8. Karnataka State Industrial & Invest- ment Corporation . . . . .	..	83
	1577	465
Total capacity of plants in operation and projects under implementation/ approved/approved in principle for implementation	6497	1782

APPENDIX XIX

(Vide para 5.10 of the Report)

STATEMENT REGARDING UTILIZATION OF CAPACITY DURING, THE PERIOD 1970-71 to 1974-75 OF INDIVIDUAL FERTILIZER PLANTS IN THE COUNTRY

The requisite information is furnished in the statement below :—

Name of the unit	Present installed capacity	Production ('000 tonnes of nitrogen)				
		Production (capacity utilization) during				
		1970-71	1971-72	1972-73	1973-74	1974-75
1	2	3	4	5	6	7
I. Old plants and those with build-in constraints.						
1. Sindri	90	75(83.3)	63(70.0)	56(62.2)	59(65.6)	53(58.9)
2. Udyogamandal	82	33(40.2)	40(48.8)	31(37.8)	39(47.6)	38(46.3)
3. Rourkela	120	24(20.0)	47(39.2)	49(40.8)	46(38.3)	61(50.8)
4. Neyveli	70	32(45.7)	20(28.6)	21(30.0)	15(21.4)	17(24.3)
5. Varanasi	10	6(60.0)	5(50.0)	5(50.0)	6(60.0)	5(50.0)
6. Ennore	16	9(56.2)	11(68.7)	12(75.0)	11(68.7)	10(62.5)
	388	179(46.1)	186(47.9)	174(44.9)	176(45.3)	184(47.4)

	2	3	4	5	6	7
II. Stabilised plants						
7. Nangal	80	54(67.5)	56(70.0)	53(66.3)	62(77.5)	40(50.0)
8. Trombay	81	54(66.7)	61(75.3)	63(77.8)	58(71.6)	60(74.1)
9. Gorakhpur	80	68(85.0)	76(95.0)	69(86.3)	64(80.0)	73(91.3)
10. Namrup	45	28(62.2)	30(66.7)	35(77.8)	36(80.0)	40(88.9)
11. Madras	164	..	(X)	105(64.0)	124(75.6)	83(50.6)
12. Baroda CGSFC)	216	149(69.0)	183(85.6)	203(94.00)	163(75.5)	160(74.1)
13. Vizag	80(y)	61(76.2)	65(81.2)	59(73.8)	54(67.5)	47(58.8)
14. Kota	152	113(102.7)	190(8.2)	127(115.6)	110(100.0)	86(56.6)
15. Kanpur	200	107(53.5)	128(64.0)	156(78.0)	115(57.5)	192(96.0)
16. Goa	171	..	..	..	(X)	135(78.9)
	1269	634(71.1)	709(79.5)	870(8.24)	786(74.4)	916(72.2)
III. New Plants						
Madras	164	..	42(25.6)	..	..	..
Goa	171	..	..	..	64(37.4)	..
Durgapur	152	..	..	..	6(3.9)	15(9.9)
Cochin	152	..	..	..	14(9.2)	40(26.3)
	(z) 304	..	42(25.6)	..	84(17.7)	55(18.1)

(x) Madras unit went into production only in the later half of 1971-72, and the unit at Goa in the later half of 73-74.

(y) Installed capacity at Kota during 1970-71 to 1973-74 was 110,000 tonnes ; 42,00 tonnes was added in 1974-75 raising the total capacity to 152,000 tonnes.

(z) Capacity of Madras and Goa units not included as they figure in Category II during the year 1972-73 onwards and in 1974-75 respectively. Madras unit went into production in 1971-72 and for that year it has been treated as a new unit (in Category III); similarly Goa has been shown as a new unit in 1973-74 when it went into production.

It would be seen from the above statement that the aggregate utilisation of capacity as between the three broad categories of plants is as follows:

Category I : Old plants and those with built in constraints	45 to 48%
Category II : Stabilised plants	71 to 82%
Category III : New plants	17 to 86%

The constraints limiting production in category I plants are briefly given below:—

Sindri: This is one of the oldest units with certain sections operating for nearly 20 years and the equipments are worn out and have already outlived their normal life.

FACT. Udyogamandal : Certain sections of the plants have been operating over a long period of time with equipments which have outlived their normal lives. Besides, the unit is also faced with limitations arising out of maintenance of multiple units and equipment, and limitation in the production facilities arising out of inter-dependence of a large number of units.

Rourkela : The basic problem faced by the unit is inadequate availability of coke oven gas which is one of its feedstocks. Even after commissioning the naphtha gasification unit, the supply of coke oven gas to cover the balance requirement has been much below the anticipated level.

Neyveli:

- (i) Defective design and equipment, multiplicity of streams and obsolescence of technology in certain sections of the plant.
- (ii) Quality of lignite is poor and differ from the original design specifications.
- (iii) Problems in the sulphur removal and carbondioxide recovery sections.
- (iv) Dust in the raw gas entering the compressors.

Figures of unitwise production in Category II would show that utilisation of capacity in some of the stabilised plants also has been below 70 per cent in some years. Reasons therefor are given below unitwise:—

Nangal : The unit operated at less than 70 per cent of its rated capacity during the years 1970-71, 1972-73 and 1974-75 solely because of power cuts. Production loss on this account during these three years was 26,000 tonnes, 26018 tonnes and 39800 tonnes of nitrogen respectively. Even during the years 1971-72 and 1973-74, the unit lost 23,200 and 21000 tonnes of nitrogen respectively on account of power out. This unit is capable of operating near its rated capacity, given its full quota of power which is its feedstock; this is very well demonstrated by the fact that during the first

six-months viz., April-September of the year 1975-76, the unit has produced 34,400 tonnes of Nitrogen which represents a capacity utilisation of 87.3 per cent.

Trombay : Frequent mechanical breakdowns have been largely responsible for low capacity utilisation.

Namrup : The unit went into commercial production in 1968-69. Production during the earlier years of its operation was low due to problems on catalyst, limitations of ammonia feedpump and ammonia refrigeration condensers, process problems. Since 1972-73, however, the unit is operating well as will be seen from statement.

Madras : The unit went into production in October, 1971 and was in the process of stabilisation during 72-73. During the year 1974-75, the unit operated only at 50.6 per cent capacity because the plant had a serious accident in June, 1974 when it had to remain shut down for about three weeks. The plant was again shutdown due to leaks in the reformer tubes and was commissioned only by the middle of November, 1974.

Baroda : The unit operated at 69 per cent of its rated capacity during 1970-71 due to power and mechanical problems; the loss due to power cuts/interruptions was 7000 tonnes of nitrogen during that year.

Vizag : Production was comparatively low during 1973-74 and 1974-75 due to factors like equipment failures and power cuts.

Kanpur : Capacity utilisation during the years 1970-71, 1971-72 and 1973-74 has been low because of various reasons. The unit commenced commercial production in 1969-70 and was in the process of stabilisation in 1970-71; during 1970-71, some production was lost also on account of power cuts (2200 tonnes of nitrogen)

During the year 1971-72, the unit incurred production loss to the extent of 24,499 tonnes of nitrogen due to labour trouble.

Again in 1973-74, the unit incurred heavy production losses on two accounts—labour trouble: 22,800 tonnes of nitrogen and power cut: 51,000 tonnes of nitrogen.

APPENDIX XX

(Vide para 5.10 of the Report)

Statement regarding utilisation of capacity of individual fertilisers plants during 1975-76 and 1976-77.

Production and capacity in
(‘000 tonnes of Nitrogen)

Plants	Annual Installed capacity		Production		% Capacity utilisation	
	1975-76	1976-77	1975-76	1976-77	1975-76	1976-77
	1	2	3	4	5	6
<i>Category I (old plants and those with tilt in constraint)</i>						
1. Sindri . . .	90 (75)	90	46 (14)	25 (10)	66.7	46.7
2. Udyogamandal . . .	82	82	45 (1)	43 (1)	56.1	53.66
3. Rourkela . . .	120	120	77 (2)	80 (4)	65.8	70.0
4. Neyveli . . .	70	70	27	43	38.6	61.4
5. Varanasi . . .	10	10	5	5	50.0	50.0
6. Ennore . . .	16	16	11	8	68.8	50.0
7. Durgapur] . . .	152	152	37	46	24.3	30.3
8. Cochin I . . .	152	152	67	80	44.1	52.6
Total (I) . . .	692	692	315 (17)	330 (15)	47.9	49.8
<i>Category II (Stabilised Plants)</i>						
1. Nangal . . .	80	80	77 (1)	80 (1)	97.5	101.2
2. Trombay . . .	81(1)	81	69 (10)	95 (7)	97.5	126.0
3. Gorakhpur . . .	131 (93)	131	67	95	72.0	72.5
4. Namrup . . .	45	45 (2)	45 (1)	46 (1)	102.2	104.4
5. Madras . . .	164	176 (166)	145	130	88.4	78.3
6. Baroda . . .	216	216	158	173	73.1	80.0
7. Vizag . . .	80	83 (81)	48	64	60.0	80.0

	1	2	3	4	5	6
8. Kota	152	152	110	120	72.4	79.0
9. Kanpur	200	200	178	188	89.0	94.0
10. Goa	171	171	113	123	66.1	72.0
11. By-products	24	24	20	24	83.3	100.0
12. IFFCO]	215	215	115 (2)	158 (1)	54.4	74.0
Total	1559	1574	1145	1296	15.2	83.6
(II)]	((1521))	((1562))	(14)	(10)		
<i>Category III (New plants in the process of stabilisation).</i>						
1. Turicorin (3) July (75)	258 (172)	258	75	149	43.6	57.8
2. Mangalore (April 76) . . . . .	..	160((160))	..	51	..	31.9
3. Namrup Ex. (May 76) . . . . .	..	152((140))	..	49	..	35.0
4. Barauni (Oct. 76) . . . . .	..	152((76))	..	25	..	32.9
Total (III)	258((172))	722((634))	75	274	43.6	43.2
Grand Total	2509 ((2370))	2988 ((2888))				
Attainable (4) total	2239	2653	1535 (31)	1900 (25)	70.0	72.5
() Industrial Nitrogen						
(()) Available capacity during the year.						

Note:

(1) Expansion scheme of Gorakhpur unit for additional 51,000 tonnes of nitrogen per annum was implemented w.e.f. January, 76 bringing the installed capacity of the plant to 131000 tonnes from 80000 tonnes. The total available capacity during the year was $\frac{31+5}{12} \times 3 = 92.75$ say 93,000.

(2) Expansion scheme of MFL for additional 12000 tonnes of nitrogen was implemented w.e.f. February 77 and was available for two months. This increased the installed capacity of the plant to 176000 tonnes and available capacity for 76-77 to 166000 tonnes.

(3) SPIC plant, though it commenced production from July, 76, remained completely shut down during December 76 for major modifications. Thus, the available capacity during the year was only $\frac{258 \times 11}{12} = 172$ thousand tonnes.

(4) Total attainable capacity of the industry has been worked out on the following basis.

- (a) The capacity of new plants and expansion schemes are taken for the available period only on the proportionate basis.
- (b) In case of Sindri unit the capacity has been taken as 75,000 tonnes w.e.f. April 76 as FCI have made a proposal to seek Government approval to derating of capacity to that level.
- (c) The available capacity of new plants is taken at the rate of 50 per cent during the 1st year of operation as the installed capacity of the plant is included in the total capacity from the date of start up of the plant, and not from the date of commencement of commercial production which is generally six months from the date of start up of the plant.

On the above basis, the attainable capacity of the Industry as a whole is worked for each year.

APPENDIX XXI

(Vide para 5.19 of the Report)

NOTE INDICATING THE EXTENT TO WHICH INDIGENISATION HAS BEEN ACHIEVED IN RESPECT OF EQUIPMENT REQUIRED FOR FERTILISER PLANTS

The extent of indigenisation in equipments depends on various factors such as type of plants, mode of financing and procurement procedure, selection of process licensors and extent of orders in hand of the equipment manufacturing firm, delivery schedule etc. It has been seen that some of the equipments, though within the capability of indigenous manufacturers, have to be imported due to stipulations made by process licensors or design engineering firm in respect of guarantees, time schedule etc. Similarly many equipments which can be indigenously manufactured, have to be imported due to long delivery schedule and high price because of over-booking the capacity of limited indigenous manufacturers. If the above constraints do not limit the extent of indigenisation, it is within the capability of indigenous manufacturers to supply most of the equipments needed for fertilizer projects with the help of indigenous design and engineering except a few proprietary items. Even in World Bank financed projects where G.C.B. procedure has been adopted for equipment procurement, some of the major items which were hitherto imported such as compressors, tall towers etc. have been supplied by indigenous firms. If the equipments available indigenously were to be purchased in India irrespective of their cost and delivery schedules, the extent of indigenisation in respect of equipment for main plants which can be achieved is given in Table 1 below:

TABLE-1

Present Status of extent of Indigenisation

Plant	Capacity	Imported component as Percentage of Total equipment cost
1	2	3
(1) Ammonia plant (Naphtha based)	600 T/D	37%
(2) Ammonia plant (Natural gas based)	600 T/D.	36%
(3) Ammonia plant (I.S.H.S. based)	600 T/D.	38%

1	2	3
(4) Ammonia plant (Coal based): . . .	900 T/D.	23%
(5) Urea Plant	1000 T/D. (Two streams)	40%
(6) Urea Plant	1500 T/D. (Two streams)	42%
(7) Sulphuric Acid Plant (Sulphur based) .	210 T/D.	34%
(8) Do.	600 T/D.	34%
(9) Do.	880 T/D. (Two streams)	22%
(10) Phosphoric Acid (Nissan process) .	100 T/D.	25%
(11) Do.	200 T/D.	25%
(12) Do.	360 T/D.	30%
(13) Nitric Acid Plant	450 T/D.	59%
(14) T.S.P. Plant	1200 T/D. (Three streams)	10%
(15) N.P.K. Plant	1600 T/D. (Single stream)	32%
(16) Ammonium sulphate plant	600 T/D.	27%

N.B.: The extent of foreign component for NG and naphtha based ammonia plants will decrease further due to indigenous availability of reformers which have come to market recently.

2. The details of the equipments being imported and which were till recently imported but are now manufactured indigenously are given below:

A. Item still to be imported

1. *Waste heat boilers.*—Except the waste heat boiler for small nitric acid plant, sulphuric acid and Methanol plants which have been designed by FCI and manufactured by BHPV, bulk of waste heat boilers have to be imported.

2. Coolers, Condensers and Evaporators

Equipments	Reasons for imports
(a) Wound type heat exchanger	No knowhow and manufacturing facilities available,
(b) Plate type heat exchanger	Do
(c) 1st stage partial condenser and total condenser stripper or Falling film evaporators for urea Plants (Technimont process)	Proprietary items
(d) Carbate heat exchanger and Sulphuric acid dilutions mixing and cooling unit.	No knowhow and manufacturing facilities, specialised items.
(e) Cold exchanger and high pressure reformer gas cooler	No knowhow and manufacturing facilities. Cost of raw materials and component would be nearly 60%.

3. Reactor and High Pressure Vessels

Equipments	Reasons for imports
(a) Converter internals and waste heat boiler	Proprietary items.
(b) Ammonia separators with tangential nozzles.	Design facilities are available but no manufacturing facilities.
(c) Shell gasifier with gun	Proprietary items.
(d) LP & HP Rectification column in Rectisol Section (Refrigeration)	No design know-how available.

4. Centrifugal compressors and drive Turbines

These are available from BHEL indigenously.

5. Reciprocating Compressors

Mainly consists of oxygen compressor which is of specialised design and is not covered under BPCL's scope.

6. Pumps

A substantial percentage of pumps for fertilizer plant in Vth five year plan period are still to be imported. The major category of the pumps that would continue to be imported are:

- (a) BFW pumps for High pressure service.
- (b) Glandless BFW Circulation pumps.
- (c) HP Naphtha feed pumps
- (d) Vetrocoke/Benfield solution pumps with recovery turbines
- (e) Urea Melt pumps
- (f) 95 per cent solution pumps
- (g) NH₃ and Carbamate pumps
- (h) Vertical pumps of HV-9 material for phosphoric and sulphuric acid service.
- (i) Inline pumps.

7. Electrostatic Precipitators

At present BHEL Trichy is manufacturing electrostatic precipitators for steam generation plants. Besides Voltas and AVB have been issued letter of intent for manufacture of electrostatic precipitators. In regard to the specific requirement for Fertilizer plants, there has been no suitable technical offer from any party in India.

8. *Miscellaneous*

This consists of large variety of items which may possibly continue to be imported for some time.

Some of these items are given hereunder :—

- | | |
|---|----------------------------------|
| (1) Coal feeders, coal dust screws and burners for gasifier | Proprietary items. |
| (2) Disintegrator gas washer | Design facilities not available. |
| (3) Ejectors for vacuum sections in urea plant | -Do- |
| (4) Scrubber for NPK plant | -Do- |

9. *Valves and Fittings for high pressure duty*

Except BHEL who have good design organisation there is hardly any design and development section in any of the valve manufacturing shops.

10. *Fittings and Forgings*

There is acute shortage of forgings required for pressure vessel and heat exchangers and their prices are exorbitant. One of the major factors or delays in manufacture of pressure vessels and heat exchangers for Durgapur and Barauni was due to the scarcity of the forgings.

B. Some of the equipment which were till recently imported and now indigenously available are as follows:

- (1) All types of compressors for various plants except oxygen compressor for high pressure service.
- (2) Air separation and nitrogen wash plants.
- (3) Reactor shells (High pressure).
- (4) Medium pressure tall towers.
- (5) S.S. HEAT exchangers for urea plants.
- (6) Pipes, valves, fittings for high pressure service.
- (7) Reformer tubes and furnaces.

APPENDIX XXII

(Vide para 5.38 of the Report)

Note on the extent of delay in the commissioning of various fertilizer plants programmed for execution during the Fourth and Fifth Five Year Plans and the reasons for the delay in the commissioning of the coal based fertilizer plants at Ramagundam, Talcher, and Korba and the present status of these plants.

It has been the constant endeavour of the Government to reduce the delay in the implementation of fertilizer projects and expedite their completion and commissioning. Monthly/Quarterly progress reports on the projects under implementation are analysed by the Project Cell in the Ministry with a view to identifying the factors leading to delay and for taking necessary remedial measures. In addition, inter Ministerial meetings are also held periodically with all the concerned wings of the Government to review the progress and to sort out the problems leading to delay. Further, Government had set up a Committee to investigate the reasons for delay and to suggest remedial measures and most of the recommendations made by the Committee have been suitably implemented. In addition, delivery of equipments by indigenous supplies like BHPV etc. is being monitored by the Ministry of Heavy Industry. In spite of constant endeavour by the Government to reduce delays, there have been nevertheless slippages in completion and commissioning of the various projects. Continuing efforts are being made to overcome various difficulties and to speed up completion and commissioning of the projects under implementation. The steps taken by the FCI to minimise delays in the execution of projects are indicated in the succeeding paragraphs.

Since 1966 when the implementation of Durgapur Project was taken up, the emphasis has been on carrying out maximum indigenous design and engineering and also procuring the maximum indigenous equipment possible for a project, so that, on the one hand, all indigenous expertise and facilities are established and fully utilised and, on the other, import substitution to the maximum extent possible is achieved. With this objective in view, progressively, from project to project, more and more equipment have been indigenised; at Annexure 'A' is listed the progressive indigenisation effected, from project to project, after Durgapur, which shows that, in the Haldia project for instance as many as 60 items which were imported in the case of Durgapur were brought from indigenous sources. This emphasis did result in some delay in the delivery of equipment inasmuch,

as the indigenous fabricators were taking up the fabrication and supply of these equipment for the first time and, therefore, as part of the learning process, took twice to perfect a technology and come up with reliable equipment. Though there have been delays on these accounts, at the same time it has been possible to build up the expertise in India in the fabrication of such sophisticated equipment. In many of the cases, the raw materials had also to be imported and supplied to the fabricators, which has added to the fabrication and delivery time. In one or two cases, delineated later, it has been found necessary finally to import some of the equipment where the technology was taking longer than anticipated for fabricating the equipment in India.

The various factors which have generally resulted in delays in the execution of the projects are presented below, starting with the acquisition of the land for the project right up to the completion of erection:

(1) *Acquisition of land*

In some cases, land, both cultivable and inhabited, have had to be acquired for the project and land acquisition proceedings have taken longer than anticipated. As an example, initially, considerable difficulties were faced in acquisition of land for the Barauni plant and township, from the local people. In Haldia, problems have been faced in carrying out the work on the water reservoir because of resistance from the local people whose land had been acquired. In all such cases, matters have been resolved with the assistance of the State Government as well as the Central Ministry.

2. *Construction material*

In the execution of some of the projects, in the beginning shortages have been experienced in regard to supply of construction material, such as cement and structural steel; the position was particularly critical during the year 1969 to 1971. In a number of cases, in order to avoid delays, such materials had to be purchased from the open market and stocked.

3. *Civil Works*

Depending upon the quantum, the work is farmed out to more than one contractor so that enough resources and material are available for completing the work in time rather than employing only one contractor. Even where contractors have been appointed on this basis and it has been found that there have been constraints on their resources, resort has been taken to induct other contractors also to avoid delays. An instance in point is the Haldia Project where difficulties were experienced by the contractor appointed for the piling work in mobilising his resources when another piling contractor was inducted to expedite the work.

4. *Ordering and Delivery of Equipment*

In many of the cases of equipment fabricated in India, the Fertilizer Corporation itself has taken action to import necessary raw materials and give them as free issue materials to the indigenous fabricators so that fabrication and delivery could be expedited. This was particularly the case in the case of projects not under World Bank financing where the materials have to be provided by the fabricators themselves. In the case of Barauni and Namrup Projects, originally some of the alloy steel raw materials were to be made available from within India, but, only at a later stage, imports had to be resorted to because they were not finally available from within India.

After ordering the equipment on indigenous shops, the Fertilizer Corporation, in a number of cases, have helped the fabricators by providing technical guidance and assistance with regard to the technology and procedure for fabrication, selection of correct welding material etc., so that the work could be expedited. A case in point is Urea Reactor ordered on M/s. BHPV for the Haldia Project.

In order to expedite progress of fabrication in various vendor shops in India, as a matter of policy, inspection and expediting cells have been established in fabricators' shops or regions where fabrication shops are situated, so that there is a constant follow up on the progress of fabrication, flow of material and delivery of equipment. In the case of imported equipment, apart from the Engineering collaborators taking up the expediting and inspection work on behalf of FCI, FCI itself has deputed their own project implementation staff, from time to time, to various foreign shops for expediting and inspecting the imported supplies.

As a regular measure, with regard to fabrication shops in India, meetings have been organised at Ministry's level in Central Government, from time to time, to monitor the fabrication and supply of equipment from Indian fabricators and, wherever, necessary, render all such assistance as has been found necessary for the supplies to be expedited.

In some cases, where indigenous shops had failed to complete the delivery of critical equipment, alternate action has been taken to expedite the delivery. For example, in the case of gasifiers for Ramagundam, when modification work had to be done on the equipment fabricated in BHPV shops in Vizag, the work was got done in the shops of M/s. BHEL at Hyderabad. In case of the Urea Reactor orders for the Haldia Project, on M/s. BHPV, when delays were being experienced in the fabrication, decisions were taken, in consultation with the Government, to import this particular item for maintaining to the Project schedules. In the case of CO₂ absorber and H₂S absorber for Haldia Project, which were lying in partly finished condition in the shop of M/s. G. Binny at Cochin, which

was under lock out, action was taken to remove the equipment from the shops with a court order and make alternate arrangements for completing the fabrication through another party; M/s. Vijay Tanks and Vessels, Bombay.

As mentioned at the outset, by and large, delays have occurred in fabrication and supply of indigenous equipment for many projects and this has been due to the fact that there has been progressively more and more indigenisation and the fabricators themselves had to go through the learning process to fabricate and supply the equipment. Though this has resulted in delays, at the same time, experience has been built up within the country for fabrication and supply of sophisticated equipment for fertilizer plants.

5. Erection

For erection work also, in order to expedite the projects, it has been the practice to adjudge the resources and capabilities of various erection firms and, as necessary, farm out the work so that parties are evenly engaged, commensurate with their resources, to complete the work in time. In some cases, assistance to construction contractors, at the site, has been given in order to expedite erection, by way of supply of erection equipment, welding sets and even qualified welders. Wherever contractors have been lagging behind, the matter has also been taken up at the highest level so that the contractors have been pressurised to complete the work early.

6. Monitoring of Projects

Projects are monitored through computer control of critical path network charts for projects, in the P&D Division. Progress of activities are constantly reviewed and corrective actions taken based on data processed in the computer. Wherever re-scheduling is possible to minimise delays, this is also being done.

List of major equipment which were indigenised for Maraumi Project over Durgapur Projects.

1. Process Naphtha Pump
2. Fuel Naphtha Pump
3. Desulphurisation Tray Column
4. Reactor Feed Effluent Heaters
5. Stripper Reflux Pump
6. Steam De-super Heater
7. Reactor Effluent Condenser
8. Stripper Re-boiler
9. Stripper Overhead Condenser

10. Stripper Feed Bottom Condenser
11. Stripper Bottom Cooler
12. Virgin Naphtha Vaporiser
13. Vent Naphtha Condenser
14. Secondary Desulphurisation Vessel
15. Steam Drum for Process Gas Waste Heat Boiler
16. Steam Drum for Flue Gas Waste Heat Boiler
17. Agitator
18. Boiler Feed Water Heater
19. Filters
20. Ejectors
21. Make-up Condensate
22. Regenerated Solution Pump
23. Recovery Ammonia Condenser
24. Liquid Ammonia Separator
25. Boiler Drum for Synthesis Boiler
26. Ammonia Preheater
27. Urea solution Separator
28. Urea Solution Pump
29. Recycle Carbamate Pumps
30. Condensate Recirculation Pump
31. Oil Reclamation Pump
32. Vacuum Condenser and Accessories.

List of Major equipment which were indigenised for Namrup Expansion Project over Durgapur:

1. Steam Drum for process Gas Waste Heat Boiler
2. Steam Drum for Flue Gas Waste Heat Boiler
3. Boiler Feed Water Heater
4. Agitator
5. Filters
6. Ejectors
7. Regenerated Solution Pump.
8. Make-up Condensate Pump
9. Recovery Ammonia Condenser
10. Liquid Ammonia Separator

11. Ammonia Preheater
12. Boiler Drum for Synthesis Boiler
13. Urea Solution Separator
14. Urea Solution Pump
15. Recycle Carbamate Pumps
16. Condensate Recirculation Pump
17. Vacuum Condensers and Accessories.

List of major equipment which were indigenised for Talcher/Ramagundam Projects over Barauni Projects:

1. Start-up Furnace
2. Water Condenser
3. Secondary Ammonia Evaporator
4. Boiler Drum for Synthesis Boiler
5. Medium Pressure Washing Pump.

List of major equipment which were indigenised for Haldia Project over Talcher/Ramagundam Projects:

1. Synthesis Reactor Shell
2. Primary Ammonia Evaporator
3. Synthesis Gas Compressor with Turbine
4. Ammonia Liquification Unit
5. First Condenser
6. Urea Circulation Pump
7. Urea Reactor (alternate arrangement has been made to import urea reactor due to failure of M/s. BHPV for the supply in time).

Projectwise position is indicated below:—

BARAUNI:

The zero date of Barauni Project was fixed as 10-3-1968. The original schedule date of completion of mechanical erection of the project was 31st March, 1971 and original date of commercial production of the plant was 1-10-1971.

The mechanical erection of the project could be completed in March, 1975. The commercial production was started with effect from November, 1976.

MAJOR REASONS FOR DELAY;

The net impact in the completion of mechanical erection of the project is about 48 months; the reasons of which are given below:—

Sl. No.	Major reasons for delay	Impact on the project schedule (months)
1	<p>The zero date for Barauni Project was fixed as 10th March, 1968. However, activities expected to be completed by the time of reference zero date or within a short period thereof were not completed at Barauni, for example documentation from collaborators for process design/specifications for major equipment, clearance of imported raw materials needed by the indigenous fabricators, acquisition of land and preparatory site work.</p> <p>Acquisition of land initiated in middle 1967, completed in May, 1968 for factory and borrow pit area and in September 1968 for township. The earth filling was started in 1968, could be completed by the end of 1970.</p> <p>Initial documents were received from M/s Technimont by January 1969 and specifications revision contained till September, 1970. Clearance of import raw materials by February, 1969 and all additional supplies of items by Feb. 1970.</p> <p>Supply of major raw materials to indigenous fabricators by December, 1970.</p> <p>The above will show that some of the basic requirements for fixing the zero date can be considered to have been completed only by end of 1970.</p>	6 months
2	<p>Delay in the delivery of indigenous equipment was to the extent of 18 to 39 months. Delay in the supply of imported raw materials to the fabricators was one of the reasons for the slippage for delivery of the equipment.</p> <p>There was also delay in supply of indigenous raw materials By M/s H.S.L. for more than a year. Moreover the slippage in the delivery of indigenous equipment was also caused due to shortage of steel and other materials, general labour conditions at fabricators' shops unfamiliarity of the fabricators with the problems about fabrication of certain equipment taken up for the first time.</p>	30 month
3	<p>The most critical factor contributing to the delay was the conditions of work prevailing at site. This affected the project schedule right from the beginning and even also all supplies were made in right time, some of the delays were inevitable. Through out the project excessive demands of labour and agitation for the same were constant occurrences. The Project Officer and other contractors' senior staff had often to seek police protection. The conditions were so severe that FCI Board had to take the serious decisions in 1971 to write to the Government that unless conditions improved they could not execute the project. During construction phase of the project, there was considerable labour unrest which very much impeded the construction work. Almost all the erection contractors were affected by continued labour and in two or three cases the contractors backed out from the sites at a late stage leaving the work unfinished.</p>	12 months.

REASONS FOR DELAY IN COMMISSIONING :

With the completion of mechanical erection of the project in March, 1975, the commercial production was supposed to be commenced after six months i.e. with effect from September, 1975. As against this the commercial production was started from November, 1976. The delay in the starting up of commercial production is 14 months. The major reasons for delay are given below:

Sl. No.	Major reasons for delay	Impact on the commissioning schedule (months)
1	During the commissioning period leakages were detected from the expansion bellows of reformed gas boiler. The boiler was opened for rectification of the defects. Some of the parts had to be imported from Germany and the modification/rectification job was carried out by German technicians under the supervision of the vendor's engineers. Some of the parts of the boiler had to be sent to Calcutta for stress relieving. The modification/rectification job was completed by the end of July, 1976.	4 months
2	While conducting the hydraulic test on the high pressure steam net-work in ammonia plant, leakages were observed from one tube of flue gas boilers in the month of July, 1975. On inspection the adjacent tubes were also found damaged and it was necessary to replace all the affected 16 Nos. tubes with new one. The replacement job was completed in the month of August, 1975.	1 month
3	There were interruptions in the start up of the plant due to leakage of the vapour naphtha from the tellon seat ball valves (about 1200 Nos.) of primary reformer burners supplied by the foreign suppliers. Since M/s Tecnimont could not find a satisfactory solution of the problem FCI took the bold decision to install globe valves in series with the ball valves. Valves were procured from Indian sources and replacement of valves was completed by middle of February, 1976.	5 months.
4	There was delay in commissioning due to excessive vibration of the turbine of the syn. gas compressor and its speed not rising beyond 11,000 R.P.M. There were further problems in the compressor due to leakage and vibration of seal oil system. This could be overcome and the compressor could be successfully started by the end of June, 1976.	1 month
5	A complete shut-down was taken in July, 1976 to attend to various leakages in the steam and boiler feed water pumps. The rectification of leakages was completed in August, 1976.	1 month
6	There were a number of power and voltage dips which effected the commissioning of the plant. From Jan., 1976 to the middle of August, 1976 there had been seven power dips and 17 Nos. voltage dips.	2 months

PRESENT STATUS .

In July, 1977 production of urea in terms of Nitrogen was 3200 T.e. against the target of 6300 T.e. After major breakdown in January, 1977 CO₂-Compressor is still under maintenance. There was power failure on 11th July.

Namrup Expansion Project:

The zero date of Namrup Expansion Project was fixed as 10-3-1968. The original schedule date of completion of mechanical erection of the project was 31st March, 1971 and original date of commercial production of the plant was October, 1971.

The mechanical erection of the project could be completed in January, 1975. The commercial production was started with effect from October, 1976.

Major Reasons for delay during erection:

The net impact in the completion of mechanical erection of the project is about 46 months, the reasons of which are given below:—

Sl. No.	Major reasons for delay	Impact on the project schedule (months)
1	<p>The zero date of Namrup Expansion project was fixed as 10th March, 1968. However activities for example, documentation from collaborators for process design/specifications for major equipment, clearance of imported raw materials needed by the indigenous fabricators, preparatory site work, expected to be completed by the time of reference zero date or within a short period thereof were not completed at Namrup.</p> <p>Initial documents were received from M/s. Tecnimont in January, 1969 and subsequent revision continued till September, 1970. Clearance of import of raw materials by February, 1969 and all additional supply items by November, 1970.</p> <p>Supply of major raw materials to indigenous fabricators by December, 1970.</p> <p>The above will show that some of the basic requirements for fixing of zero date could be considered to be completed only by end of 1970.</p>	6
2	<p>Delay in the delivery of indigenous equipment was to the extent of 20 to 33 months. Delay in supply of imported raw materials to the fabricators was one of the reasons for the slippage for delivery of equipment. Moreover the slippage in the delivery of equipment was also caused due to shortage of steel and other materials, general labour conditions at fabricators shops and unfamiliarity of the fabricators with the problems about fabrication of certain equipment for the first time.</p>	28
3	<p>Receipt of over-dimensioned equipment were delayed due to transportation problems. To reduce the severity of the problems certain equipments like ammonia convertor and urea reactor were transported in pieces for the first time in India. This resulted in extra work at site which was not anticipated. Certain other equipments particularly parts of absorption and regeneration columns were ready for despatch by the middle of June, 1971 at Trichy but could be brought to site by July, 1972 due to non-availability of requisite number of over-dimensioned wagons. Bangladesh crisis in 1971 and severe floods in 1972.</p>	6

A	1	2	3	4	5	6
4	In 1969, there were law and order problems at site leading to imposition of curfew for about a month. Again political situation in that area due to Bangladesh crisis in 1971 was unstable. In 1972 there was problem due to language agitation which resulted in quite a few of the contractors leaving the job site. This caused dislocation in the reaction activities.				} 3	
5	The major erection of the plant was completed by 31st October, 1974 but due to certain modifications work on ID fan and repairing of the refractory lining of primary reformer, mechanical completion of the project got extended to January, 1975.				} 3	

Reasons for delay in Commissioning:

With the completion of mechanical erection of the project in January, 1975 the commercial production was supposed to be commenced after six months *i.e.* with effect from July, 1975. As against this the commercial production was started from October, 1976. The delay in the start in up of the commercial production is 15 months. The reasons for delay are given below:—

Sl. No.	Major reasons for delay	Impact on the commissioning schedule (months)
1	During the drying stage of refractory, leakages were detected from the expansion bellows of reformed gas boiler. Some of the parts had to be imported from Germany and the modification/rectification job was carried out by German Technician under the supervision of vendor's engineer. Some of the parts damaged had to be sent to Barauni for welding and finally to Calcutta for stress relieving.	} 10
2	On the process air compressor, it was noticed that breakage of the diffuser vanes of first barrel was taking place. Those were repaired in the first instance but latter the manufacturer advised changing the diffuser vanes.	} 1
3	Failure of the anti-surge valve of Syn. Gas Compressor took place which resulted in the damage of the balancing drums, seal rings of the third barrel. Seals were replaced and antisurge valve was modified.	} 2
4	Leakage in the riser flange of R.G. boiler. Frequent choking of suction strainers of the solution circulation pump in the purification section. Frequent surging of the the process air compressor and vibration in the second stage borrel of synthesis gas compressor.	} 2

PRESENT STATUS:

In July, 1977, the production was NIL as the plant was shutdown due to failure of tubes of flue gas boiler. After repair the production has been started again.

DURGAPUR PROJECT:

The zero date of Durgapur Project was fixed as December, 1966. The original schedule date of completion of mechanical erection of the project was June, 1969 and the original date of commercial production of the plant was January, 1970.

The mechanical erection of the project could be completed in October, 1971 and commercial production was started with effect from October, 1974.

MAJOR REASONS FOR DELAY:

The net impact in the completion of mechanical erection of the project is about 28 months, the reasons for which are given below:—

Sl. No.	Major reasons for delay	Impact of the project schedule (months)
1.	Delays had occurred in the deliveries of imported as well as indigenous equipment. In the case of supply of indigenous equipment, the delays in the delivery of major equipment such as drilling tower, horton sphere, regeneration and decarbonation columns, RT and HT Converters, methanators etc. were of the order of 12 to 32 months and in the case of supply of items such as seal scrapper, pipe fittings, flanges valves etc. the delays were of the order of 20 to 42 months. In the case of imported equipment including high pressure pipes, pipe, fittings, flanges and valves, the delays occurred to the extent of 12 to 27 months.	24
2.	There has been labour unrest and low labour productivity in the Fabricators' Shops. Delay had occurred in the civil and erection work due to labour unrest among contractors' employees.	4

MAJOR REASONS FOR DELAY IN COMMISSIONING:

With the completion of mechanical erection of the project in October, 1971, the commercial production was supposed to be commenced after six months i.e. with effect from April, 1972. As against this, the com-

mercial production was started from October, 1974. The delay in the starting of commercial production is 30 months. The major reasons for delay are given below:

Sl. No.	Major Reasons for Delay	Impact on the commercial prodn. (months)
1.	The pre-commissioning activities were delayed due to non-availability of permanent power supply in time from M/s. Durgapur Projects Ltd. between June, 1971 to December, 1971. Only construction power was available which was adequate for individual testing or trial runs of machines or plant sections.	2
2.	The testing and commissioning operations had to be abandoned from December, 1971 to March, 1972 due to sudden departure of all the foreign technicians from the sites after declaration of national emergency in the beginning of 1971. The commissioning activities in the areas where their presence was considered essential (because the suppliers did not agree to any guarantees till commissioning was done in the presence of their specialists could be resumed only in March, 1972 when the foreign technicians came back.	4
3.	Commissioning was delayed due to major failure of high pressure boiler feed water pump supplied by M/s. Termomeccanica of Italy and also troubles in the reciprocating compressors supplied by the same firm and hot spot developed on RG Boiler. RG Boiler was modified in July, 1972.	5
4.	In November, 1972, the schedule of ammonia production was drawn as December, 1972. This could not be adhered to because of major failures of the boiler feed water pumps, reformed gas boiler and flue gas boilers. About 200 tubes of the flue gas boiler had to be cut and reshaped in order to reduce heat exchange surface so as to bring up the superheat temperature of the steam for the turbine. Modification was completed by the end of January, 1973.	8
5.	On 3rd June, 1973, when the commissioning operation had advanced to a stage when ammonia production was expected in a couple of days time, a major breakdown took place in the waste heat recovery system in which the reformed gas boiler tubes ruptured, a series of hot spots developed forcing a crash shutdown of the plant. Modification was completed in September, 1973.	4
6.	On 14th December, 1973, the plant had to be shut-down due to rupture of tubes of the flue gas boiler. After repair commissioning was again started on 31st December, 1973.	2
7.	The R.G. Boiler tubes failed repeatedly and several attempts were made to repair the leaky tubes in site but the repair work could not be done satisfactorily. Finally it was decided on 18th April, 1974 to replace the entire tube bundle by a spare tube bundle already available at site. After replacement of tube bundle RG Boiler was again commissioned in May, 1974.	2
8.	There had been numerous power break-down and voltage dips ever since the plant was started. The power shut-down accounted for sixty shut-downs of the plant from the very inception.	3

Present Status:

In July, 1977, production of urea in terms of nitrogen was 3700 te against the target of 7400 te of N.

GORAKHPUR EXPANSION PROJECT:

The zero date of the project was fixed as 1st February, 1972. In the World Bank Appraisal Report, a period of 30 months from 1-2-1972 to 31-8-1974 was taken for the completion of the project. The production was started at rated capacity with effect from 27th December, 1975, though the plant was declared on commercial production from 1st April, 1976. The delay in the completion of the project is about 16 months. The major reasons for the slippage are given below:—

Sl. No.	Major reasons for delay	Impact on the project schedule (months)
1.	Due to disturbed situation (Indo-Pakistan conflict) in the sub-continent in December, 1971, the preliminary work before zero date for the project could not be started. Negotiations with M/s. Toyo Engineering Corporation, Japan, could be started only in January, 1972. The investigation team of M/s. Toyo Engg. Corporation came in March, 1972 and contract for process engineering was approved on 8th June, 1972. Zero date was shifted by five months.	5
2.	During discussion in Japan in April, 1972, with M/s. Toyo, it was found that minimum 33 months was needed for mechanical completion of the fertilizer project followed by testing trial run and commissioning and a period of 36 months from zero date for commercial production. Thus 6 more months than 30 months were needed for the completion of the project. The 30 months period in Appraisal reports was based on equipment duplication and its small size and simplicity. Duplication was not possible in most of the cases following procurement procedures stipulated by the World Bank. Some of the suppliers who supplied equipment for existing plant in 1965 were not making similar equipment.	6
3.	The World Oil Crisis in October 1973 delayed delivery of imported items by 3 to 14 months. There were delays in indigenous supply and shortage of construction materials.	5

Present Status:

Production in terms of Nitrogen for Gorakhpur Units was 4600 te against the target of 9000 te for the month of July, 1977. The low production was due to continuous power cut for one stream and failure of supply on three occasions during the months.

SINDRI RATIONALISATION PROJECT:

The zero date of the Sindri Rationalisation Project was originally fixed as May, 1969. However, due to the embargo imposed upon the project the zero date was shifted to July, 1970. At that time, the date of completion of the mechanical erection of the plant was assumed as June, 1973. The original date of commercial production was fixed as December, 1973.

The erection of Sulphuric Acid Plant was completed in April, 1976. Further modification had to be done to the piping and refractory work which was completed in June, 1976.

Major erection work of Phosphoric Acid Plant was completed in July, 1976 and the modification of the rubberlining and pipelines was completed in August, 1976.

Total slippage in the completion of mechanical erection is about 38 months.

Major Reasons for Slippage during erection stage:

1. Civil construction was delayed due to delay in site clearance which also involved removal of some underground piping and cables of the existing units and delay in receipt of foundation drawing from various suppliers. The overall impact on the project schedule due to the delay in the civil construction jobs has been absorbed in the Slippage that had occurred in the delivery of the various equipment.
2. There has been a slippage of nearly two years in the receipt of indigenous equipment from various suppliers such as BHPV, FACT Engineering Works/FEDO, MAMC, BHEL etc. The net impact on the project, due to delay in the receipt of indigenous equipment, is about 24 months.
3. Erection work was delayed due to poor performance of contractors and also due to non-availability of some construction materials. This has a net impact of about 6 months on the project schedule.
4. After erection further modification had to be done to the piping and refractory work of H_2SO_4 Plant. The impact is two months.
5. Piping erection of Phosphoric Acid Plant was delayed due to practical difficulties in site assembly of the rubberlined pipes, non-availability of pipes, fittings, modification of piping etc. The overall impact due to the modification of the piping is about six months.

Major Reasons for the delay in the commissioning of the Plant:

One stream of the Sulphuric Acid Plant was commissioned in July, 1976. Full load test run of one stream of Sulphuric Acid Plant was completed on 7th December, 1976. Phosphoric Acid was produced for the first time on 14th January, 1977. The Acid Concentration Section of the Phosphoric Acid Plant was started on 10th February, 1977.

Trial run of TSP Plant was started on 17th June. The operation of the Sulphuric Acid Plant could not be stabilised due to mechanical failure of chain conveyor below the dry-electrostatic precipitator, jacketed collars of drag link conveyors, breaking of insulator on the top of dry electrostatic precipitator, problems in the pyrites crushing and handling sections, mechanical failure of boiler feed water pumps and other sections, of the plant. Commissioning of the Phosphoric Acid Plant was also delayed due to bulging out of rubberlining of a number of equipment. Rerubberlining job has been completed.

With the completion of mechanical erection in August, 1976 the commercial production was supposed to be started by February, 1977.

The commercial production of the end product (*i.e.* Tripple Super phosphate) is now expected to start from October/November, 1977.

The impact in the commissioning of the plant due to failure of various equipment is about 9 months.

Present Status:

Sulphuric Acid:

The production of Sulphuric Acid during the month of June was 657 te. In July, the sulphuric acid stream was started thrice on 9th, 15th and 27th July but the operation could not be continued due to the failure of red mill in one stream of pyrites crushing system, trouble in vibrating screen of gyratory crusher of pyrites crushing section and failure of drag link conveyor. The production of sulphuric acid during the month of July, was 2587 te.

The dry electrostatic precipitator, and the drag link conveyors have been weak areas in sustained operation of this plant. Modifications are being carried out in the drag link conveyor system; as regards dry electrostatic precipitator, action is being taken to induct the firm of M's. Lurgi for consultancy and advice; the problem is mainly due to the high dust content of low grade Amjhore pyrites being used and therefore a check of the entire system inclusive of the upstream facilities before the electrostatic precipitator will be referred to them.

Phosphoric Acid Plant:

Phosphoric acid plant was started again on 18th July and flash cooler was taken in line on 20th July. Filtration Section was started on 21st July but the plant operation could not be continued due to non-availability of Sulphuric Acid from the up stream plant.

The main problem in the phosphoric acid plant has been repeated failure of rubber particularly in the vacuum vessel. Through the re-rubber-lining appears to be satisfactory so far, action has been taken already to induct consultancy services from M/s. Hitachi Zosen of Japan who are experts in this field. Their engineer had been to Sindiri to advise on procedure to be adopted in ensuring safe and reliable rubber-lining.

TALCHER PROJECT:

Project Schedule:

The zero date of Talcher project was fixed as July, 1971. The original scheduled date of completion of machanical erection of the plant was January, 1975 and original date of commissioning of the plant was July, 1975.

The mechanical erection of the plant is expected to be completed by September, 1977 and commissioning of the gasification section by February/March, 1978.

Major reasons for delay:

The net impact in the completion of machanical erection of the project is about 33 months. The major reasons for the slippage are due to delay in the delivery of equipment by various indigenous suppliers as given below:—

Supplier	Delay in the delivery of equipment (months)	Impact on the project (months)
(a) M/s. BHPV (For supply of major critical equipment and supply-cum-erection)	20—25	25
(b) M/s. I.L. Kota (For the supply of main instrumentation, control panels and supply-cum-erection of instruments for steam generation plant)	24—30	4
(c) M/s. BHEL, Trichy. (For the supply erection of boiler)	12	1
(d) M/s. McNally Bharat Engg. (For supply-cum-erection of coal preparation plant)	11	1
(e) M/s. BHEL, Hyderabad (For the supply of Centrifugal Compressor)	13	1

Besides the above, there has been an overall impact of one month on the project schedule for the delay in the fabrication of gasifiers due to late change in the design of the gasifiers by foreign collaborators based on their experience of operation in a similar plant in South Africa.

Delay in the commissioning of the plant:

Commissioning operations are now expected to start by March, 1978 as against September, 1977 anticipated earlier. The slippage in the commissioning of the plant is about 6 months which is due to the following facts:—

1. The Air Separation Plant was scheduled to be commissioned by June, 1977. Due to various leakages observed during cold test of the cold boxes, there was a delay in the commissioning of the Air Separation Plant. The Air Separation Plant is expected to be commissioned by September, 1977. This delay has an overall impact of about 3 months on the commissioning activity of the plant.

2. The commissioning engineers of M/s. Krupp-Koppers suggested some modifications in the gasification section based on their experience in the South African Plant. After completion of the modification on the gasification section, recommended by M/s. Krupp Koppers, their Chief Commissioning Engineer will have to carryout a number of commissioning checks on the gasification and coal preparation section after which the section will be commissioned. This stage of preparation will require 3 months. Due to these late modifications the overall impact on the project schedule is about three months.

Present Status:

The mechanical erection of Talcher project is virtually complete. The various modification jobs, as proposed by M/s. Krupp-Koppers in gasification section are being attended to and the modification jobs are likely to be completed by the end of August.

The Air Separation Plant is likely to be commissioned by September, 1977. Trial runs on two raw gas blowers have been completed successfully. All the three boilers have been commissioned successfully.

Ramagundam Project:

The zero date of the project was fixed as July, 1971. The original date of completion of mechanical erection of the plant was January, 1975 and the original date of commissioning of the project was July, 1975.

Mechanical erection of the project is now expected to be completed by September, 1977 and commissioning operations started by February, 1978.

Major reasons for delay:

The net impact in the completion of mechanical erection of the project is about 33 months. The major reasons for the slippage are due to delay in the delivery of equipment by various indigenous suppliers, as given below:—

Supplier	Delay in the delivery of equipment (months)	Impact on the project (months)
(a) M/s. BHPV : (For supply of major critical equipment and supply-cum-erection)	20—25	25
(b) M/s. I.L. Kota (For the supply of main instrumentation, control panels and supply-cum-erection of instruments for steam generation plant)	24—30	1
(c) M/s. BHEL, Trichy. (For the supply and erection of boilers)	12	1
(d) M/s. McNally Bharat Engg. (For supply-cum-erection of coal preparation plant)	11	1
(e) M/s. BHEL, Hyderabad, for the supply of Centrifugal Compressor.	13	1

Besides the above, there has been an overall impact of one month on the project schedule for the delay in the fabrication of gasifiers due to late changes in the design of the gasifiers by foreign collaborators based on their experience of operation in a similar plant in South Africa.

Delay in the commissioning of the plant:

Commissioning operations are now expected to start by February, 1978 as against August, 1977, anticipated earlier. The slippage in the commissioning of the plant is about 6 months which is due to the following facts:—

1. The Air Separation Plant was scheduled to be commissioned by the June, 1977. Due to various leakages observed during cold test of the cold boxes, there was a delay in the commissioning of the Air Separation Plant. The Air Separation Plant is likely to be commissioned by September, 1977. This delay has an overall impact of about 3 months on the commissioning activity of the plant.

2. The commissioning engineers of M/s. Krupp-Koppers suggested some modifications in the gasification section based on their experience in the South African Plant. After completion of the modifications on the gasification section, recommended by M/s. Krupp-Koppers, their Chief Commissioning Engineer will have to carryout a number of commissioning

checks on the gasification and coal preparation section after which the section will be commissioned. This stage of preparation will require 3 months. Due to these late modifications the overall impact on the project schedule is about three months.

Present Status:

Major mechanical erection of the project has been completed. The erection of entire supply-cum-erection equipment has also been completed. The main plant piping is completed to the extent of 94 per cent. Till date 99 per cent of the total electrical erection work and 81 per cent of the total instrument erection jobs have been completed.

Pre-commissioning activities in some sections have been started. All the 3 boilers have been commissioned.

The modifications, in the gasification section as suggested by commissioning engineers of M/s. Krupp-Koppers based on their experience in the South African Plant, have been taken up.

Korba Project:

Government approved the setting up of a coal based fertilizer plant at Korba identical to Ramagundam and Talcher projects in January, 1972. Formal clearance for the project was given in June, 1974 and the date of completion was fixed as December, 1978.

So far an expenditure of Rs. 17.91 crores has been incurred on the Korba project and the following jobs have been taken up and completed.

- (i) Grading of the factory area.
- (ii) Boundary Wall.
- (iii) Construction water supply.
- (iv) Initial requirement of factory roads and railway siding.

The project has been slowed down/rephased due to severe constraints on availability of rupee resources. It is, therefore, difficult to indicate the date by which the project could be completed.

Haldia Project:

The zero date of Haldia Project was fixed as 1st September, 1972. The original date of completion of mechanical erection was September, 1975 and original date of commercial production was fixed as March, 1976. The project is now expected to be mechanically completed by June, 1978 and commercial production is expected by January, 1979.

The total impact on the mechanical completion of the project was a delay of 33 months, the major reasons for which are given below:—

Major Reasons for Delay	Impact on the project in months
1. Delay in starting of piling work as land development was delayed due to slushy condition of soil. Moreover, there was delay due to adverse labour situation	4
2. Delay in the receipt of basic engineering documents and revision of the documents by process collaborator for gasification, rectisol and ammonia plants	5
3. Delay in the procurement of imported pipes, pipe fittings, valves, etc.	4
4. Delay in supply of ASU/NSU/plants by M/s. BHPV	5
5. Delay in the delivery of shift converter and Saturator Water Heater by M/s. Larson & Toubro.	5
6. Delay in the delivery of CO ₂ Absorber and H ₂ S Absorber by M/s. G. Binny, M/s. G. Binny is under lockout since 11th April, 1977. The equipment was taken out on 8-8-77 under police protection by a Court Order	5
7. Delay in the delivery of CO ₂ Flash Tower and H ₂ S Flash Tower by M/s. T.S.L.	5

Present Status:

Major civil work except a few structural steel work in urea plant, pipe-trestles in Nitric Acid Plant and Yard piping have been completed. Both the Prilling Towers are nearing completion.

Progress of work on jetty and river water pump house by M/s. Gammon India Ltd. has not been satisfactory. M/s. Gammon India Ltd. as being impressed upon to expedite the progress of work.

Work in the water reservoir has been delayed due to dispute regarding the compensation to be paid to the villagers. With Ministry's intervention, West Bengal Government are arranging to disburse compensation money paid to them by FCI already.

1643 te out of a total of 1950 te of structural for the raw material conveyor from dock to factory have been erected so far.

M/s. BHEL have erected 2813 te out of a total of 4500 te of structural and equipment of steam generation plant. Mechanical erection of plant and equipment is in progress and 4783 te out of a total of 9792 te of equipment have been erected so far. 18 per cent of the overall piping work has been completed.

Trombay-IV Expansion Project:

The zero date of the Trombay-IV Expansion Project was July, 1974. The completion of mechanical erection of the plant was originally fixed as January, 1977. The project was scheduled for commercial production with effect from June, 1977. After having finalised orders to the extent of about 35 per cent for Nitrophosphate plant, 80 per cent for Nitric Acid Plant and 100 per cent for Steam Generation Plant, it was found that the deliveries quoted for some of the equipment by the suppliers are much longer than those estimated at the time of project planning. On the basis of such delayed deliveries of equipment the date of commercial production was revised to 1st November, 1977. This was approved by the Board of Directors in August, 1975.

The mechanical erection of the plant is now expected to be completed by October, 1977. The commercial production is likely to start by March, 1978.

The delay in the completion of mechanical erection of the plant is 9 months. The major reasons for delay in the mechanical erection are given below:—

1. An impact of 5 months on erection scheduled is due to slippage in the delivery of some of the imported as well as indigenous equipment. The delay in the supply of vendors' equipment is due to the fact that the actual delivery commitment of the vendors was more than anticipated during the preparation of the original time schedule of the project.
2. An impact of 4 months due to delay in the erection of tall towers because the erection contractor could not shift erection derrick from another site as originally planned. The Derrick had to be fabricated at site and the few towers have now been erected in June and July, 1977.

Present Status:

Overall progress of mechanical erection of the project is 95 per cent. The mechanical erection of the Nitric Acid Plant is likely to be completed by 15th October, 1977.

Precommissioning activities in some areas such as Water Treatment Plant, Bagging Plant and ANP Plant will be started as soon as the Municipal Corporation accords its clearance from the pollution angle for Trombay-IV. The clearance from the Municipal Corporation is awaited after which power and water will be made available.

It is now anticipated that the plant will be brought to commercial production by March, 1978 as against November, 1977, scheduled earlier.

Nangal Expansion Project:

Zero date of the project was fixed as 20th March, 1973. The original date of mechanical completion was 20th October, 1975 and original date of commercial production was April, 1976.

The revised dates of commercial production to 1st August, 1977 and 7th November, 1977 were approved in September 1975 and July, 1977 respectively by the Board of Directors, FCI taking into account the difficult position of procurement of piping in 1975 and delayed deliveries of tall towers and heat exchangers by M/s. BHPV, as well as delays in the delivery of lens gaskets for Ammonia Synthesis Section by M/s. Flexitallic Gaskets Ltd., U.K.

The mechanical erection of the plant was completed on 31st May, 1977. The delay in the completion of the mechanical erection of the plant is about 19 months.

The major reasons for the delay are given below:—

Major reasons for delay	Delay in weeks	Impact on the project in weeks
(i) Delay in completion of basic design package by M/s. Uhde on account of change in feedstock	13	} 26 weeks
(ii) Delay in the receipt of basic design documents from M/s. Tecnimont by 6 to 8 weeks on account of delay in postal transmission due to strike in Italy	7	
(iii) Slippage caused by revision of specification by M/s. Uhde and Lurgi in major equipment and instrument resulting in extension of placing of orders by about 8 weeks	6	
(iv) Inadequate and slow response to global tendering due to international oil & energy crisis starting in October, '73 to the extent of 3 to 4 months	13	
(v) Failure of indigenous as well as foreign suppliers to stick to their committed delivery schedules	58	58

Present Status:

The mechanical erection of the plant was completed on 31st May, 1977. Precommissioning activities have been started in various sections. Boiler No. 1, 2 and 3 have been commissioned. Ash handling system has also been commissioned.

The Air Separation Unit has been commissioned successfully. Heating of the three gasifiers has been completed. LSHS was fed in the gasification reactor and gasification test run was carried out successfully for about 20 hours.

Delay of about 6 weeks on the commissioning schedule is anticipated due to delay in receipt of fuel oil.

Commercial production is now expected by December, 1977.

Sindri Modernisation Project:

The zero date of the project was fixed as 29th October, 1974. The commercial production was scheduled by April, 1978.

The commercial production has been compressed to 20th February, 1978, from April, 1978 in the light of negotiations held with the World Bank. As per latest CPM chart the project schedule is likely to be delayed by 13 weeks on accounts of the following reasons:—

- (i) Slow progress of erection of boilers for steam generation plant by M/s BHEL, Trichy.
- (ii) Delay in the receipt of Air Compressors from M/s Damag, West Germany.
- (iii) Delay in the delivery of Synthesis Gas, Nitrogen, CO₂ Compressor parts and turbine by M/s BHEL Hyderabad.

Present Status:

Civil work in the ammonia plant has been completed, Civil Work in the auxiliary facilities is in advanced stage of completion.

Progress of erection of equipment and plant piping is about 91 per cent and 68 per cent respectively. Erection of overhead yard piping is nearly complete and hydraulic testing of the lines is also in progress.

The erection of boilers by M/s BHEL, Trichy is behind schedule. M/s. BHEL have been pressurised to improve upon their activity at site.

The progress of supply and erection of compressors by M/s BHEL, Hyderabad, is also behind schedule. Delay in completion of erection of the compressors will have a direct impact on the project schedule. The subject is being vigorously followed-up with Ministry and BHEL for augmenting resources and expediting the supplies.

Project of FACT

Cochin Phase I

The projects was sanctioned on 7-6-1966. The preliminary works of the Cochin Fertilizer Plant Phase I were started on 1st July, 1966 and were originally scheduled to be completed by October, 1969. But due to various reasons the completion date was shifted. There was no shifting in zero date.

The erection and pre-commissioning operations of the Cochin Fertilizer Plants were originally expected to be completed by October 1969. But, due to various reasons enumerated below the erection work was over by July 1971 and testing and pre-commissioning was over by December 1971 only. The first prills of Urea were released in April 1973 and the plants were declared for commercial production with effect from October 1974. The main reasons for the delay are:—

1. Delays in finalising the contract
2. Delays in the supply of equipment
3. Delay in testing and commissioning.

1. The main contracts were with Societe Italiana Impianti (S II) and Montecatini for the supply of imported equipments against supplier's credits for hydrofining, reforming and synthesis section of Ammonia and Urea plants and the contracts were finalised with these two parties in August 1966. But S II and Montecatini expressed their inability to supply equipments conforming to PGC specification for the conversion purification section. So this resulted in the search for another supplier who could supply equipments as per PGC specification and also extend credit facilities. This process took a long time and at last contract with M.s. Nuovo Pignone was finalised only in February 1968, causing a delay of nearly 18 months. This contract became effective in June 1969.

2. *Delays in the supply of equipments:* The contract with Nuovo Pignone came effective only in June 1968 that is about 2 years after getting the industrial licence for Cochin Phase I in June 1966. But added to this there was considerable delay on the part of Nuovo Pignone for effecting their supply of equipments since they experienced difficulties in getting some special material (special chromised tube HPBFW Heater No. 3 (E9)—from France due to political disturbance there. There was also delay on the part of M.s. AVB for the supply of vessels like H.T. converter etc. As per the contract these equipments had to be supplied by December 1968. But actually this was supplied only in February, 1971 and its erection completed in June 1971.

Although the contract with S II was signed on 31-8-1966, import licence was issued in March 1967 and equipment supply was completed only in August 1970.

3. *Delays in Testing and Commissioning:*

The erection work was completed by July 1971 and the pre-commissioning started. But due to labour problem from 22-8-1971 to 28-11-1971 no progress could be achieved in the pre-commissioning process. So the commissioning work could be started only in December 1971, and there were so many problems with the imported equipment like the boiler water circu-

lating pump, the boiler feedpump, the reformed gas boiler, the failure of the tubes in the radiant shield start up boiler and boiler feed water heat exchanger.

Even though the commissioning operations started in December 1971, the actual production of Urea could be achieved in April 1973 only. Even after commencement of production in April 1973 the installed capacity could not be maintained due to the following main limitations:

- (a) insufficient turbine-steam super-heating capacity.
- (b) insufficient loop cooling in ammonia section. An end to end survey of the plants was carried out by a team of Senior Technical personnel of FACT to identify any further short-comings and to evolve modifications to improve the steam efficiency and operational flexibility. The recommendations of M/s Technimont as a result of their end to end survey of the Durgapur Plant of FCI were also taken into consideration. Several modifications have been suggested. A programme for implementation of these modifications has been formulated and incorporated in the revised estimates. This programme known as Plan Operations Improvement Programme is estimated to cost Rs. 3.38 crores. The modifications are expected to be completed by September, 1977.

Cochin Phase II

1. Schedules given to Government

Original Schedule	Revision	Reasons for delay
September 1974	(1) Revised in April, 74 for completion of project in July, 1975	(a) There has been a delay of 3-4 months in ordering the equipment. The response to International tendering (as per the procedure laid down by IDA) was not good. In several cases extension of time had to be given and in the case of some critical items a re-tendering had to be adopted. (b) There has been considerable delay in civil works due to : 1. Delay in the award of contract due to late receipt of drawings from equipment suppliers.

Original Schedule	Revision	Reason for delay
		<ul style="list-style-type: none"> 2. Labour troubles at site. There was a number of strikes during the period. 3. Heavy monsoon from May to September 1973 during which time progress was slow. 4. The civil design of the NPK Plant was made on the basis of a typical lay out drawing supplied by the collaborator. However, when actual drawing of equipments were received from the equipment manufacturers it was found that the layout had to be changed. 5. When the schedules were originally made it was on the assumption that the construction of floors above the equipment items like Cooler and Dryer could proceed without waiting for their erection. Later it was found that it was not advisable to carry out the civil works without erecting these equipments.
	(2) Revised in April 1975 for completion of project in March, 1976.	<ul style="list-style-type: none"> 1. From early May 1974 to July 1974 there was a strike in Cochin Division. 2. Even after the strike was over civil work did not pick up tempo and two major civil contracts, one for Phosphoric Acid Plant and the other for off-site facilities had to be cancelled in August and September 1974 respectively. Fresh contract was awarded in November 1974 and January 1975 respectively. 3. Two major Indian Turn-Key Contractors, M/s Menally Bharat Engg. Company for Rock Grinding Plant and Conveyors at site. M/s Tata Robinson Frasier Ltd. for conveyors at Port have not been able to make much headway in the time of completion due to delay in receipt of steel materials. 4. Due to heavy monsoon that prevailed for about 6 months.
	(3) As per present schedule trial production envisaged in October, 1976.	<ul style="list-style-type: none"> 1. The party on whom orders for transformers have been placed, have stopped supply after delivering a few of the transformers. They had demanded increase in prices of raw materials and transformation

Original Schedule	Revision	Reason for delay
		oil. The order was cancelled and fresh order was placed with another party on a phased delivery schedule upto end March, 1976.
		2. On the basis of experience gained at khetri it was decided to get the rubber lining of the Attack Tank done in two layers, instead of one layer completed earlier. Further, additional care was taken to get the concrete tank leak-proof and for preparing the surface suitable for rubber-lining.
		3. There has been considerable delay in the supply of rubber-lined valves and hoses from an indigenous supplier. The despatch was completed by early July, 1976.
		4. There has been delay in the supply of the Ring Gear for the Rock Grinding Plant by a foreign supplier. The Gear was received in the third week of July, 1976.
		5. There was delay in supply of valves for steam service by a foreign supplier. Further when they were despatched the packages got misplaced in the ship and were over carried to some other port. These were located after considerable efforts and the material received at site in March, 1976.
		6. There was delay in receipt of instruments from a UK supplier. Most of these were received during January, 1976 only.
		7. There was delay in despatch of flanges for steam lines by an Indian party.
		8. Unforeseen difficulties were encountered in the alignment of chutes and ducts in the NPK plant resulting in the need for extensive modifications.
		9. The Rotary equipment supplied by M/s. Reneburg, USA were found to have defective alignment of Girth Gear and rectification was necessitated.

APPENDIX XXIII

(Vide para 5.49 of the Report).

Note on progress made in the development of organic fertilisers.

Scheme component	Plan target	Provision (lakh Rs.) 5th plan 1977-78	
(i) Setting up of mechanical compost plants	35 plants	700.00	80.00
(ii) Sewage/sullage utilization	250 schemes	212.56	73.18
(iii) Setting up of			
(a) Gobar gas plants	1,00,000 plants	707.00	190.00
(b) Community gobar gas plant	25 plants	8.00	5.00
(c) Bio-gas from night soil	—	—	10.00
(iv) Organisation of demonstration cum-training camps	1000 camps	2.16	0.50
(v) Award of prizes to gram panchayats	—	1.94	0.98
(vi) Pilot project for compost making by landless labourers	15000 tonnes	11.50	6.50
(vii) Green Manuring	—	—	10.00
(viii) Award of prizes to local bodies	—	1.40	0.35
(ix) Strengthening of organisational set up at Head quarters	—	9.39	3.49
Component-wise progress is given below:	Total	320.00	

Mechanical Compost Plants.

It is targetted to set up 35 compost plants in big cities during 5th Plan period to manufacture organic manures from city refuse. Under this programme, 33 per cent of the capital cost is given as subsidy. Rest of the cost is met by the implementing agencies from their own resources or through Institutional loans.

The first two compost plants at Ahmedabad and Baroda have already been commissioned. Projects for 17 more plants at Allahabad, Amritsar, Bangalore, Bombay, Calcutta, Delhi, Jaipur, Jullundur, Jodhpur, Kanpur, Lucknow, Ludhiana, Madras, Nagpur, New Delhi, Poona and Varanasi have also been approved. Most of them are in progress.

Subsidy amounting Rs. 155.75 lakhs has been released during the first three years as part payment for the above projects against their total capital cost of Rs. 1211.13 lakhs.

Physical and financial targets/achievements during 1st three years of the plan period and anticipated requirement during the current year are indicated as under:—

A. Physical (No.)		1975-76		1976-77		1977-78
1974-75		Target	Acht.	Target	Acht.	Target
Target	Acht.	5	10*	10	8*	11
1	1					

*Project approved.

B. Financial (Rs. lakhs)		1975-76		1976-77		1977-78
1974-75]		Target	Acht.	Target	Acht.	Target
Target	Acht.	100.0	47.31	90.0	88.42	80.00
20.0	20.0					

Sewage/Sullage Utilization Schemes:

It is programmed to implement 250 schemes in various cities/towns during the 5th Plan period to utilise sewage/sullage for irrigation and manurial purposes. Central assistance to the extent of 33 per cent of the capital cost of the works involved is being given as grant-in-aid to the Municipalities. Remaining cost is met by them through their own resources or by raising Institutional loans.

204. sewage/sullage utilization schemes in nine States/UTs of Andhra Pradesh, Bihar, Gujarat, Haryana, Maharashtra, Karnataka, Punjab, Tamil Nadu and U.P. were approved during the first three years of the plant period.

Against the total capital cost of Rs. 281.75 lakh of the above scheme, central assistance amounting to Rs. 84.65 lakh as part payment of subsidy has been released during the first three years.

The progress, both in terms of targets and expenditure during the 1st 3 years is as under:

Year	Target No. of scheme	Achievement	Budget Provision Rs. (in lakh)	Expenditure (in lakh)
1974-75	40	59	40.00	33.66
1975-76	50	127	51.00	11.45
1976-77	110	18	86.17	39.54
1977-78	50	..	73.18	..

Gobar Gas Plants:

It is programmed to set up one lakh gobar gas plants in the country during the 5th Plan period for production for fuel gas and good quality manure for agricultural production.

Against this about 45000 plants have already been set up during the first three years. Under this programme, subsidy @ 25 per cent and 20 per cent of the capital cost was given to the beneficiaries during the first two years and the year 1976-77 respectively. Total amount of subsidy released during the first three years was Rs. 347.54 lakh.

During the current year also, subsidy will be given @ 20 per cent of the capital cost but the rate of subsidy for smaller plants (sizes 60 and 100 cft) will be 25 per cent to help small farmers who generally go in for smaller plants and 50 per cent for plants set up in Hilly and Tribal areas. A subsidy at the rate of 33 per cent of the capital cost of 15 Community gas plants has also been provided during the current year. The subsidy provision for the purpose is Rs. 5.0 lakhs. A provision of Rs. 10.0 lakhs for 20 Pilot Projects for Bio-gas production from night soil has also been made during the current year.

The progress of the programme both in terms of physical achievement and expenditure is indicated below:

Year	Target (No. of plant)	Achieve- ment	Provision (Rs. in lakh)	Expendi- ture (Rs. in lakh)
1974-75	8000	10711	64.25	70.04
1975-76	12000	18718	96.00	174.78
1976-77	25000	15000	155.00	102.72
1977-78	25000	..	145.00	..
1978-79	30000	..	..	..

4.4. Organisation of demonstration-cum-training camps on production and use of organic manure:

The scheme envisages organisation of campaigns, exhibitions, seminars and demonstration-cum-training camps by Farmers' Associations with a view to educating, motivating and mobilising the farmers for maximising

the production and use of organic manures. Every year, 200 demonstration-cum-training camps of one day duration are targets to be organised and for each camp a grant of Rs. 250/- is being made available by Govt. of India to the Farmers' Associations.

The progress of the scheme is as under:—

Year	Camps held	Grant given (Rs.)
1974-75	132	32,646.84
1975-76	133	33,250.00
1976-77	190	47,500.00
1977-78	200	50,000.00
1978-79	200	50,000.00

} Provi-
sion

Scheme for award of prizes to Gram Panchayats for doing best rural compost work:

Under this scheme, encouragement is given to gram panchayats in the shape of prize awards for doing outstanding rural compost work. The scheme envisages holding of competitions at four levels viz., block, district, state and All-India levels.

Prizes to gram panchayats declared winners in the competitions held during the assessment year 1976-77 will be awarded during the current financial year. To meet the expenditure for State and All-India level awards to be borne by the Government of India, a provision of Rs. 0.98 lakh has been proposed in the B.S. 1977-78.

Scheme for compost making by landless labourers:

The scheme was launched in September 1976. Under this scheme, wheel barrows are supplied free of cost to landless labourers for collection of composting materials and an honorarium of Rs. 250 per month is given to project Organisers who will motivate and guide the landless labourers for preparing compost on scientific lines.

Twelve States/U.Ts took up the scheme during 1976-77 and a sum of Rs. 5.41 lakh was released to them as grant. Other States/U.Ts are expected to take up the scheme during the current year. A provision of Rs. 6.50 lakh has been made for giving grant to them.

Award of Prizes to Local Bodies:

Under the scheme cash prizes of Rs. 25,000 and Rs. 10,000 are awarded each year to the urban centres adjudged best and 2nd best in the All-India urban compost competition.

Green manuring:

A provision of Rs. 10.0 lakhs has been made during the current year for subsidized sale of green manure seeds.

5. A consolidated statement indicating progress, physical and financial, of various components of the Central Plan Scheme during the first three years and the programme for the current year is appended (Annexure).

ANNEXURE

Statement

STATEMENT SHOWING PROGRESS ACHIEVED (PHYSICAL AND FINANCIAL) UNDER THE CENTRAL SECTOR INTEGRATED SCHEME FOR DEVELOPMENT OF LOCAL MANURIAL RESOURCES

Programme	Fifth Plan		1974—75		1975—76		1976—77		1977—78	
	Target	Provision Rs. lakhs	Physical Achieve- ment	Expendi- ture Rs. lakhs	Physical Achieve- ment	Expendi- ture Rs. lakhs	Physical Achieve- ment	Expendi- ture Rs. lakhs	Target	Provision Rs. lakhs
1. Setting up of mechanical com- post plant	35	700	1	20	10 (projects approved)	47.32 (part pay- ment for 6 projects)	8 (projects approved)	88.43 (part pay- ment for 10 projects)	11	80.00
2. Sewage sullage Utilization sche- mes	250	212.56	59 (Schemes approved)	33.65 (part pay- ment for 30 schemes)	127 (schemes approved)	114.45 (part-pay- ment for 39 schemes)	18 (schemes approved)	39.54 (part pay- ment for 104 schemes)	46	73.18
3. (a) Setting up of gobar gas plants	1,00,000	707	10711	70.04 (for 7781 plants)	18718	174.78 (for 20443 plants)	15000	102.71 (12176 plants)	25000	130.00
(b) Community gobar gas plants	25	8	..	..	..	..	..	..	15	5.00
(c) Bio-gas from Night soil	..	..	..	..	..	..	..	..	20	10.00
4. Organisation of Demonstration- cum-training camps.	1000	2.16	132	0.33	133	0.33	190	0.47	200	0.50
5. Award of Prizes to gram pancha- yats and Local Bodies	..	3.39	..	..	..	0.35	..	0.39	..	1.33
6. Pilot project for compost making (tonnes) by landless labourers	15000	11.50	..	..	..	..	7200 (tonnes likely)	5.41 |	7800 (tonnes)	6.600
7. Green manuring	..	..	..	..	..	..	..	..	..	10.0

APPENDIX XXIV

STATEMENT OF CONCLUSIONS/RECOMMENDATIONS

Sl. No.	Para No. of Report	Ministry/Department Concerned	Conclusions/Recommendations
1	2	3	4
1	1-60	Department of Supply Department of Agriculture	<p>The indigenous fertiliser industry has, no doubt, grown impressively with its installed capacity for the production of nitrogenous and phosphatic fertilisers increasing from a meagre 1.49 lakh tonnes at the end of the First Five Year Plan (1955-56) to 24.99 lakh tonnes at the end of the Fourth Five Year Plan (1973-74). The Committee, however, find that while the capacity for the production of nitrogenous fertilisers had increased by 184.7 per cent, 126.4 per cent and 253.8 per cent respectively during the Second, Third and Fourth Plan periods, actual production was only 40.5 per cent of the available capacity in the last year of the Second Plan (1960-61), 42.5 per cent in the last year of the Third Plan (1965-66) and 54.6 per cent in the last year of the Fourth Plan (1973-74). Similarly, in respect of phosphatic fertilisers also, while the installed capacity during these three Plan periods increased respectively by 48.4 per cent, 140.0 per cent and 145.6 per cent, actual production amounted to only 54.7 per cent of the capacity in 1960-61, 48.7 per cent in 1965-66 and 57.7 per cent in 1973-74. On account of the wide gap between installed capacity and actual production on the one hand and between production and estimated demand on the</p>

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other, the country has been dependent to a very large extent on purchases from abroad. Imports of nitrogenous and phosphatic fertilisers have, thus, steadily increased from 5.09 lakh tonnes in 1970-71 to 11.65 tonnes in 1974-75, when the portion of imports (excluding potassic fertilisers which have to be necessarily imported as they are not produced indigenously) to consumption was as high as 51.78 per cent, after having come down to 25.20 per cent in 1970-71 from 61.76 per cent in 1968-69. Correspondingly, the value of imports have also been progressively on the increase since 1971-72. (While purchases from abroad of all varieties of fertilisers cost the country Rs. 90.23 crores in 1971-72 as against Rs. 163.00 crores, Rs. 116.77 crores and Rs. 95.87 crores during each of the preceding three years, purchases valued at Rs. 118.81 crores, Rs. 183.49 crores and Rs. 402.45 crores were made respectively during 1972-73, 1973-74 and 1974-75). The extent of the country's dependence on imports in the recent past would also be evident from the fact that while the investments made in the indigenous fertiliser industry (public sector) during the five year period from 1970-71 to 1974-75 totalled Rs. 531.35 crores, the fertiliser import bill during this period amounted to as large a sum as Rs. 890.85 crores, and in 1974-75 alone, the import bill (Rs. 402.45 crores) was more than double the investment (Rs. 200.88 crores) in the public sector for augmenting indigenous production of fertilisers.

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These statistics serve to emphasise the imperative need for exercising great care in planning for the imports of a vital commodity, which is known to be acutely sensitive to world demand, supply and price trends, and for evolving a sound and rational import strategy which would enable purchases being made at the proper time and at the most advantageous prices. Un-

fortunately, however, as would be seen from the facts disclosed in the foregoing paragraphs as well as from some of the specific cases of purchases discussed later in this Report, it appears that there had been no scientific planning in the past on which a sound import strategy could have been determined, as a consequence of which recourse had often to be had to distress purchases at inopportune moments, when market conditions were unfavourable, to bridge the gap between demand and production. It also appears that imports were persisted with even when the estimated demands and consumption levels did not materialise, resulting in purchases in a falling market at abnormally high prices and avoidable inventories and accumulation of stocks.

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Department of Supply
Department of Agriculture

In the Committee's view, the failure of the strategy hitherto adopted for the purchase of fertilisers from abroad is mainly attributable to the unreliable and unscientific estimation and projection of consumption and demand, indigenous production and requirements, leading to periodical changes and adjustments in the purchase programmes which proved to have been, in the ultimate analysis, detrimental to the country's financial interests. The Committee have been informed that the annual import requirements of fertilisers are worked out by the Department of Agriculture by deducting the domestic production, as estimated and communicated by the Ministry of Petroleum and Chemicals, from the total agronomic requirements, which in turn are estimated a year in advance, of fertilisers to support the agricultural production programmes of that year. The require-

ments thus computed are intimated to the Department of Economic Affairs for authorisation of the imports and allocation of funds. That Department, in turn, depending upon the availability of foreign exchange resources, approves the purchases either against free foreign exchange or against foreign aid or credit or from Rupee Payment Areas under bilateral trade agreements. While all this sounds simple enough, the Committee find that in actual practice, there were wide variations between the consumption levels estimated initially and actual consumption and off-take and between the estimates of indigenous production intimated by the Ministry of Petroleum and Chemicals and actual production, as a result of which the import requirements as assessed by the Department of Agriculture had mostly been wide off the mark and far removed from realities.

For instance, the Committee find that the estimates of fertiliser consumption levels, which forms the basis for assessing requirements and planning for imports, have never been realised to the full extent which would indicate that these were perhaps optimistic and on the high side. Thus, during 1969-70, 1970-71 and 1971-72, while the agronomic requirements of nitrogen and phosphorus had been estimated at 23.00 lakh tonnes, 27.50 lakh tonnes and 28.00 lakh tonnes respectively, actual consumption was only 17.72 lakh tonnes, 20.20 lakh tonnes and 23.36 lakh tonnes. A similar trend is discernible in the subsequent years also and during 1972-73, 1973-74 and 1974-75, the actual consumption of nitrogen and phosphorus was respectively 24.21 lakh tonnes, 24.80 lakh tonnes and 22.51 lakh tonnes as against the estimates of 30.00 lakh tonnes, 34.10 lakh tonnes and 39.10 lakh tonnes. Similarly, there were wide variations between estimates and actuals during this period in respect of potassic fertilisers also. That

the projections made in this regard were unrealistic is also borne out by the following observations contained in the 'Fourth Plan Mid-term Appraisal':

"Fertiliser consumption... has not increased as planned. The targets are not likely to be reached. The likely consumption of nitrogenous fertilisers in 1973-74 is now reckoned at 2.60 million tonnes (N) as against the original target of 3.20 million tonnes (N). Against the Plan target of 1.4 million tonnes (P_2O_5) for phosphatic fertilisers, actual achievements are likely to be around 0.8 million tonne (P_2O_5 ."

The Draft Fifth Five Year Plan also refers to the shortages in the achievements of fertiliser consumption targets.

Deptt. of Supply
Deptt. of Agriculture

Though it was contended during evidence by the representative of the Department of Fertilisers and Chemicals that an estimation of fertilisers which will be actually consumed by the peasants is "by no means an easy task", and that when even developed countries were not finding it easy to estimate the fertiliser consumption level in agriculture, what the Department of Agriculture was doing was "quite good in international circumstances", it has nevertheless been conceded by the representative of the Department of Agriculture that "in the past, the nature of the methods of assessment of the requirement was not very satisfactory". Admittedly also, upto 1970, the Department had been assessing the consumption of fertilisers with reference to what the State Governments had asked for and

the figures of consumption intimated by the State Governments were “very inflated ones” and their demands “irrational”. The Committee have also been told in this context that the State Governments merely went by the recommended doses without any reference to levels of consumption in the State. Even after the Department of Agriculture themselves assumed the responsibility subsequently of assessing the requirements, the practice till 1971-72 was to allow an *ad hoc* increase of 25 per cent over the consumption achieved in the States in the previous year, which was also, according to the witness “found to be a little irrational”.

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The Committee find that it was only in respect of the requirements for 1972-73 that a serious attempt to assess the requirements on a more realistic basis was made for the first time, in December 1971, when a sub-committee, under the chairmanship of the then Additional Secretary, Ministry of Foreign Trade, was appointed to go into the requirements projected by the Department of Agriculture in October 1971 and to evaluate the supply position *vis-a-vis* requirement. This sub-committee, after studying the trends of consumption and various other factors, also came to the conclusion that it would suffice if the requirements were worked out after allowing a certain percentage increase over the consumption of the previous Kharif and Rabi seasons and accordingly recommended an increase of 23 per cent over the previous year's consumption. However, on the Committee of Secretaries suggesting a fresh look at the demand projections, the sub-committee recommended, in March 1972, that the projection for Kharif, 1972 be made on the basis of an increase of 15 to 20 per cent over the Kharif, 1971 consumption, and for Rabi, 1972-73 on the basis of an increase of 20 to 25 per cent over the consumption during the preceding

Rabi season. The Committee of Secretaries, which considered these recommendations, appears on the contrary to have adopted a safe course when they decided that the demand for 1972-73 should be worked out on the basis of 17 per cent increase over the consumption of the preceding Kharif season and 22 per cent increase over the preceding Rabi consumption, as against the increments of 20 per cent and 25 per cent respectively over the consumption of the previous Kharif and Rabi seasons recommended earlier, in October 1971, by the Standing Committee on Fertilisers of the Department of Agriculture.

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Deptt. of Supply
Deptt. of Agriculture

That this elaborate exercise spanning nearly six months did not also produce the desired results would be evident from the figures of estimated requirements and actual consumption quoted earlier in paragraph 1.61. (In 1972-73, actual consumption of fertilisers was only 24.21 lakh tonnes of nitrogen and phosphorus as against the estimated demand of 30.00 lakh tonnes). The representative of the Department of Agriculture also admitted during evidence that "this was really a formula which was adopted to arrive at an agreed figure". As has been pointed out earlier, the tendency appears to have been to base future projections on the recommended doses without, however, taking into account the fact that the farmers do not always use the full recommended doses, and herein lies the root cause of the inflated estimates of fertiliser consumption for the future. Besides, as has been rightly pointed out by a recent (June 1976) study by the Reserve Bank of India on 'Fertiliser Consumption in Indian Agriculture', the pre-Plan levels of consumption of fertilisers were so low as a base that subsequent

increases in consumption worked out to a high compound growth rate and "such high growth rates cannot be expected to be sustained throughout in future for the simple reason that the bulk of fertiliser consumption, by and large, is accounted for by certain pockets in various parts of the country with favourable conditions for its use and even as it reaches a near saturation level at the existing level of technology and related factors like irrigation and cost-price relationship the scope for further growth is rather limited." Unfortunately, however, the availability of complementary inputs like credit and irrigation on which the use of fertilisers depends to a large extent does not also appear to have been taken into account while making demand projections. Yet another variable factor which seems to have been lost sight of is the variation in soil-crop complexes from place to place. In these circumstances, it is not at all surprising that the estimates made from time to time had gone away.

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It would, therefore, appear *prima facie* that inflated consumption figures had been assumed somewhat mechanically and not on the basis of any sound statistical data leading to unrealistic forecasting of demand and requirements, which also had its inevitable impact on the import programme. It would also appear that Government had played excessively safe and erred on the side of liberalism in planning fertiliser imports and that some of the imports could well have been avoided by a more scientific and realistic assessment of requirements. The Committee are of the opinion that greater care could and ought to have been exercised in planning for the import of an item like fertilisers instead of adopting *ad hoc* measures.

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9. 1-68 Deptt. of Supply
Deptt. of Agriculture

The Committee have, however, been informed that certain corrective measures aimed at ensuring a more accurate forecast of requirements have since been taken and that "a very scientific method" has been evolved recently to arrive at the total demand by linking the assessment to the actual consumption in each State and also the level of consumption reached in individual States and to the agricultural production programmes of the States. Under this method, which was adopted for the assessment of fertiliser requirement for Rabi, 1973-74, the area under high yielding variety programmes, non-high yielding variety cereals and other commercial crops is taken into consideration separately and the requirements computed in the following manner:

- (i) An option was given to the State Governments to select the best fertiliser season since 1969-70 as the base.
- (ii) The area under different crops in a State was standardised by converting the area under different crops and reducing these area figures into one common figure. For instance, if a State grew HYV wheat, local wheat, HYV Bajra, local Bajra, Sugarcane, Potatoes and Cotton the area under these various crops was reduced into one area (e.g. area under HYV wheat), the conversion being done by assuming certain conversion ratios, based on the recommended doses. It was, thus, assumed that if HYV wheat required one unit of fertilisers, non-HYV wheat would need 1/2 unit, cotton 1 unit, HYV Bajra 1/2 unit, local

Bajra 1/4 unit, etc. and the standardised areas of different crops were added to arrive at one common figure.

- (iii) The average dose required was then calculated by dividing the consumption at (i) by the area calculated as at (ii) above.
- (iv) On the average dose thus calculated, a 5 per cent increase was granted for each season to obtain the estimated dose for the season under consideration. (Thus, if the average dose had been calculated for Rabi, 1970-71 season, a 5 per cent increase was given for Rabi, 1971-72, another 5 per cent for Rabi 1972-73 and yet another 5 per cent for Rabi 1973-74).
- (v) The estimated dose so arrived at was multiplied by the standardised area for Rabi, 1973-74 (or for the season for which assessment is to be made) to work out the total requirements of fertilisers.
- (vi) However, in case Rabi, 1972-73 season happened to be the best season for a particular State, this State was granted yet another 5 per cent increase over the requirements worked out at (v) above. (The reason for this is stated to be the artificial depression of consumption during 1972-73 on account of non-availability of fertilisers and it was, therefore, assumed that if sufficient fertilisers were available, the consumption "would have been comparatively a little more.") The State Governments were, however, given the option of choosing between the results obtained by this method and those obtained on the basis

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of the method earlier adopted in respect of assessment of requirements for 1972-73, viz. applying an increment of 22 per cent over the preceding Rabi consumption.

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Deptt. of Supply
Deptt. of Agriculture

A further refinement in the method of assessing fertiliser requirements was introduced for the Kharif, 1974 season, on the basis of the recommendations of a Committee constituted, under the Chairmanship of the Joint Secretary (Inputs), Department of Agriculture, to go into this question once again when some State Governments (particularly in the eastern region) protested that the earlier method, according to which a uniform rate of increment over the previous best year's consumption was allowed for all States was weighted in favour of the States which had already progressed far in fertiliser consumption and did not take into account the fact that some States which had started with low levels of consumption had the potential for achieving a much higher level of consumption. This Committee (the Anna George Committee), while broadly approving the method adopted by the Department for Rabi, 1973-74, however, suggested that comparatively backward States should be accorded a higher rate of increase in the dosage rate to enable them to gradually catch up with the progressive States and had arrived at the following conclusions:

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- (i) The assessment should be based on the production programmes of the season and not on the basis of past consumption only.

- (ii) By and large, the formula proposed by the Ministry of Agriculture was considered to be sound except for the rate of increment which it was felt should not be uniform for all the States:
- (iii) The increment in dose to be allowed for each State may be worked out in such a manner that the consumption per hectare of all the States will be brought more or less to the same level in a reasonable number of years say 8 or 10 years.

In pursuance of these recommendations, while assessing the fertiliser requirements of the States for Kharif, 1974, the States were classified into eight groups on the basis of their consumption per hectare in a year of no shortage and a different percentage increase in the average dose, varying between 5 per cent (for States like Punjab) and 12 per cent (for States like Assam, Tripura, etc.) was granted to each group of States. However, from Rabi, 1974-75 onwards, on complaints from the States that the percentage increase accorded to the backward States was "too meagre", the States were reclassified into nine groups and allowed percentage increases in the average dos varying from 5 per cent (Punjab and Pondicherry) to 20 per cent (Assam, Manipur, Tripura and Rajasthan).

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While the Committee concede that this represents a certain improvement over the earlier methods of estimation of requirements, they, however, find that even this method suffers from a number of deficiencies with a number of basic issues involved remaining largely unresolved, and that this can, therefore, be considered at best a sort of compromise formula. For instance, the Committee note that under the revised method

of assessment, an option was given to the State Governments to select the best consumption season since 1969-70 as the base. For forecasting purposes, the base should be, by and large, a representative base and not a biased one which will result in excessive weightage being given to extremes of high or low performance, thus vitiating the reliability of the final figures. Further, though the fertiliser requirements have been linked to the production programmes, the conversion factor employed for standardisation of the area under different crops is once again based on the recommended doses and here again the fact, referred to earlier paragraph 1.64, that the farmers do not always use the full recommended doses appears to have been lost sight of. In this context, the observations contained in the Report of the Programme Evaluation Organisation of the Planning Commission for Kharif, 1967, that "the nitrogenous fertilisers were applied for about 2/5ths of the high-yielding paddy plots and at about half the recommended dose" are also relevant. In fact, the Committee also find from the Report of the Anna George Committee that the Economic and Statistical Adviser to the Ministry of Agriculture (who was also a member of the Committee) had also drawn attention to the fact that even in IADP (Intensive Agricultural Development Programme) districts, the recommended doses had not been achieved even at a time when there was no shortage of fertilisers. Besides, since Demand Estimation is a positive and not a normative analysis, the prescribed or recommended dosages can be employed as a basis for estimation only if the other factors which influence the use of fertilisers, like availability of funds, climatic conditions, other infra-

structural facilities and, above all, willingness on the part of the farmer to employ fertilisers, are held to be '*ceteris paribus*' factors, and this is an assumption which is naturally extremely restrictive. The basis on which the incremental percentage of 5 per cent over the average dose was arrived at for Rabi, 1973-74, is also not clear to the Committee. Finally, whatever might have been the reliability of this method, it had been nullified to a considerable extent by giving an option to the State Governments to choose either the results obtained by this method or those obtained by the earlier one which was even less scientific. In these circumstances, and also in view of the fact that the actual consumption of fertilisers during 1973-74 and 1974-75 was only 24.80 lakh tonnes and 22.51 lakh tonnes respectively as against the estimates of 34.10 lakh tonnes and 39.10 lakh tonnes, the Committee are doubtful whether even the revised method of estimation of requirements can be considered dependable.

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It is thus fairly evident that the major problem of estimation of domestic requirements, which forms the basis for the import strategy, is yet to be resolved satisfactorily, and the requirements continue to be computed by adopting different criteria more with a view to reconciling the divergent claims of the comparatively developed States and the developing States, as a result of which a certain amount of adhocism still persists in working out the requirements. The Committee are of the view that it should not be too difficult to ensure a more accurate forecasting of requirements by adopting various tools of demand estimation as are provided by the science of econometrics. While they admit that even the most rigorously scientific, econometric methods can yield estimates which prove to be different from the actuals, and that these estimates can be vitiated by a number of un-

foreseen and unpredictable factors, the Committee, however, see no justification for the replacement of scientific estimation by *ad hoc* and arbitrary formulae. Imports of fertilisers should not be planned on the basis of a mere extrapolation of past trends in this regard but in the context of a definite picture emerging from a scientific study of the actual patterns of fertiliser use in the country, the evolution of high-yielding varieties of commercial crops, extension of irrigation facilities, multiple cropping, breakthrough in dry farming techniques, etc. A critical review of the estimates projected from time to time would also be necessary to determine what went wrong and, benefitting from past mistakes, to adopt concrete corrective measures promptly. The Committee, therefore, recommend that such a review should be undertaken with the assistance of experts in the field of econometrics and the fertiliser import policy realigned and determined in a more scientific and realistic manner.

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Deptt. of Supply
Deptt. of
Agriculture

A sound machinery for the collection of relevant statistical data is also a basic pre-requisite for a scientific estimation of demand and requirements. For any planning on a realistic basis, it is also absolutely necessary that the planning agency is provided with timely and reliable data. In this connection, the Committee find that the Indian Institute of Management, Ahmedabad had suggested, at the request of the Department of Agriculture, a system of data reporting in regard to stocks and sales of fertilisers using the retailers as the reporting base and that their suggestions included rationalisation of the report format, avoidance of double accounting and streamlining of the reporting machinery. It, however, appears that this system,

when tried out in Punjab and Tamil Nadu, disclosed "large scale defaults" in the reporting by the retailers, despite a legal obligation cast on them and it was, therefore, proposed to adopt the wholesalers rather than the retailers as the reporting base and also to maintain a month-wise flow of data for effective import planning. It also appears from the Report of the sub-committee, appointed to examine the requirements projected for 1972-73, that the Department of Agriculture were also not in possession of past data relating to the actual dosage per hectare used for different crops. Stressing, therefore, the importance of timely and contemporaneous flow of all relevant data, the Committee desire that the adequacy of the existing machinery for data collection should be reviewed and necessary measures taken urgently to streamline it so as to ensure that the data collected is timely and also reliable to form a sound basis for the formulation of policies. They would also like to be apprised of the specific steps taken in this regard and whether the adoption of the wholesalers as the reporting base has worked satisfactorily.

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I-73

Deptt. of Supply

Deptt. of
Agriculture
Chemicals &
Fertilisers

As pointed out earlier, another factor responsible for the deficiencies noticed in the planning for imports is the unreliable estimation of indigenous production of fertilisers by the Department of Fertilisers & Chemicals. The Committee are concerned to observe a wide gulf between the estimates initially projected by the Department, on the basis of which the import strategy was determined often with disastrous results, and the actual production. The estimates had also been periodically revised by the Department of Fertilisers & Chemicals as a result of which changes and adjustments had to be made in the purchase programmes, not always to the country's advantage. Thus, the original

estimates (December, 1970) of 14.20 lakh tonnes of Nitrogen, expected to be produced during 1971-72, had been revised in April, 1971 to 13.20 lakh tonnes and further revised on October, 1971 to 11.90 lakh tonnes, while the actual production amounted to only 9.52 lakh tonnes. Similarly, as against the original estimates (October, 1971) of 18.20 lakh tonnes, revised estimates (December, 1971) of 14.05 lakh tonnes and further revised estimates (June, 1972) of 12 to 13 lakh tonnes, the actual production of nitrogen in the country during 1972-73 was only 10.60 lakh tonnes. The position in this regard was no better during 1973-74 and 1974-75 also. While in 1973-74, actual production of nitrogen was 10.60 lakh tonnes as against the original estimates (June, 1972) of 16.00 lakh tonnes, revised estimates (February, 1973) of 14.04 lakh tonnes and re-revised estimates (July, 1973) of 11.28 lakh tonnes, during 1974-75, actual production amounted to 11.85 lakh tonnes as against the initial estimates (December, 1973) of 15.50 lakh tonnes and revised estimates (November, 1974) of 12.70 lakh tonnes. The indigenous production of phosphatic fertilisers had also not come upto the levels originally estimated and subsequently revised during these years. The representative of the Department of Agriculture also informed the Committee during evidence that it had been the Department's experience that the actual indigenous production was "far below the estimates given earlier" by the Department of Fertilisers & Chemicals.

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1974

Deptt. of Supply
Deptt. of
Agriculture
Chemicals &
Fertilisers

The representative of the Department of Fertilisers & Chemicals admitted during evidence that he "would not hesitate to concede that over the past six to seven years, the estimations have not been accurate", and that "there has been a big gulf between the target and the actual production". It appears that while forecasting estimates of indigenous production, a somewhat facile assumption had been made that the new fertiliser projects would actually be commissioned as planned, as a consequence of which the estimates had been pitched at levels which were even higher than the then existing installed capacities. The fact that even the existing plants were operating only at levels far below their installed capacity also appears to have been overlooked. Thus the estimates themselves bore no relation to the available capacities and delays in the commissioning of new plants inevitably made the estimates unreliable and unrealistic. The Committee cannot help feeling that adequate care had not been exercised in this regard by the Department which is regrettable.

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1975

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The Committee have been informed that the Department of Fertilisers & Chemicals, learning from past mistakes, have revised the method of estimation from 1975-76 onwards. Under the revised method, the estimates of production are based entirely on the performance of the operating units and no credit is taken for production likely to come out of units expected to go on stream during the year. Even in estimating production from the operating units, a suitable provision is made for likely loss in production arising out of known constraints like power cuts fluctuations, shortage of raw material, labour problems, etc. From the gross assessment of production an overall allowance to the extent of 5

per cent is made for all unforeseen shutdowns due to labour problems, mechanical breakdowns, accidental damages etc. The Committee, however, note that there was variation in the estimates of production and actual production of nitrogenous and phosphatic fertilisers during 1975-76 and 1976-77. The production of nitrogenous fertilisers during 1975-76 was 2.30 per cent in excess over original targets but 2.60 per cent less than original targets in 1976-77. The production of phosphatic fertiliser was 17.90 per cent less than original target during 1975-76. The Committee would, therefore, like the Ministry of Chemicals & Fertilisers to have a fresh look at the method employed for estimating indigenous production and devise a more scientific and realistic method which would ensure that all the variables are taken into account and the estimates approximate as closely as possible, to the actuals. The Committee are also of the opinion that since under the revised method of estimation, the likely increase in production as a result of commissioning of new plants during the year is not taken into account, a situation may well arise (in the event of the new plants going on stream as per schedule) in which the import requirements worked out on the basis of these depressed estimates of production may prove to be excessive. The Committee are, therefore, of the view that in forecasting, for the purposes of planning for imports, indigenous production of fertilisers, this fact should also be taken into account suitably and the progress made in the commissioning of new plants as well as the performance of existing plants monitored effectively and continuously so that timely intimation regarding likely increase in or

set-back to production could be made available to the indenting agency (Department of Agriculture) and the procurement organisation (Minerals and Metals Trading Corporation).

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1-76

Deptt. of Supply
Deptt. of
Agriculture
Chemicals &
Fertilisers

Hitherto, the procurement of fertilisers from abroad was also dependent on the availability of foreign exchange and the Committee have been informed in this context that earlier the Department of Economic Affairs used to authorise imports of quantities less than what had been estimated by the Department of Agriculture and also allot foreign exchange only in instalments. As a result, the requirements of fertilisers to be imported by the Department of Supply had been regulated periodically having an inevitable impact on the prices. Thus, during 1972-73, as against the initial requirement of 60,000 tonnes of Muriate of Potash (special grade) for Madras Fertilisers Ltd., indents for the procurement of only 22,000 tonnes could be placed on 24 March, 1972 owing to shortage of foreign exchange and less availability of credit, which were later revised to 65,000 tonnes (after taking into account the modified demand of Madras Fertilisers Ltd.) on 11 April, 1972, after the Department of Economic Affairs had clarified that larger credit would be available. Similarly, periodical adjustments in the purchase programme for urea had to be made as and when the Department of Economic Affairs authorised purchases against credit or released additional foreign exchange. Such piece-meal purchases, particularly during 1972-73, when there was admittedly a general world-wise shortage of fertilisers leading to increases in international prices of fertilisers (prices of urea, for instance, ranged from US Dollars 65 to US Dollars 67 C&F approximately between April, 1972 and July, 1972 and from US Dollars 70 to

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			<p>US Dollars 92 C&F between August, 1972, and February, 1973), had obviously adversely affected the procurement programme and resulted in purchases at disadvantageous prices.</p>
18	1·77	<p>Deptt. of Supply Deptt. of Agriculture Chemicals & Fertilisers</p>	<p>In the opinion of the Committee, better results might have ensured had indents for the entire quantity of fertilisers, computed on a more scientific and rational basis, required during the year had been placed in advance after, of course, taking into account the prevailing market prices and the likely behaviour of the market during the following period, as this would have made for better planning and lower prices. The Committee have been informed in this connection that the Department of Economic Affairs now make a bulk allotment of foreign exchange straightaway which has enabled the Department of Agriculture to streamline and overcome some of the difficulties faced in the past in procuring fertilisers through the Department of Supply and the Minerals and Metals Trading Corporation and they trust that this would bring about the desired improvements in planning for imports and placement of demands on the purchase agencies.</p>
19	1·78	—do.—	<p>It would also be seen from a specific case of purchase of ammonium sulphate discussed later in this Report that while planning for imports of fertilisers, even the elementary precaution of building up a market buffer which could be used in times of emergency had not been taken. This combined with the unrealistic estimation of requirements and indigenous production, led to purchases at wrong seasons and at prohibitive prices on the ground that the requirements were urgent and could not be postponed.</p>

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and placed the country at the mercy of the suppliers and allowed little leverage in negotiations. The Committee were amazed to learn from a representative of the Department of Agriculture that imports were resorted to only "when the stocks had run down almost to the last tonne" which was "very well known" to the suppliers who "have exploited us year after year". Now that a decision has been taken, though belatedly, to allow a market buffer of 10 per cent and pipeline provision of 20 per cent, the Committee hope that there would be greater flexibility in making purchases keeping in view the seasonal advantages and market conditions and distress purchases at inopportune moments will be a thing of the past.

21

1979

do.

The success or failure of the import strategy also depends to very large extent on effective coordination and speedy exchange of information between the different agencies involved in planning and implementation. The Committee note that in respect of fertilisers, a multiplicity of agencies are concerned with various aspects of imports. While the Department of Agriculture is responsible for assessing requirements, prescribing material specifications and shipping schedules, and placing indents, indigenous production is monitored by the Department of Fertilisers & Chemicals, imports authorised by the Department of Economic Affairs and the actual procurement done by the Department of Supply and the Minerals and Metals Trading Corporation (with effect from 1 August 1975, however, the entire purchase of fertilisers from abroad has been centralised in the Minerals and Metals Trading Corporation). Similarly, the responsibility for marketing and distribution of fertilisers has been entrusted to the Department of Agriculture and the State Governments. It is therefore, evident that unless effective liaison and coordination are maintained between all the

agencies involved, integrated functioning would be well high impossible. Though it has been claimed during evidence that effective interministerial coordination was in fact being ensured judging from the actual performance, the Committee are of the view that a lot more requires to be done in this regard. They would, therefore, stress that a suitable system from continuous coordination and exchange of information between the different agencies involved should be devised and its actual performance kept constantly under review and timely corrective measures taken.

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1980

Deptt. of Supply
Deptt. of
Agriculture
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Consumption trends, which determine the demand, influence to a very large extent planning and strategies for the purchase and stockpiling of fertilisers. The Committee are, however, concerned to find that even though the growth of the indigenous fertiliser industry has been steady with substantial output in absolute terms and imports have also been considerable, the consumption of fertilisers in the country is still extremely disappointing and India, even after Four Five Plans, is at the bottom of the world map in fertiliser consumption with the per capita consumption in 1970-71 being only 4 kilograms. It makes distressing reading that in spite of the acknowledged role of fertilisers in augmenting agricultural production, the consumption achieved during the Fourth Plan period was consistently less than the Plan targets, and for the last two years of the Plan, Government themselves had to revise the earlier targets. Thus, as against a 27 per cent compound rate of increase per year in the consumption of fertiliser envisaged in the Fourth Five Year Plan, the actual consumption growth achieved was only 15 per cent in

1969-70 (against the growth rate of 40 per cent achieved in 1967-68), 14 per cent in 1970-71, 18 per cent in 1971-72, 4.5 per cent in 1972-73 and a meagre 0.005 per cent in 1973-74. Again, in the first year of the Fifth Plan (1974-75), even though an ambitious target of 44.26 lakh tonnes (in terms of nutrients) had been proposed, actual consumption achieved was only 25.79 lakh tonnes, which was even less than the levels achieved in the preceding three years.

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Explaining the reasons for the decline in consumption of fertilisers during this period, the Department of Agriculture have stated that while the growth consumption during the period from 1966-67 to 1971-72 had been "really remarkable", the consumption going up from 7.57 lakh tonnes of nutrients in 1965-66 to 26.21 lakh tonnes of nutrients in 1971-72, the consumption of fertilisers in 1972-73 and 1973-74 had been "seriously hampered" on account of (i) the domestic production falling "far below expectations" and (ii) non-availability and steep rise in prices in the international market, as well as increase in the cost of indigenous production (on account of increase in the cost of fuel, feed-stock and labour) leading to increase in the cultivators' prices of fertilisers. And in 1974-75, apart from the adverse impact of non-availability and rise in prices, unfavourable weather conditions, shortage of power which reduced the area under irrigation and shortage of diesel oil, aggravated the situation, resulting in less consumption than envisaged. The Committee have also been informed that "a large number of corrective steps" have already been taken to reverse this trend and that a fertiliser promotion scheme was also launched in the Fourth Plan under which a series of demonstrations were organised to encourage the use of fertilisers,

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23	1.82	<u>Deptt. of Supply</u> <u>Deptt. of</u> <u>Agriculture</u> <u>Chemicals &</u> <u>Fertilisers</u>	<p>which however has not been approved for continuance in the Fifth Plan as a paradoxical situation arose in which while Government were not in a position to provide adequate fertilisers to farmers who needed them, efforts were being made to persuade cultivators to use chemical fertilisers.</p> <p>However, now that availability of fertilisers has improved considerably and prices have also been reduced, the Committee feel that an intensive campaign for stimulating consumption should be launched. They need hardly emphasise that a major thrust in fertiliser consumption can be achieved only through sustained promotional activities and that in the interest of sound agricultural development, there should be greater awareness amongst the farmers of the role of balanced nutrition and complex fertilisers. A well thought out and properly integrated promotional approach, in which duplication and overlapping of efforts should be avoided, is also necessary to overcome the apathy of the average farmer to the use of fertilisers. As has also been pointed out by the Committee on Public Undertakings, in paragraph 5.41 of their 50th Report (Fifth Lok Sabha), the promotional programmes undertaken by the Fertiliser Corporation of India Limited should be properly dovetailed and integrated with the other promotional measures of the State Governments to avoid any overlapping.</p>
24	1.83	do.	<p>Another important aspect which needs to be kept in view while undertaking promotional activities is the identification of areas in which fertilisers can be profitably utilised. The Committee learn that six States</p>

(Andhra Pradesh, Tamil Nadu, Gujarat, Maharashtra, Uttar Pradesh and Punjab) alone accounted for over 65 per cent of the total consumption of fertilisers in the country during the period from 1970-71 to 1974-75. Accelerating the growth rate of fertiliser use should, therefore, be directed in those areas where consumption is low and also towards aiding small farmers, by making available timely credit for a package of inputs and other necessary infra-structural facilities, in taking to the use of fertilisers on a much larger scale than before. All this necessarily calls for concerted efforts and effective coordination at all levels as well as a periodical evaluation of the efficacy of the measures undertaken, and the Committee trust that timely and concentrated action would be taken in this regard.

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2.22. The normal accepted method of purchase of stores by Government purchase agencies is to invite tenders and accept the lowest offer subject to technical suitability, capability of the tenderer, etc. If necessary, the offers and other terms and conditions are negotiated with the tenderers after the opening of tenders. This method has a certain sanctity and secrecy attached to it and ensures purchases in the most competitive manner. In regard to purchase of fertilizers from abroad, however, the Committee find that while it is obligatory to make purchases made through tenders in respect of purchases made against US and Canadian Aid loans, the position in regard to other sources of purchase has varied widely from time to time. While purchases prior to 1966 were made by the Department of Supply mostly as a result of tenders, an analysis of 176 contracts relating to the period from 1970-71 to 1972-73 discloses that 34 contracts for a total quantity of 6.71 lakh tonnes for purchases against loans and credits other

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than US and Canadian Aid loans (U.K., West Europe and Japan) were placed by negotiations only and 36 contracts (11.95 lakh tonnes), 30 contracts (5.68 lakh tonnes) and 26 contracts (3.34 lakh tonnes) relating to purchases against free foreign exchange were placed respectively by negotiations, tenders followed by negotiations and by tenders. Subsequently, during 1973-74 and 1974-75, the entire quantity (19.20 lakh tonnes and 24.99 lakh tonnes) had been purchased only by negotiations. On the other hand, all the fertilizer purchases by the other procurement agency, Minerals and Metals Trading Corporation, from Rupee Payment countries against bilateral trade agreements with them were negotiated with the Government enterprises of the countries concerned.

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The Committee observe that conflicting views have been expressed in regard to the comparative advantages and disadvantages of purchases through negotiations and through tenders. While the Department of Supply have maintained that inviting tenders was not the best method of purchase and that purchases by negotiations had been found to be more suitable, the Committee have been informed by the representative of the Minerals and Metals Trading Corporation that while the methodology of purchase to be adopted was difficult to determine, a "judicious combination" of purchases by both tenders as well as negotiations depending on market conditions was considered advisable and would lead to the most economic buying, and that the selection of the method of purchase would necessarily have to depend on a judgement of the market situation at a given point of time. The Committee also understood that while

tenders are expected to establish reasonable prices and to indicate the market trend, there was no guarantee that 'rings' would not be formed between the suppliers for quoting higher than market prices and that while calling for tenders and acceptance of the lowest offer might be satisfactory in a well-organised market for a commodity the supply of which is well in balance with the demand, it was not always possible to adopt the tender system for buying fertilisers. On the other hand, the Report of the Food and Agriculture Organisation (FAO) on the State of Food Agriculture, 1973, points out that export sales are normally on tender which results in a certain amount of flexibility with smaller lots usually commanding the highest prices.

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While the Committee concede, in the circumstances, that it might perhaps be difficult to lay down any rigid norms for the methodology of purchase to be adopted, they would, however, emphasise that before deciding upon the method to be adopted in a particular situation, all the pros and cons should be carefully weighed and the method which would prove most advantageous to the country adopted. In order to safeguard against the possibility of arbitrary and *ad hoc* decisions, it would also be advisable to invariably record the reasons for adopting a particular method. The Committee also feel that it would be worthwhile to make a comparative study of the methods adopted in the past so as to determine what went wrong on different occasions, as well as those adopted by other countries like USSR and China, and see what improvements can be brought about in the present methods to obtain fertilisers at internationally competitive prices and also on an assured basis for meeting the country's requirement adequately and in time. In any case, it should be possible to maintain

strict confidentiality about the quantum of purchase of fertilisers contemplated so that when the country is forced to enter the world market as a large scale buyer, prices do not increase unnecessarily thus placing the country at a disadvantage.

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Since the methodology to be adopted for the purchase of fertilisers necessarily depends on a judgement of the market situation at a given point of time, it is absolutely imperative that the purchase agency is armed with all relevant data relating to international production trends, availability of fertilisers, behaviour of world prices, recent happenings on the world fertiliser front, etc. so as to be in a position to regulate imports in the best interests of the country. The Committee have been informed in this connection that apart from the information gathered from international journals and publications devoted to the fertiliser trade as well as from circulars received from certain international suppliers, the Department of Supply also obtained monthly reports from the Supply Missions in London and Washington and consulted the embassies in Tokyo and Washington and the High Commission in London as to the appropriate time for making purchases. It has also been stated that reports were obtained from time to time from the embassies in Kuwait, Ottawa, etc. Relevant economic information relating to market trends, prices, etc. is also understood to have been made available by the Commercial Counsellors posted at various Indian missions abroad. It, however, appears on the evidence that these are only recent developments and that prior to 1973-74, the arrangements in this regard left much to be desired and the coordination between the

embassy officials and the purchase organisation/delegations was rather unsatisfactory. As has been admitted by a representative of the Department of Supply, apart from making arrangements for the stay of the delegations, the officials of Indian Missions abroad, with the exception of Rome and Tokyo, were not of any direct concrete assistance earlier in the matter of making available commercial intelligence on a regular basis. The Chairman of the Minerals and Metals Trading Corporation also conceded that when shortages began to develop in 1972 in the international market pushing up world prices, the consequences of fertiliser availability and prices were still to be understood in India. A representative of the Department of Expenditure (who had been associated with various purchase delegations) also informed the Committee that though during 1973-74 and 1974-75, delegations were sent abroad or suppliers asked to come to India for negotiations only when the Indian Ambassadors advised that it was the proper time for making purchases, "there may have been a few exceptions in the past."

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That there was no effective channel of communication between the Department of Supply and the Indian Missions abroad for a regular and continuous exchange of information prior to 1973-74 is also evident from the fact that though instructions had been issued in 1967 to all the Indian Embassies/High Commissions abroad to furnish monthly reports, in a standardised proforma, in regard to availability of various types of fertilisers, trend of prices, etc. the requisite information had been received from a few Missions only and that too not regularly, necessitating the issue of fresh instructions on the subject by the Ministry of External Affairs in April 1973. Even thereafter, during the period from May 1973 to August

1974, while only four reports from Washington, five from Tokyo and six from Kuwait had been received, no reports had been received from London, Paris or Ottawa and it was only in June 1975 that one report had been furnished by the Indian Embassy in Paris. It also appears that during this period, the Department of Supply had not actively sought the cooperation and assistance of the Missions abroad and their inaction in this regard between 1967 and 1973 in spite of the fact that the requisite reports were not being received regularly needs to be explained satisfactorily. It is also regrettable that the question of non-receipt of reports even after the issue of fresh instructions in May 1973 had been taken up with the Ministry of External Affairs only after a lapse of nearly fifteen months, in August 1974. As this was a period when there were violent fluctuations in the international market for fertilisers on account of the general transformation of the international economy into a seller's market, adverse weather conditions, etc., the Committee feel that the timely collection of market intelligence would have ensured better planning and regulation of imports.

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All this brings into sharp focus the need for improving the system of timely collection of market intelligence and for strengthening the Commercial Wings in Indian Missions abroad. The general impression that Indian Missions abroad, with the exception of one or two large ones, are not adequately equipped to gather necessary intelligence, on a scientific basis, on a commodity like fertilisers also needs to be dispelled. The Committee have been informed in this context that efforts were being made to strengthen the Commercial Wings at five stations, raise the status

of the existing Commercial Officers at two stations and create new set-ups at eight places. While they would like to be apprised of the progress made in this regard so far, the Committee would like the officers serving in the Country's Missions abroad to be well-trained and well versed in the nuances of gathering information of commercial value and feeding it back in time to the various government agencies at home. Now that the Minerals and Metals Trading Corporation has been entrusted with the responsibility of procuring fertilisers both from the Rupee Payment Areas and General Currency Areas, the Committee expect that more effective use would be made of commercial information and market intelligence collected from various sources and the system therefor placed on a more scientific and firmer footing.

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According to a decision taken by the Committee of Secretaries on Internal Affairs in February 1971 and reiterated by the Finance Minister in May 1971 no delegation was to be sent abroad for the purchase of fertilisers and ordinarily suppliers were to be invited to come to India if negotiations were considered necessary. It had been further clarified in February 1972 that a departure from the policy of holding negotiations in India for purchases from abroad would be allowed only if in the national interest. The Committee are, however, concerned to find that the policy has been honoured more in the breach than in observance and that during the period from 1971-72 to 1974-75, as many as 15 purchase delegations of the Department of Supply and 4 delegations of the Minerals and Metals Trading Corporation had visited various countries of the world and an expenditure of nearly Rs. 6 lakhs had been incurred on these accounts. The Committee have been informed in this connection that clearance for a

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departure from the approved policy was obtained in each individual case from a screening committee, which included the Cabinet and Finance Secretaries, and that the system of sending delegations abroad had been found to be more effective for the following reasons:

- (i) This gives an opportunity to the delegation not only to meet the suppliers but also the producers, without bringing in, to the extent possible, the agents.
- (ii) Foreign teams invited to India did not always consist of the senior representatives of the suppliers and producers and, therefore, by sending Indian delegations abroad it was possible to deal directly with the senior representatives.
- (iii) By going abroad, it is also possible for the delegations to have a feel of the market.

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Whatever may be the merits of these arguments, it is a moot point whether trips abroad by such delegations on so many occasions and at considerable expense were absolutely necessary and unavoidable, particularly in 1972-73 when as many as 7 delegations of the Department of Supply were sent to various parts of the world for negotiating purchases, and whether the same results could not have been achieved by inviting the suppliers/producers to India. While market conditions could have been assessed on the basis of regular and continuous market intelligence reports, India being one of the largest purchasers of fertilisers in the world, it should have been possible to insist upon the suppliers/producers to send their senior representatives for negotiations in India. Besides, it would also be seen from a specific instance of purchase

of ammonium sulphate, which has been discussed later in this Report, that on account of the Secretary of the Department of Supply being away from the country on one such visit, negotiations with the suppliers from another country invited to India had to be postponed at a time when world fertiliser prices were rising, resulting in purchases at higher prices subsequently to the detriment of national interest. In these circumstances, the Committee have their reservations about the real utility of such visits abroad. They would, therefore, urge Government to review carefully the need for these frequent visits and approve them only after a thorough examination of their justification, which should be invariably recorded, and only on occasions when it is considered absolutely inescapable in the country's wider interest.

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What, however, causes greater concern to the Committee is the absence of any clearly defined criteria for determining the composition of fertiliser purchase delegations and the lack of uniformity in this regard. While the Committee have been informed by the Commerce Ministry that, on grounds of economy, the Minerals and Metals Trading Corporation had been sending usually only one-man delegations in the past for purchasing fertilisers and other commodities, they find that the Department of Supply have been adopting different norms at different times in regard to their delegations. Thus, while the delegation comprised of only the Secretary of the Department on one occasion (November 1971 to Japan), the Secretary had been accompanied by the Deputy Secretary dealing with fertilisers on two occasions (July 1971 and July-August 1972), by the Deputy Secretary and one representative of the Finance Ministry on seven occasions (April-May 1972, May, 1972, September, 1972, November-December, 1972, March 1973, August-September 1973 and September 1973), by the Deputy

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Secretary and two representatives of the Finance Ministry on four occasions (April 1974, May 1974, June-July 1974 and November-December 1974). Apart from informing the Committee that the composition of various delegations was duly got approved by the Fertiliser Purchases Committee, Minister of Supply and the Screening Committee of Secretaries, the Department of Supply have not been in a position to explain the criteria on the basis of which the selection of personnel for the delegations was made. The reasons for the non-inclusion of a Finance representative in the delegations sent abroad between March 1971 and January 1972 and for the inclusion of two representatives of that Ministry in the delegation sent to Japan in January-February 1973 have also not been satisfactorily explained. As regards the inclusion of the Deputy Secretary in some of the delegations, the Committee have been informed that as it was not possible for the Secretary to carry all relevant information with him and also in view of the necessity to have consultations as to how best the negotiations could be conducted, he had been included to render assistance in this regard. If this were indeed so, it is not very clear why the official, who is supposed to be "conversant" with market trends, prices, etc., had been excluded from the delegation to Japan in November 1971, which comprised of only the Secretary of the Department and also from the delegations that were sent abroad during 1974-75.

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mittee only took a decision, on the short point whether it was desirable for a purchase delegation to be sent abroad when negotiations could not take place in India and did not specify what should be the size and composition of the delegation. It would, therefore, appear *prima facie* that this question had been decided often in an *ad hoc* or routine manner. The Committee recommend that well-defined and clear-cut criteria and principles should be prescribed in this regard and the size and composition of purchase delegations determined after a most careful consideration and scrutiny and expenditure thereon kept to the barest minimum. The delegations should also comprise only of persons possessing the requisite expertise and specialised knowledge of the commodity that is to be purchased.

6 As pointed out earlier in this Report great care should be taken in planning for the import of a commodity like fertilisers, which is acutely sensitive to world demand, supply and price trends. In this context the timely and most economical procurment by availing of the best market conditions assumes importance. The Committee, however, regret to observe that in this particular case failure to anticipate the requirements of the seeding programme of a public sector undertaking and place the indent well in advance had resulted in avoidable purchases at considerably higher prices in the domestic season of the foreign country. Though it has been contended by the Department of Supply that in this particular case the payment of higher prices was inescapable as part of the quantity was required in April 1971, which happened to be domestic season of the foreign country, the Committee have been informed by the Chair-

man of the Minerals and Metals Trading Corporation that there was no harm in getting shipments during the domestic season if the contract had been concluded earlier and that while the time of procurement was important, the time of actual shipment was not very material. It has also been conceded by the representative of the Department of Supply that there was an avoidable mistake in not placing the indents well in advance so as to secure an advantage in prices.

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In this context, the Committee find that the Department of Agriculture were aware of the requirements of di-ammonium phosphate for the public sector undertaking (Trombay Unit of the Fertiliser Corporation of India) in the beginning of November 1970 itself if not earlier. Yet it was only after a lapse of 1½ months that the indent was placed, on 17 December 1970, on the Department of Supply. While the reasons for this delay need to be explained, a further delay of about two months occurred in floating the tenders. Explaining the reasons for this delay, the Department of Supply have stated *inter-alia*, that procurement action could be initiated by them only after allocation of funds, which was made by the Department of Economic Affairs on 4 January 1971, and that some delay also occurred because the Canadian Government had to be consulted about the timing of the issue of tenders. The Committee, however, find that the Supply Department had been asked by the Agriculture Department, on 17 December 1970, to initiate procurement action in anticipation so that advantage could be taken of the slack season price.

It is, therefore, amply evident that the handling of this purchase both by the Department of Agriculture and the Department of Supply has been rather unsatisfactory. Purchase at higher prices on a plea of urgency of requirement could have well been avoided in this case had the planning been done in advance and more effectively and the indents placed in time. As has been pointed out by the Fertiliser Purchase Committee, efforts should have been made for procurement well in advance so that the purchases did not clash with the domestic season, and this is especially necessary in regard to the requirements of public sector projects whose requirements can be anticipated in advance. The Committee need hardly emphasise the necessity for a well-coordinated, timely and concerted action in this regard and they expect that, benefiting from this experience, necessary steps will be taken to streamline the procedures for planning for the import requirements of public sector projects. The Committee would like to be apprised, in some detail, of the remedial measures already taken or contemplated.

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Incidentally, the Committee note that copies of market intelligence reports from Indian Missions abroad are also sent to the Department of Agriculture and it should have, therefore, been possible for that Department to have made use of these for placing the demands at the proper time taking into account the market trends. That this was not done in this case would indicate that little or no use is made by the Department of the market intelligence received by it. As the agency mainly responsible for ensuring that fertilisers are procured and made

available on time and for coordinating various activities in this regard, the Department should also constantly monitor the behaviour of the market, availability, etc., and not leave it entirely to the procurement agencies.

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2.119

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Deptt. of Agriculture

The Committee are concerned to note that in this case, as a result of failure to make a proper and timely estimate of the requirements of ammonium sulphate and consequent postponement of imports till the stocks were exhausted, distress purchases of below-specific action fertiliser at higher prices than those prevailing in the market had to be resorted to on a plea of urgency. They find that while the original import programme for 1971-72 provided for the import of a total quantity of only 1.70 lakh tonnes (1 lakh tonnes from Japan and 0.70 lakh tonnes from West Europe), the final requirements intimated to the Department of Supply in May, 1971 were more than two and a half times the requirements initially computed. Admittedly, no demand had been projected for this fertiliser on the Department of Supply in 1970 and, in fact, no purchase of ammonium sulphate was effected from the United States (where the f.o.b. price was only 2 dollars per metric tonne in 1970 as against the prices of 13.25 dollars per tonne and 14.80 dollars per tonne paid in August, 1971 and September, 1971 for purchases of ammonium sulphate from West Europe and Japan respectively) after July, 1969 till the present proposals were finalised in May, 1971. The representative of the Department of Agriculture also conceded during evidence that the purchase strategy had been seriously affected in the absence of a market buffer and pipeline provision and that

they always tried to get their imports "when the stocks had run down almost to the last tonne" which was "very well known" to the suppliers who "have exploited us year after year." That such a situation should have been allowed to develop in spite of the fact that ammonium sulphate is known to be a preferred variety of fertiliser among the farmers is puzzling, to say the least. Even if the elementary precautions of taking into account the quantities in the pipeline and of building up of a market buffer had not been taken, the Committee fail to appreciate why the downward trend in prices of ammonium sulphate during 1970 had not been taken into account by the Departments of Agriculture and Supply and timely purchases at advantageous prices resorted to. The reasons for postponing purchases till the stocks were exhausted have also not been satisfactorily explained. It would, *prima facie*, appear, and this has also been pointed out in no uncertain terms by the Secretary, Department of Expenditure, that there was something radically wrong with our planning and procurement of fertilisers which placed us at the mercy of the suppliers and give us little leverage in negotiations.

The Committee find that even after the requirements of ammonium sulphate had been intimated to the Department of Supply, there was a difference of opinion between the Secretary, Department of Supply and the Ministry of Finance about the strategy to be employed for this purchase. While the Department of Supply wanted to send a delegation to West Europe for the purpose before holding negotiations with the Japanese suppliers whose prices were generally higher so that purchase from them did not push up the West European prices, a policy decision had been taken that instead of sending delegations abroad, quotations should be invited

and the suppliers requested to come to India for negotiations, if necessary, as such a method would facilitate prior consultation and approval within Government and generally result in better terms of purchase. Accordingly, offers had been invited from an organisation (Nitrex, Zurich) representing most of the West European producers of nitrogenous fertilisers and from whom bulk of the purchases from West Europe were regularly made, on 15 June 1971 and while communicating their offers by telex on 22 June 1971, Nitrex had also stated that their delegation would be ready to visit India at short notice in case the Indian purchasing mission was unable to visit the suppliers in Europe. This had been followed up by another message received on 29 June 1971 wherein Nitrex had stated that their delegation would be arriving on 7 July 1971. Yet, strangely enough, a proposal made by the Department of Agriculture that urgent action to meet emergent requirements should be taken by sending a delegation to Japan appears to have been approved a day later, on 30 June 1971, in spite of the fact that it was known by then that Nitrex were willing to come to India on 7 July 1971, resulting in the postponement of negotiations with the West European suppliers till August 1971, by which time Nitrex had increased their price to 13.50 dollars (f.o.b.) per tonne (as against the earlier June offer of 13 dollars per tonne) on the ground that they were completely sold out and even had to refuse an offer of 20 dollars from Brazil.

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The Committee are unable to understand why the lower offer of Nitrex for ammonium sulphate was not clinched in July itself especially when the foreign suppliers themselves had agreed to come to India for negotiations.

It would, *prima facie*, appear that these negotiations had to be postponed, much to the country's disadvantage, only on account of the Secretary of the Department of Supply having to proceed to Japan for emergent purchases of ammonium sulphate. It is surprising, to say the least, that the negotiations could not have been conducted as scheduled by other responsible Government officials, even if it had been considered absolutely inescapable for the Secretary to proceed to Japan. It is also significant that the suppliers themselves had pointed out, when negotiations were ultimately held with them in August 1971, that had the negotiations been held even as late as in July 1971, they would have been able to supply the full quantities of fertilisers required and that it would also have been possible to negotiate "substantially better prices". In these circumstances, the Committee have to regretfully conclude, despite all protestations to the contrary, that this deal had been handled in a thoroughly unsatisfactory manner and that the then prevailing trends in the international fertiliser market had not been properly taken note of and utilised to the country's advantage.

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It has, however, been contended by the representative of the Department of Supply that as a result of a 'Package deal' for ammonium sulphate, urea and CAN negotiated with Nitrex in August 1971, while the price of ammonium sulphate was increased by 25 cents per tonne, a reduction of 4.10 dollars and 15 cents per tonne had been obtained respectively for urea and CAN and that there was thus an overall saving of 157,030 dollars from the deal as against the higher price of 10,000 dollars paid for 0.40 lakh tonnes of ammonium sulphate. The Committee, however, find that while submitting their quotations, on 22 June 1971, for these three varieties, of fertilisers, Nitrex had not specifically stipulated that the offer should

be treated as a package. Besides, it would also appear from the evidence made available to the Committee that even the initial offer of 13 dollars per tonne in respect of ammonium sulphate had little or no relevance to the market trends then prevailing. Admittedly, there was a downward trend in the prices of nitrogenous fertilisers at that time (June-July 1971) and in fact, the Secretary of the Department of Supply had also gone on record, during negotiations with the Japanese Suppliers in July 1971 that the price quoted by Nitrex was only an initial offer and that "he was confident that he would be able to get a reduction of at least \$4 to \$5 when negotiations were held with Nitrex." It is also significant in this context that Nitrex themselves had stated at one stage of the discussions subsequently held in August 1971 that had the purchase been negotiated in July, it would have been possible for the suppliers to sell the material at 7 dollars per tonne, the price at which ammonium sulphate had been sold to the United Arab Republic. Similarly, even in respect of urea which subsequently formed part of the package deal offered by Nitrex, the Secretary of the Department of Supply had observed in a note dated 25 June 1971, that the price of 59.60 dollars per tonne (f.o.b.) quoted by Nitrex was not in keeping with the then current world prices of urea. It is, therefore, amply evident that the suppliers had kept a cushion in their initial quotations and had successfully exploited the country's helplessness to their advantage and the Committee are unable to accept the Department's contention in this regard.

Admittedly, even in respect of the purchases made from Japan in August 1971 at 14.80 dollars per tonne (f.o.b.) the Japanese suppliers evidently took advantage of the urgency of the Department of Agriculture for ammonium sulphate, even though a reduction in price was also indicated by the general downward trend in prices of straight nitrogenous fertiliser. That the Japanese prices bore no relation to the prevailing international prices is also evident from their subsequent sale in November 1971 (when world fertiliser prices had started rising) at 14.15 dollars per tonne (f.o.b.) against the price of 14.80 dollars per tonne (f.o.b.) accepted only three months earlier. What is even more disconcerting is the fact that the acidity of the ammonium sulphate purchased from Japan was much more than that provided in the standard specifications (0.25 per cent as against 0.025 per cent specified) which necessitated precautions being taken to prevent absorption of moisture during transit and at the time of unloading. In regard to the acceptance of below-specification supplies, the Committee have been informed that it was felt that there would be no harm in accepting such supplies on account of the considerable price advantage offered. While this argument could perhaps be put forward in respect of the quantity of 1.36 lakh tonnes purchased in November 1971 at a price of 14.15 dollars per tonne (f.o.b.) when world prices had started rising, the Committee cannot, however, understand the rationale for accepting in August 1971 below-specification supplies at prices which were admittedly considered commercially higher. Besides, it is also not clear what precautions were taken to prevent damage to the fertilisers and bag rot after their receipt in India, particularly at the storage centres and distribution outlets. The Committee would, therefore, seek more specific clarifications in this regard and would like to be informed

urgently whether any complaints were received after the fertiliser had been cleared from the port and till it had actually been sold and used in the field.

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It would also appear that in spite of having gone in for emergent purchases at high prices, the fertiliser was not available in adequate quantities when it was actually required. Though the Department of Agriculture had indicated that they would require two lakh tonnes of ammonium sulphate by October 1971, orders only 0.41 lakh tonnes could be placed by August 1971 and a further quantity of 0.77 lakh tonnes ordered in September 1971, leading to further purchases to cover the balance demand only in November 1971 actual shipments being completed only by March 1972. Besides, as would be seen from the discussions in the subsequent section of this Chapter, the supplies against the orders for 0.37 lakh tonnes placed on an Italian supplier at the same price as in the case of orders placed on Nitrex (13.25 dollars for tonne) commenced only as late as in October 1972 on account of delay in completion of various formalities. Admittedly, the time available was too short "to carry out meaningful discussions with the Japanese suppliers who sensing the quantum and urgency of the requirements, exploited the situation to their advantage.

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This case, therefore, brings into sharp focus a number of glaring deficiencies in the planning and procurement of fertilisers and emphasises the need of evolving a more foolproof strategy. As has been rightly pointed out by the Secretary, Department of Expenditure, there could be better advance planning of requirements and also more confidential handling of

purchases without making the urgency of our requirements known to the suppliers. The Committee note in this connection that the Secretary, Department of Expenditure, as well as the Secretary, Department of Supply had analysed the causes that led to the unsatisfactory situation in the present case and had suggested a number of remedial measures for the future. Action was also to be initiated by the Department of Agriculture on the suggestions of the former and a paper prepared for discussion before the Cabinet Secretary. It, however, appears on the evidence, that some concrete steps, like a more realistic assessment of requirements, building up of a buffer stock, timely placing of indents, etc., have been taken only as late as in 1975. The Committee would, therefore, like to be informed in detail of the specific steps taken in pursuance of the suggestions of the Secretary, Department of Expenditure between August 1971 and June 1975, especially in the context of the rising trend in world prices of fertilisers coupled with non-availability during this period, and to ensure that procurement was made before conditions of scarcity developed and a situation, as in the present case, in which the country had to yield to the dictates of the suppliers was avoided.

The Committee regret to note that as a result of the delay of nearly a year in completing the necessary payment formalities for making purchases against Italian Suppliers Credit (obtaining approval of the Italian Government, arranging advance payments to the supplier, opening of Letter of Credit, etc.), supplies of ammonium sulphate, orders for which had been placed on grounds of urgency in September 1971 and required by Novem-

ber 1971, could commence only in October 1972, thereby dislocating the procurement programme. Besides, on account of the increase in the C&F cost of the fertiliser following the considerable increase in the freight rates in the meantime, only 0.32 lakh tonnes as against 0.37 lakh tonnes initially contracted for could be procured, which must have obviously affected availability of the fertiliser for the country's agricultural production programmes. While the Committee are not unwilling to concede that some of the delay might be attributable to factors beyond the Indian Government's control, they cannot, however, help feeling that the time taken for the completion of the formalities in this case was somewhat abnormal. They are also of the view (after an analysis of the chronological sequence of various events relating to this purchase) that much of the delay could well have been avoided by more effective coordination between the agencies involved and better follow-up action, particularly when it was not unknown that among all credits the Italian credit involved the most cumbersome procedures in the context of earlier purchases made from Italy. For instance, the Committee find that though the Italian firm's offer had been accepted on 25 September 1971, the contract was issued by the India Supply Mission, London, only on 17 November 1971, and amendments to the contract issued respectively on 1 March 1972 and 1 April 1972. There also appears to have been some dispute over the rate of interest payable which took over five months to be resolved. It is not clear to the Committee why this question could not have been settled in September 1971,

itself, when the terms and conditions of the offer must have presumably been gone into before acceptance thereof, and why it should have taken nearly two months for the Department of Economic Affairs to ask the Department of Agriculture, on 12 November 1971, to "consider in depth" whether they would agree to the increased rate of interest of 6 per cent as against 5.8 per cent charged in the earlier contracts under credit. Action to obtain the Italian Government's approval also appears to have been initiated only as late as in May 1972 and it required further protracted correspondence between the Departments of Agriculture and Economic Affairs and the Indian Embassy in Rome before the necessary approval was obtained on 4 July 1972. What is more surprising is the fact that even after all the formalities had been completed after a considerable lapse of time, further delay should have occurred on account of the Letter of Credit being opened in a wrong bank .

This case, therefore, underlines the need for streamlining and rationalising the procedures with a view to eliminating avoidable delays in the completion of formalities relating to purchases from abroad. The Committee note in this connection that the question of simplification of procedures in respect of Italian credits was discussed with officials of the Department of Economic Affairs on 13 April 1972, who had then advised that there was no immediately solution to the problem of Italian Suppliers Credit and that meaningful discussions with the Italians could be held only after the Italian elections in June 1972. They would, therefore, like to know whether these discussions were held subsequently and if so, what specific steps were taken in this regard. The Committee would also like Government to undertake a selective case study of purchases from various countries with

a view to assessing the time taken at various stages from the placing of the indent to the commencement of supplies and determining what improvements could be effected in the procedures for the processing of purchase proposals. An attempt should also be made to eliminate all non-essential stages and to reduce the time taken for processing the proposals as each stage. The Committee would like to be informed of the measures taken in pursuance of these recommendations and the improvement actually effected.

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2-142

Deptt. of Supply
Deptt. of Agriculture

This is yet another instance of lack of foresight in planning for imports and of failure to initiate timely action for procurement from abroad after taking into account the developments on the domestic as well as on the international fertiliser front. The Committee are perturbed to note that considerable delay had occurred at various stages in arranging for the imports of fertilisers to meet the requirements of Kharif 1972 and Rabi 1972-73, resulting in the postponement of purchases till the already depleted stocks had reached "a dangerously low level". To begin with, the Committee find that even though the fertiliser requirements for Kharif 1972 and Rabi 1972-73, to which the present purchase of urea related, were finalised on 4 November 1971 itself and had also been communicated to the Department of Economic Affairs on 6 November 1971, it was only a month later, on 7 December 1971, that a working group was constituted by the Committee of Economic Secretaries for making a fresh assessment of the fertiliser supply position *vis-a-vis* demand. While on the recommenda-

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tions of the working group (13 December 1971), the Department of Economic Affairs authorised, on 30 December 1971, imports of 7.5 lakh tonnes of urea from Rupee Payment Areas and released foreign exchange of 47 million dollars for these imports as well as imports of other fertilisers from Rupee Payment Areas and the Minerals and Metals Trading Corporation was also asked to procure at least 3 lakh tonnes of urea to reach India before the end of May 1972, it took another six weeks for the release of free foreign exchange for purchases from General Currency Areas and placing indents therefor on the Department of Supply. It appears that this delay was on account of the Committee of Economic Secretaries asking the working group to do a complete review of the demand. However, as has been pointed out earlier in Chapter I of this Report (*vide* paragraphs 1.63 and 1.64), the outcome of this elaborate exercise was not very much different from the projection made earlier, in October 1971, by the Standing Committee on Fertilisers of the Department of Agriculture. It is also seen from the report of this working group, that the import requirements for 1972-73 had been worked out by the Group on the assumption that the indigenous production of nitrogenous fertilisers would amount to 14 lakh tonnes of nutrients as estimated by the Department of Fertilisers and Chemicals even though the Department of Agriculture appear to have expressed reservations about these estimates. (As against these estimates, actual indigenous production of nitrogenous fertilisers during 1972-73 amounted to only 10.60 lakh tonnes of nutrients). It should have also been apparent even before 7 March 1972 when the Minerals and Metals Trading Corporation formally intimated that they would not be in a position to procure more than 70,000 tonnes of urea by June 1972 against the earlier estima-

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tion of 3 lakh tonnes, in view of the fact that though it had been estimated in December 1971 that 7.5 lakh tonnes of urea would be available from Rupee Payment Areas, only a quantity of 4.5 lakh tonnes had been agreed upon in the trade plans actually concluded. Besides, it should have been possible, by timely collection of market intelligence, to anticipate that, on account of adverse weather conditions in Europe in the beginning of 1972 and the consequent upsurge in demand for fertilisers in East and West Europe, the quantities actually available in the international market would be far less than the initial estimates made in this regard.

49 2-143 Deptt. of Supply
Deptt. of Agriculture

The Committee are, therefore, of the view that these factors should have been adequately taken note of and arrangements made to enter the market as expeditiously as possible. It is, however, fairly obvious, that the developments on the international fertiliser front in the beginning of 1972 had not been properly understood in India and that timely remedial measures were not taken in the context of the likely shortfalls in the indigenous production and in the scheduled imports from Rupee Payment Areas. That such a situation should have been allowed to develop in spite of the existence of a high level Fertiliser Purchases Committee for coordinating imports is regrettable. The Committee would urge the Fertiliser Purchases Committee to have a firmer grip on the import programme and assess its progress continuously so that timely remedial action could be taken in the event of a likely setback to the scheduled imports from any country on anticipated steep increase in prices or shortfalls in indigenous production. This case also points to the need for improving the machinery for the timely

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collection of market intelligence on production and price trends in the international market and other factors likely to have an impact on availability of fertilisers. In this connection, the Committee would invite attention to their observations/recommendations contained in paragraphs 2.44 to 2.46 of this Report.

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2-148

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The Committee are concerned to note that in this case after having rejected in May 1972 an offer for NPK grade 15-15-15 at 64.45 dollars per tonne (C&F) on the ground that its moisture content was 2 per cent instead of the stipulated 1.5 per cent and only part of the phosphorus was in water soluble form (which, therefore, made it unsuitable for the seeding programme for which it was required), a revised decision had been taken only two months later, in July 1972, not on any fresh technical consideration but on account of shortage of fertilisers, to accept NPK of the specification rejected earlier for distribution to the cultivators for general agricultural purposes, and that the postponement of this purchase resulted in an extra expenditure of 86,900 dollars (about Rs. 6.52 lakhs). Explaining the reasons for not accepting this fertiliser in May 1972, the Department of Agriculture have stated that NPK fertilisers were not normally imported, on account of their being dilute fertilisers, unless they were required for the seeding programme of specific manufacturers or when other higher analysis varieties of nitrogenous and phosphatic fertilisers (e.g. urea, di-ammonium phosphate, etc.) were available and that in the instant case, they were not aware in May 1972 of the difficulty in obtaining higher analysis fertilisers. According to the Department, a situation developed in the second half of 1972, when the availability of nitrogenous and phosphatic fertilisers had become more difficult and whatever fertiliser was avail-

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able had to be accepted after consulting the State Governments to meet their demands.

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Deptt. of Agriculture

The Committee, however, find that the market reports received from the India Supply Mission, London, had indicated that shortages of phosphatic fertilisers had begun to develop from the middle of 1971 itself, if not earlier and that their prices in the international market were also known to be on the increase. It would also appear from the discussions in the preceding section of this Report, relating to the purchase of urea in the beginning of 1972, that the Department of Agriculture had been aware in February 1972 itself, if not earlier, that the stocks of fertilisers with the State Governments were getting depleted and a scarcity situation was developing. Besides, on 7 March 1972, it was known to the Department that there would be a heavy shortfall in imports from the East European countries by the Minerals and Metals Trading Corporation and that alternate arrangements would, therefore, have to be made. In these circumstances, the Committee are unable to accept the Department's contention and are of the view that prudent use had not been made of the information already available with the Department and adequate steps had not been taken to regulate imports in the best interest of the country. They are inclined to take a serious view of this failure and would urge fixation of responsibility therefor.

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2-163

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The Committee observe that though the Fertilisers and Chemicals Ltd., Travancore, had intimated their requirements of seeding material for the

year 1972-73 as early as on 21 July 1971 and the material was also required for use during the Kharif 1972 season, a firm demand for the purchase of NPK grade 15-15-15 for the purpose had been placed only nine months later on 14 March 1972, owing to the "very tight foreign exchange situation" at that time and the consequent necessity to give preference first to the imports of fertilisers required by the State Governments for their agricultural production programmes. As a result of this delay, apart from paying higher prices for the purchase subsequently on the ground that the requirement of FACT was "also of an urgent and pressing nature" in view of the factory's obligation to the World Bank, the fertiliser could also be shipped only in September 1972 (although it was required in June and July 1972) and could be put to use for the seeding programme of the factory only during the Rabi 1972-73 season. Since the requirement of FACT had admittedly been intimated in July 1971 itself and its urgency should also have been known by then, it is not clear to the Committee why by proper planning this requirement could not have been included in the import programme for 1970-71, when availability of fertilisers was comparatively easier and prices were also lower. The Committee find in this context, from the information furnished in this regard by the Department of Supply that considerable quantities of NPK fertilisers had, in fact, been ordered during November 1971 at prices ranging between 72.15 dollars and 73.14 dollars (C&F) and they would, therefore, seek a more specific clarification in this regard. The delay of over a month between 11 February 1972, when the Department of Economic Affairs informed the Department of Agriculture that the seeding material requirements of FACT should be accommodated within the foreign exchange allocations already

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made, and 14 March 1972, when the firm demand was placed on the Department of Supply, also needs to be explained more satisfactorily.

This particular case also appears to indicate that higher prices have to be paid for purchase financed out of loans as compared with the prices paid for purchases in free foreign exchange. Though the Department of Supply have informed the Committee in this connection that generally, by and large, there was not much difference in prices between purchases made on credit and those in free foreign exchange, they have, however, added that while most of the credit purchases were confined to the source country, there was no doubt that a global tender under free foreign exchange might result in an advantageous purchase from the point of view of prices. A similar position also appears to hold good in respect of purchases of fertiliser plant equipment and the Committee understand that there have been some cases where higher amounts have been paid for credit purchases. It has, however, been brought to the Committee's notice that even if prices which are marginally or reasonably higher have to be paid for credit purchases, Government would still prefer purchases against tied credit on account of the need to conserve the country's scarce foreign exchange resources and that while Government bears in mind the possible price differential in making purchases against credit and in free foreign exchange, necessary steps are always taken, when for any reason substantial variation is found, to ensure that the country was not a loser in the process. While the Committee note that assurance given in this connec-

tion that the decision whether a particular purchase should be made against credit or in free foreign exchange was taken after considering the merits of each individual case and that in planning for the purchases of fertilisers, involving as it does large amounts of foreign exchange, a "judicious mixture" of credits, rupee payment arrangements and free foreign exchange was employed after striking a balance between optimum procurement and the least strain on Government's resources, they nevertheless feel that a critical study of the entire question, in all its aspects, with particular reference to the present comfortable position of foreign exchange reserves so as to effect the desired improvements should be undertaken in the purchase strategy in the broader national interest. The Committee would like to be informed of the action taken in pursuance of this recommendation within three months.

54 2-165 -do-

The Committee are informed that as a specific experiment traders for the supply of plant and equipment for the Trombay V project have been invited on a dual basis, one based on the availability of free foreign exchange and the other based on tied credits from France and UK which would indicate whether the package based on tied credit was in fact substantially higher-priced than the other. They would like to be apprised of the outcome of this experiment as well as the conclusions drawn by Government therefrom.

55 2-166 -do-

The present case of purchase of NPK commented upon by Audit as well as the preceding two cases of purchase of urea and NPK also appear to indicate that the present system in which tenders/enquiries are floated periodically after every few weeks has not led to imports on an assured

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basis and at the most economic prices. The Committee need hardly point out that India being the single largest buyer of fertilisers in the World market, it should be possible to devise most suitable import arrangements, after careful study, which would ensure timely imports at most competitive prices of fertilisers of the requisite quantity and chemical properties. The Committee would like to be informed of the action taken.

56 2.167 Deptt. of Supply
Deptt. of Agriculture

The Committee have also been informed by the Chairman of the Minerals and Metals Trading Corporation that there was indication of tremendous possibilities of imports from the East European countries and that long-term purchases could be made from them under 5-year trade plans. It should be possible to persuade producers/suppliers in the General Currency Areas also to have the similar long-term arrangements in the interest of ensuring that imports are made on an assured basis and at the most competitive prices for meeting the country's fertiliser requirements adequately and in time.

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57 2.180 -do-

The Committee are surprised to note that somewhat unusual procedures had been adopted in these two cases of purchase of di-ammonium phosphate. While in the first case relating to purchases made during August-September 1972, apart from increasing the quantity to be purchased from 1 lakh tonnes to 3 lakh tonnes after the offers had been considered and post-tender negotiations had also been concluded, the negotiations had been conducted not only with those suppliers who had initially responded to the tender enquiry but also with two other firms

(Interore Occidental and Mitsui/National Phosphates) who had not quoted against the original enquiry and no uniform date or time for submission of revised/new offers had also been prescribed. In the second case of purchase (January 1973) for some inexplicable reason, an unusual stipulation that there would be negotiations on receipt of the offers had been included in the tender enquiry itself.

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Explaining the reasons for increasing the quantity to be procured when the offers were under consideration, the Department of Agriculture have stated that the foreign exchange of 5 million dollars initially authorised by the Department of Economic Affairs was adequate only for the purchase of 0.50 lakh tonnes of di-ammonium phosphate and 0.50 lakh tonnes of ammonium phosphate in respect of which tenders were invited in July 1972, (this had been revised later to 1.00 lakh tonnes of di-ammonium phosphate only by the Fertiliser Purchase Committee on 17 August 1972), and that when additional foreign exchange was authorised subsequently, they had informed the Fertiliser Purchase Committee that they would have no objection if quantities in excess of 1 lakh tonnes could be purchased. It, however, appears from the sequence of events relating to fertiliser purchase during 1972-73, which have been discussed in some detail in the earlier sections of this chapter, that though the foreign exchange of 5 million dollars had been authorised by the Department of Economic Affairs on 30 December 1971 and additional foreign exchange of 46 million dollars and 15 million dollars had been made-available respectively on 31 January, 1972/4 February, 1972 and 14 March, 1972, the increased requirements had been communicated only on 29 August, 1972. It is, therefore not very clear to the Committee,

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why procurement action could not have been initiated in respect of the entire quantity of 3 lakh tonnes earlier than July 1972. Even if some delay in this regard had been inescapable, at least the additional demand could have been placed in July 1972 itself, if not earlier, when tenders for 0.50 lakh tonnes were invited. It is also significant in this context that in March 1972, the ruling domestic price of di-ammonium phosphate ranged between 71 dollars and 77 dollars per tonne f.o.b. in USA and was 85 dollars per tonne f.o.b. in Canada as against the lowest offers of 92 dollars per tonne f.o.b. and 93.45 dollars per tonne f.o.b. obtained respectively from Canadian and US suppliers in August 1972. It would, *prima facie*, appear that by better planning and market intelligence and by more effective coordination between the Department of Agriculture and Supply, it should have been possible to place demands for the entire quantity *ab initio* and also to expedite the procurement action so as to take advantage of the more favourable market conditions prevailing earlier. Besides, in view of the fact that normally smaller quantities command higher prices and the larger the quantity the more competitive the offers would be, this might have also resulted in better offers than what were obtained by resorting to piece-meal purchases. Stressing, therefore, once again the importance of proper planning of imports, the Committee would urge the Department of Agriculture to streamline the procedures in this regard.

The Department of Supply have sought to justify the decision to hold negotiations with the suppliers after the opening of the tenders on the ground that the adoption of such a procedure for the purpose of reducing the price was not "altogether unusual" and was resorted to even by the Directorate General of Supplies & Disposals if the general level of quotation was very high. The Committee are, however, unable to appreciate the rationale for accepting without negotiations the offer of 103.50 dollars per tonne (C&F) quoted by three of the firms, which was also considerably higher than the prices prevailing earlier and confining the negotiations only to the balance quantity of 68,900 tonnes (1 lakh tonnes minus 31,100 tonnes ordered on three of the firms). If at all the quotations had been considered high, the logical course would have been to negotiate with all the suppliers. The reasons for accepting the subsequent offers of two firms who had not responded initially to the tender enquiry are also not easy to understand. In this connection, the Committee find from the minutes of the meeting of the Fertiliser Purchase Committee held on 17 August, 1972 and the notes dated 1 September, 1972 in the relevant file of the Department of Supply that the post-tender negotiations for the balance quantity of 0.69 lakh tonnes were to be held only with those suppliers who had quoted in response to the original enquiry and that the offers of these two firms had not been referred to the Fertiliser Purchase Committee but had been approved at the level of the then Secretary, Department of Supply.

In the absence of any recorded reasons, the Committee have also not been able to satisfy themselves about the reasonableness of the ceiling of

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111.50 dollars per tonne (C&F) decided upon by the Fertiliser Purchase Committee on 29 August, 1972.

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2-184

Deptt. of Supply
Deptt. of Agriculture

Similarly, in respect of the second case of purchase, the Committee find that at the meeting of the Fertiliser Purchase Committee in January 1973, the Secretary (Supply) read out a cable received from ISM, Washington, in which the Director General had advised that purchase of Di-Ammonium Phosphate (DAP) should be by floating a tender. Shri Ramachandran, the then Chairman, Minerals and Metals Trading Corporation, mentioned that it had come to his knowledge that some firms had cornered the stocks. Some firms had also advised him that while they would be prepared to enter into negotiations, they were reluctant to quote against a tender. Secretary (Supply) had stated that he had also received overtures and indications had been given to him that if a tender was floated, very high prices would be quoted. The Committee note that the Fertiliser Purchase Committee thereupon decided that instead of floating a public tender, all the known firms should be invited to submit offers which could be followed by negotiations. To a specific enquiry of the Committee as to at what level the decision was taken to incorporate the stipulation that negotiations should be entered into on the receipt of the offers, the Department of Supply have stated that "this was done with the approval of the Secretary (Supply) and Financial Adviser (Supply Wing)". Even conceding that this decision was justified in view of the then prevailing situation, the Committee consider it strange that, as decided by the Secre-

tary (Supply)/Financial Adviser, this stipulation should have been made known to the suppliers in the tender enquiry itself by the Department of Supply. Admittedly, since the tender had indicated the possibility of post-tender negotiations, the tenderers had kept a cushion in their quotations. This is also borne out by the fact that while rates ranging between 102.00 dollars and 109.80 dollars per tonne (f.o.b.) had been quoted against this enquiry, prices ranging between 99.50 dollars and 106.28 dollars per tonne were quoted against tenders floated by another foreign country about that time (February 1973).

62 2-185 -do-

Since the manner in which these two purchases were handled has given rise to serious misgivings in their mind, the Committee desire that Government should conduct a thorough probe into these cases with a view to ensuring that no *mala fide* intentions were involved. Lessons should also be drawn for the future and necessary improvements brought about in the purchase strategies and procedures.

63 2-92 -do-

The Committee note that though the purchase of sulphate of potash required for use in the tobacco season commencing in September-October 1973 was to be made in free foreign exchange and there was also adequate time for making the purchase with the stock position being comfortable, a contract for 5,000 tonnes had been placed after negotiations with only one foreign supplier. Instead of obtaining competitive rates through tenders. It has, however, been contended by the Department of Supply that an advertised tender enquiry would not have yielded any better results in view of the fact that all the four manufacturers of sulphate of potash in Europe (located in France, Germany, Belgium and Italy) were represented by one single selling agent (Potash Fertilisers Ltd., London) and

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that if an offer of the fertiliser from one of the countries was submitted by the agent, the presumption was that the other countries did not have any material to offer. Such a presumption without actually testing the market or verifying the actual position does not appear to be prudent and the Committee would, therefore, like to know whether in fact any independent enquiry in this regard was made by the Department of Supply through the Indian Missions abroad or from the producers themselves and if so what was the response thereto.

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2.193

Deptt. of Supply
Deptt. of Agriculture

Since the selling agent appears to have a complete monopoly of sales of sulphate of potash and could, therefore, dictate his own terms and conditions, the Committee see no reason why Government cannot deal directly with the producers thus eliminating the middleman agent and ensure better terms, as has already been recommended by the Committee in paragraphs 1.60 and 1.61 of their 160th Report (Fifth Lok Sabha). Now that all imports of fertilisers, both from Rupee Payment and General Currency Areas, have been entrusted to the Minerals and Metals Trading Corporation, the Committee would like concrete steps to be taken in this regard. Besides, with a view to reducing our dependence on imports of potassic fertilisers, efforts should also be directed towards finding newer methods of potash recovery from all available sources within the country.

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The Committee regret to note that purchases could not be made against certain attractive offers for the supply of ammonium sulphate received in the later half of 1972 and the first half of 1973 mainly on account of

paucity of foreign exchange at the relevant time, and that when purchases were subsequently made possible on release of additional foreign exchange by the Department of Economic Affairs in June 1973, only lesser quantities at considerably higher prices could be procured. Though it has been contended by the Department of Supply that the offers earlier received by them could not be considered as the necessary funds required for the purchase of dilute fertilisers like ammonium sulphate, CAN, etc. had not been made available, the Committee find that some concrete steps to press for the allocation of additional funds had been taken by the Department of Agriculture only on 9 May 1973 when this question was taken up with the Cabinet Secretariat in spite of the fact that the decision to import suitable varieties of dilute fertilisers to meet the shortfalls in the procurement of higher analysis nitrogenous fertilisers by the Minerals and Metals Trading Corporation had been taken by the Committee of Economic Secretaries on 4 January 1973 itself. That the imports from East European countries would be far less than estimated earlier had also become evident as early as in June 1972 itself. Besides, as has also been pointed out earlier in paragraph 2.142, it should have been possible to anticipate the shortage of fertilisers in the international market and take timely remedial measures. It is unfortunate that proper advantage was not taken of the offers received and expeditious action taken to process the case for allocation of additional funds for the purchase of dilute fertilisers. Now that the procedure for the allocation of foreign exchange for imports of fertilisers are stated to have been streamlined, the Committee expect that purchases from abroad would be planned properly

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keeping in view the world market conditions and instances such as have been highlighted by Audit would not recur.

66**2.212**

Deptt. of Supply
Deptt. of Agriculture

The Committee note that though Government had been reluctant to import dilute fertilisers like calcium ammonium nitrate and ammonium sulphate on the ground that the cost of such fertilisers per unit of plant nutrient was higher than that of urea (which is a concentrated fertiliser) and had also reiterated, on a number of occasions since 1970, that the use of calcium ammonium nitrate should be discouraged and substituted by urea, considerable quantities (17.44 lakh tonnes) of calcium ammonium nitrate had been imported during the period 1969-70 to 1975-76. It has been stated by the Department of Agriculture that while the entire imports during the period from 1969-70 to 1972-73 were against gifts and credits (including purchases against credit from Rupee Payment Areas in terms of bilateral trade agreements), imports against free foreign exchange had to be resorted to in the subsequent periods on account of acute shortage and non-availability of other high analysis nitrogenous fertilisers all over the world and that efforts were being made to keep the imports of CAN as low as possible. Now that the availability of fertilisers in the international market has improved considerably and other measures like lump-sum release of foreign exchange, building up of buffer stocks, etc. have been taken to ensure better planning of purchases from abroad, the Committee trust that the need for distress purchases of calcium ammonium nitrate would be altogether eliminated.

67 2-213 -do-

In this connection, the Committee find that of the total quantity of 17.44 lakh tonnes of calcium ammonium nitrate imported during this period, only 1.24 lakh tonnes had been received as gifts and 1.94 lakh tonnes purchased in free foreign exchange and that bulk of the imports (14.26 lakh tonnes) were against credit. The Committee are doubtful whether it was advisable to have utilised the scarce credit facilities made available by foreign governments for the purchase of low analysis fertilisers at higher prices, in terms of nitrogen, particularly till 1972-73 when other varieties of high analysis fertilisers were easily available. While they would like to know the reasons therefor, they would also urge Government to ensure that as far as possible only high analysis fertilisers are purchased against credit.

68 2-214 -do-

Another reason for the continued imports of calcium ammonium nitrate is stated to be the Indian farmer's preference for it and it appears that the promotional work done in this field by an European concern has contributed in no small measure to this situation. While the Committee note that the foreign concern has now stopped its promotional work and a number of steps have also been taken to wean away farmers from the use of dilute fertilisers, they are of the view that a lot more still needs to be done in this regard. They would like Government to review urgently the adequacy of the steps so far taken in this direction and take necessary remedial measures. Greater emphasis should also be laid on the educational aspects in various promotional programmes for the use of high analysis fertilisers and concrete steps taken to strengthen the extension services in the villages so that information in regard to the pro-

per use of fertiliser can be disseminated over a wider front than at present.

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2.229

Deptt. of Supply
Deptt. of Agriculture

The Committee are concerned to observe that prior to 24 March 1972, no provision for the levy of liquidated damages or penalty for late delivery existed in the fertiliser contracts executed by the Director General, India Supply Mission, Washington, who purchases more than 40 per cent of the total purchases of fertilisers from abroad, while contracts executed by the India Supply Mission, London and the Director General of Supply and Disposals contained provisions for the imposition of liquidated damages or penalty for non-adherence to the delivery schedule. That such a lacuna should have been allowed to exist thereby conferring an undue advantage on the suppliers is regrettable. What, however, causes greater concern to the Committee that even after the incorporation, by means of a Special Condition of Contract, of a clause for the levy of liquidated damages, a general decision had been taken by the Fertiliser Purchase Committee not to invoke this clause ordinarily but utilise it only as a deterrent against "wilful and unnecessary delays" by the suppliers. Unfortunately, no grounds for this strange decision are stated to be on record, though the Department of Supply have sought to explain it away by stating that "so long as there was a sellers' market for fertiliser it might have been embarrassing for us to raise any question of liquidated damages". This in the Committee's view, is entirely impermissible and unwarranted and apprehension about how the suppliers would react in the event of levy

of liquidated damages should not have gained precedence over sound and prudent commercial principles. Since this decision has apparently frustrated the very purpose of incorporating the clause for the levy of liquidated damages, the Committee desire that this should be reviewed urgently and steps taken to rescind the instructions issued in this regard and each case judged on its merits instead of giving a virtual carte-blanche to the suppliers.

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It is also a matter for concern that while clause 10 of the conditions of the contracts executed by the Indian Supply Mission, Washington, provides, *inter alia*, that claims for extension of time on account of 'force majeure' shall be granted, the expression 'force majeure' has not, however, been precisely defined or delimited by setting forth the particular eventualities that would constitute it, giving rise to conflicting views and interpretations. Thus, in one case of delayed deliveries, the supplier had invoked the 'force majeure' clause on account, *inter alia*, of a breakdown in the plant of a sub-contractor who had promised to supply him the raw material while the Law Ministry were of the view that this could not be construed as falling within the purview of the 'force majeure' clause since the contingency of a breakdown in a sub-contractor's plant was not specifically included or made a term of the contract entered with the firm, the Legal Adviser of the India Supply Mission at Washington had, however, advised that whenever 'force majeure' was not defined, it might imply that the situations covered would be those which in fact constitute acts of God and was of the view that accident at the plants would constitute such an act. The representative of the Law Ministry also informed the Committee that it was always better to have a restricted 'force majeure' clause and leave some room to contend that the events on account of which the clause was

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sought to be invoked were not actually events which would fall under the 'force majeure' clause. It would, however, appear to be financially prudent to lay down some criteria, on the basis of accepted norms of international mercantile practice, for the determination of events that would constitute 'force majeure', so that any vagueness or ambiguity in this regard is not taken advantage of by the suppliers. The Committee, therefore, desire that this question should be re-examined, in all its aspects, and necessary remedial measures taken to plug what appears to be a loophole in the contracts.

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As regards the specific case relating to the contract executed in April 1973 commented upon by Audit, it appears that the supplier's plea in regard to the breakdown in the sub-contractor's plant had been accepted on the basis of the advice given by the Legal Adviser to the Supply Mission, Washington. The Committee would very much like to know why the Law Ministry's views on the subject had been ignored particularly in view of the fact that the Legal Adviser to the Mission had not given any written opinion but had only "conveyed" his "preliminary oral observations" through an officer of the Mission.

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The Committee are concerned to note that though, in the context of promoting indigenous jute exports and the economic advantages likely to accrue therefrom, positive encouragement was not to be given to synthetic packing where jute could be more advantageously used, and in spite of the

Department of Agriculture also having expressed preference, for operational reasons, for jute packing, considerable quantities of fertilisers have been purchased from abroad by the Department of Supply from 1971 onwards in polypropylene bags to the detriment of the country's jute interests. For instance, it was reported in September 1972 that out of 4.60 lakh tonnes of fertilisers purchased from a foreign country only 77,000 tonnes were packed in jute bags and the rest in polypropylene bags. Purchases of fertilisers in polypropylene bags had been agreed to mainly on the ground that prices of fertilisers packed in such bags as compared to jute bags were lower about 2 to 3 dollars per tonne in August 1972 and by about 5 dollars per tonne in January 1975. It has also been stated that from 1972 when shortage of fertilisers started developing, the Department of Agriculture had no choice except to accept fertilisers in whatever packing they were offered. It, however, appears that while assessing, in August 1972 the price advantage resulting from purchases in polypropylene bags, the comparative economics of the two propositions had not been examined in detail and the in-flow of foreign exchange by the export of jute bags taken into account and only a simplistic comparison between the prices quoted for supply in synthetic packing and for supply in jute bags made. That this was so would be evident from the calculations subsequently made by a departmental committee (The Polypropylene Committee) appointed to enquire into this matter, according to which the net foreign exchange inflow due to the export from the country for packing fertilisers was 6.57 dollars per tonne in May 1973, which was much more than the price advantages of 3 dollars and 5 dollars respectively offered by the suppliers in August 1972 and January 1975. Besides, as has also been pointed

out by the Polypropylene Committee, the argument that fertilisers packed in polypropylene|polythelene bags would be comparatively cheaper than those packed in Jute bags may no longer be valid on account of the increase in prices of oil-based raw materials required for the polypropylene|polythelene industry.

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The other contention that on account of shortage of fertilisers at the relevant time, there was no choice except to buy fertilisers in whatever packing they were offered, may also no longer be valid at present in the context of easier availability of fertilisers and fall in prices. As a sellers' market no longer exists for fertilisers, it should not be too difficult to ensure that whatever purchases are required to be made from abroad in a packed condition are made only in jute bags so that exports of jute bags from the country for packing fertilisers are not adversely affected. The Committee have also been informed in this connection by the Chairman of the Minerals and Metals Trading Corporation that apart from one or two very exceptional cases, the entire bulk of their imports have come in Jute bags and that supply in jute bags could be insisted upon as one of the terms and conditions of the purchase which should be acceptable to many of the suppliers, failing which purchases would not be made from them. Having regard to the fact that the Polypropylene Committee has also indicated the methodology for making a quantitative comparison between (a) the net in-flow of foreign exchange due to export of jute bags expressed in terms of per tonne of fertilisers and (b) the savings, if any,

per tonne of fertiliser in the price of fertilisers supplied in polypropylene bags as compared to jute bags, the Committee desire that every care should be exercised to see that the fertilisers are imported as far as possible in jute bags in preference to polypropylene bags.

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Apart from assessing in a realistic and scientific manner the requirements of fertilisers and evolving a sound and rational import policy which would enable purchases being made at the proper time and at the most advantageous prices, it is equally important to ensure that the available fertilisers reach the farmers when most required. Thus, in the context of supplies being far from regular on account of shortfalls in indigenous production and uncertainties of purchases from abroad in a violently fluctuating market, and the difficulties known to be faced by the average Indian farmer in obtaining in time and at reasonable prices fertilisers of the requisite quality, a proper and equitable distribution and pricing of fertilisers assume great significance. As regards the arrangements that exist for ensuring the timely and equitable distribution and pricing of fertilisers, the Committee have been informed that internal arrangements for the distribution of Pool fertilisers within a State are the responsibility of the State Government concerned and that from July 1972, the distribution of fertilisers is regulated under the Essential Commodities Act while the actual distribution is monitored by the State Governments in terms of the coordinated supply plans drawn up by the Department of Agriculture for Pool fertilisers as well as indigenous manufacturers of fertilisers. The Committee also understand that the entire quantity of Pool fertilisers (which constitutes roughly 50 per cent of the total availability) and about 60 per cent of the domestic production are distributed through public

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institutionalised channels like cooperatives over which the State Governments exercise control and that even in respect of the balance quantity, the districts/areas where the fertilisers are to be supplied can be decided by the State Governments concerned, although the actual marketing may be done through private distributors of the domestic manufacturers. The entire fertiliser distribution within a State in the context of areas and priorities is thus under the control of the State Governments.

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These apparently elaborate arrangements notwithstanding, the Committee are doubtful whether the machinery that hitherto existed was capable of and adequately equipped for tackling situations arising from shortage of fertilisers and scarcity conditions and whether the distribution mechanism actually worked satisfactorily to the farmer's benefit particularly during 1972—74 when there was an acute shortage of fertilisers in the country with overall availability both from indigenous and imported sources being far short of the total requirements. It is well known that the common complaint of the farmer during this period was that fertilisers were not readily available and in adequate quantities during the peak seasons of consumption when they were actually required. Admittedly, some State Governments, in a time of scarcity, merely resorted to a mechanical "mathematical distribution" by dividing the total quantity of fertilisers available by the acreage, as a result of which farmers accustomed to using high doses of fertilisers, as in Andhra Pradesh, got hardly 4 to 5 kilogrammes of fertilisers for an acre of paddy. It also appears that many of the State Governments had introduced a card/permit system which,

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according to the representative of the Department of Agriculture, led to "some amount of malpractices" and acted "more as a bottleneck than as a help." The Department's representative was also candid enough to admit during evidence that in the past when there was an acute scarcity, fertilisers were being sold in the black market at a premium as a result of which there was no need for any aggressive marketing at all, and that in Andhra Pradesh, despite arrangements made to divert fertilisers from States where there was less demand on account of drought, a black market in fertilisers flourished till the end of 1974 as there was a brisk demand from growers of cotton, tobacco and other commercial crops.

The Department of Agriculture have, however, informed the Committee that these were now things of the past and that as a result of better indigenous production, improved imports, which were coming according to schedule and in some cases even in advance of schedule leading to better availability of fertilisers, the position was much better than in 1974. According to the Department, the factors inhibiting proper distribution of fertilisers have been identified and a number of corrective measures like (i) building up sizeable buffer stocks of Pool fertiliser to guard against shortages, (ii) stepping up of domestic production, (iii) location of buffer stocks near consumption centres, (iv) reduction in prices of fertilisers, (v) rationalisation of and advance programming for movement of imported and domestic fertilisers, etc., have been taken in recent times to ensure availability of fertilisers adequately and in time to the State Government agencies and cultivators. With these measures as well as the withdrawal of the card/permit system for distribution of fertilisers, it was hoped that the phenomenon of the past would not recur in the coming years.

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While these are, no doubt, steps in the right direction, it would appear that a lot more needs to be done to streamline the procedures in times of scarcity so as to ensure that the farmers, particularly the small and marginal farmers with their meagre resources, get their input requirements in time. Apart from reviewing urgently whether the existing channels of distribution are adequately equipped to reach the small farmers in the remote areas of the country and to react quickly and effectively in times of scarcity, and taking all necessary remedial measures in this regard, the actual performance of the existing machinery for the distribution of fertilisers should also be constantly monitored to ensure its smooth and efficient functioning and to safeguard against the situation of serious shortages which developed in 1972-73 and continued till the first half of 1974 much to the disadvantage of the peasants. The functioning of the institutionalised channels like cooperatives, agro-service centres, etc. should be continuously watched and steps taken to ensure, as has also been pointed out by the Estimates Committee (1972-73) in paragraph 3.54 of their 40th Report (Fifth Lok Sabha), that the cooperatives do not become merely an intermediate agency distributing fertilisers through private traders, but provide better and effective service to the needy farmers. The cooperative structure should also be strengthened both organisationally and financially to enable it to take up a larger share of the fertiliser business and to rationalise the location of its retail depots so as not leave out remote or inaccessible areas. Necessary infrastructural facilities like godowns, transport vehicles, trained personnel, etc. also need to be provided in a

larger measure than before, if the problem of making available fertilisers in adequate quantities and in time to the farmers is to be tackled effectively. The present comfortable position in fertilisers affords the necessary opportunity and time to revamp the distribution system and the Committee trust that the Central Government, in consultation with the State Governments, will take all necessary steps in this behalf.

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Strengthening of the distribution machinery alone would not produce the desired results unless corresponding steps are taken simultaneously to assist the weaker sections of the farming community to obtain timely credit for purchase of fertilisers. Admittedly, one of the factors influencing the off-take of fertilisers is the inadequacy of credit facilities. While the Committee note that efforts have been made to remove this constraint by making available additional short-term loans to the State Governments in the Budget for 1975-76 for the purpose, *inter alia*, of granting loans to the farmers for the purchase of fertilisers and other inputs over and above the normal provision for grant of such loans in the State budgets, relaxing conditions for advancement of cooperative loans, etc., they would urge Government to keep the arrangements for the provision of credit to the farmers, particularly those belonging to the weaker sections, under close and continuous review and take prompt and appropriate remedial measures whenever deficiencies come to light.

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Yet another aspect requiring constant attention and monitoring is the quality of fertilisers actually supplied to the farmers. While admitting that in times of shortage, many cases of adulteration of fertilisers took place in the distribution system, the representative of the Department of

Agriculture informed the Committee during evidence that the regulatory machinery for curbing adulteration and other malpractices had been tightened to a considerable extent and sufficient powers vested with the State Governments to draw samples at any stage of distribution of fertilisers and to prosecute offenders. It, however, appears that on account of financial constraints which have come in the way of appointing staff exclusively for quality control, many State Governments have not been in a position to effectively monitor and exercise better checks over the quality of fertiliser actually supplied to the farmers. This deficiency has been sought to be remedied by including a scheme in the Fifth Plan for assisting the State Governments in appointing one Input Inspector practically per district exclusively to draw samples and to prosecute offenders. Apart from rendering all necessary assistance to the State Governments in this regard, the Committee would also urge Government to ensure the provision of adequate testing facilities and quality control laboratories and develop quick methods for spot-detection of malpractices. The existing enforcement machinery needs also to be tightened with a view to ensuring that un-scrupulous dealers who indulge in various malpractices like adulteration, dilution, short weighing, etc. of fertilisers are proceeded against promptly and dealt with sternly.

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As regards pricing of fertilisers, the Committee are concerned to note that the prices paid by Indian farmers are about the highest in the World and admittedly the cultivators' resistance to the increases effected in prices of fertilisers with effect from 1 June 1974,

on account of abnormally high prices in the international market, increased ocean freight and increased cost of production of the indigenously produced fertilisers attributable to overall increase in prices of raw materials, operating cost, etc., affected the off-take of fertilisers during 1974-75 leading to the downward revision of prices in July 1975 and December 1975. With effect from 16 March 1976 Government introduced a Scheme of subsidy at the rate of Rs. 1250 per tonne on phosphatic fertilisers which was meant to be passed on by the domestic manufacturers concerned to the farmers by way of reduction in prices. The prices of fertilisers were also reduced again with effect from 20 April 1976 and again on 8 February 1977. The Committee have been informed in this connection that all imported fertilisers are distributed through the Central Fertiliser Pool, which operates on a 'no profit no loss' principle, at uniform Pool issue prices and that while the prices of the three major nitrogenous fertilisers Urea, CAN and ammonium sulphate are controlled statutorily, both in respect of imported and indigenous fertilisers, under the Fertiliser (Control) Order, there is no control by Government on the prices of other indigenously produced fertilisers. However, in respect of fertilisers the prices of which are not statutorily controlled, the Pool prices of imported fertilisers influence these prices and have a somewhat regulatory effect. The Department of Agriculture have also assured the Committee that it has always been Government's endeavour to fix the Pool issue prices and the retail prices of fertilisers as low as possible and that a number of measures have been taken by Government in recent times to bring down the prices of fertilisers.

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While the Committee are also not unwilling to concede that the pricing policy has to take into account the total economics of imported

fertilisers as well as of indigenous production and a drastic reduction in prices would be difficult, they would urge Government to keep the position under review and ensure that the pricing policy of fertilisers is invariably directed towards making this vital input available at reasonable prices. Now that the prices of imported fertilisers have fallen substantially, and adequate buffer stocks are also being built up so as to provide the country with a strong bargaining base in the international market, it should not be too difficult to pass on the benefits accruing therefrom to the cultivator. Besides it should also be possible to effect economies in indigenous production and to take effective and conclusive steps to ensure the highest possible levels of capacity utilisation in the public sector fertiliser plants and thereby reduce production costs. The Committee would also urge Government to examine the feasibility of reducing the prices of fertilisers further in the overall interest of the country to increase the production of foodgrains. What is, therefore, required is an integrated approach to the entire question and not piece-meal and *ad hoc* solutions.

In this context the Committee understand that a Fertiliser Prices Committee (Marathe Committee) has been constituted by Government to evolve a fertiliser pricing policy which would ensure a fair return on a sustained basis for the investment made in the industry and that this Committee was also to evolve, *inter alia*, a policy for pricing of imported fertilisers in relation to cost of imports, nutrient content and the price of indigenous fertilisers of similar grades and to suggest retention prices for different domestic units in operation and those likely to be commissioned during the

Fifth Plan, which will give a fair rate of return. The Committee would like to be apprised, in some detail, of the findings of the Marathe Committee and the specific action taken by Government in pursuance thereof.

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As pointed out earlier in this Report, though the growth of the indigenous fertiliser industry has been no doubt impressive in terms of installed capacity, actual production of fertilisers in the country has, however, not kept pace commensurately with the capacity and estimated demand, necessitating large imports to bridge the gap. The Committee have been informed that with a view to achieving self-sufficiency in fertilisers, the country has embarked on a very large programme for capacity expansion, as a part of which 21 projects (with a total capacity of 2.16 million tonnes of nitrogen and 0.46 million tonnes of P_2O_5) were in different stages of implementation and another 8 projects (with a total capacity of 1.58 million tonnes of nitrogen and 0.46 million tonnes of P_2O_5) had been approved/approved in principle and were expected to be taken up for implementation depending, among other things, on the availability of resources, and that with the completion of all these projects, the total capacity would rise to about 6.5 million tonnes of nitrogen and 1.78 million tonnes of P_2O_5 (as against the installed capacity of 1.94 million tonnes of nitrogen and 0.56 million tonnes of P_2O_5 at the end of the Fourth Plan). While it is thus anticipated that the increased production arising from the substantial addition to capacity would help in narrowing appreciably the gap between demand and indigenous availability of fertilisers, the Department of Fertilisers and Chemicals have nevertheless stated that though the Fifth Plan document envisaged a capacity target of about 6 million tonnes of nitrogen and a capacity of about 1.7 million

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tonnes of P_2O_5 , it had become necessary, on account of financial constraints, to rephase some of the projects as a result of which production by 1978-79 (the terminal year of the Fifth Plan) was expected to be only about 3.0 million tonnes of nitrogen and 0.9 million tonnes of P_2O_5 as against the assessed requirements of 5.2 million tonnes of nitrogen and 1.8 million tonnes of P_2O_5 , and consequently there would still be a gap between demand and indigenous availability which may have to be bridged by imports. Some of the projects for augmenting the indigenous capacity for production of chemical fertilisers will also be taken up only in the closing stages of the Fifth Plan and be really implemented or be operational only in the Sixth Plan period, and if past performance in this regard be any guide, the Committee are doubtful how many of the new projects would actually go on stream and achieve stability in production as scheduled. It would, therefore, appear *prima facie* that even with an improved utilisation of expanding capacity, domestic availability of fertilisers would not be sufficient in the near future to ensure a significant spread across the entire agricultural economy and the country may still have to go a long way to reach the goal of self-sufficiency when imports could be dispensed with.

In these circumstances and also in view of the fact that fertiliser plants are highly capital intensive and require a considerable period for stabilisation of production, it is imperative to ensure optimum utilisation of the capacity already established at considerable cost and maximise production in the existing plants. However, as has also been pointed out earlier by

the Estimates Committee in paragraph 2.86 of their 40th Report (Fifth Lok Sabha), it is nothing short of a tragedy that at a time when the country requires more and more fertilisers to step up agricultural production, the existing fertiliser plants, particularly in the public sector, have not been able to produce according to their installed capacity. (In 1973-74, the last year of the Fourth Plan, production of nitrogenous and phosphatic fertilisers in the country amounted respectively to only 58.4 per cent and 57.7 per cent of the installed capacity. The capacity utilisation of nitrogen during 1974-75 was 59.5 per cent). It has, however, been contended by the Department of Fertilisers and Chemicals that the capacity utilisation of the operating plants in the country requires to be viewed with reference to the spread of investment in extremely old plants and those with built-in constraints (like Sindri, the FACT plant at Udyogamandal and to some extent the original investment in Trombay), in stabilised plants (like the Gorakhpur and Namrup plants of the Fertiliser Corporation of India in the public sector, the IFFCO plant at Kalol in the cooperative sector and the GSFC plant at Baroda in the private sector), and in the new plants (at Madras, Goa, Durgapur and Cochin) which have to go through an initial period of teething troubles till they reach stabilisation, and that viewed against this background, the capacity utilisation of the existing fertiliser plants has been reasonably good. It has also been argued that the international norm for comparable chemical and fertiliser plants is about 82 per cent and that, by and large, the overall performance of the industry in India in respect of nitrogenous fertilisers was comparable both with the developed and developing countries and during 1972, productivity in India was higher than the world average. As regards phosphatic fertili-

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sers, the Department have informed the Committee that relevant comparative data were available only for the period 1965-67, which showed that the performance in India was lower than that in the developed countries, though the present position was likely to be quite different in the context of the steps taken in the recent past to improve the productivity of the P²O₅ units in India.

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An analysis of the performance of some of the individual plants in operation, however, reveals a rather disquieting picture, which would indicate that there is scope for considerable improvement. For instance, though it was stated by the representative of the Department of Fertilisers and Chemicals that the assumption made in Government's investment decisions was that the new plants would operate at 50 per cent capacity in the first year, build up to about 65 per cent in the second year and reach 80 per cent capacity utilisation in the third year, the Committee are concerned to note that while the aggregate utilisation of capacity of the new plants in operation during the period 1971-72 to 1976-77 ranged between 17 and 43.2 per cent only, the utilisation of capacity of the Durgapur plant was as low as 3.9 per cent in 1973-74 and 9.9 per cent in 1974-75 and that of the Cochin plant was only 9.2 per cent in 1973-74 and 26.3 per cent in 1974-75. Similarly, the utilisation of capacity of some of the stabilised plants was also below 70 per cent in some of the years. The Committee need hardly emphasise that the factors responsible for the under-utilisation of capacities should be critically analysed and necessary remedial

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measures taken at the earliest to maximise the production so as to reach as near the installed capacity as possible. In this context, the Committee find that a World Bank Mission, which visited the operating units of FCI and the Udyogamandal Division of FACT in 1969 to assess their performance and suggest remedial measures for overcoming various difficulties in attaining higher capacity utilisation, had also emphasised the need for taking necessary measures to improve capacity utilisation and had suggested, *inter alia*, that it would be greatly to the country's advantage to make some marginal balancing investments on optimising the capacity in the existing plants rather than go in for bigger programmes for new investments.

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In this connection, the Committee have been informed by the Department of Fertilisers and Chemicals that the need for maximising fertiliser production from existing capacity has constantly been engaging Government's attention and that the under-utilisation of capacity of individual plants was attributable to various factors like (i) power cuts and instability of the power systems (as in the case of Nangal, Baroda, Vizag and Kanpur), (ii) occasional labour troubles (as in the case of Kanpur), (iii) breakdowns of plant and equipment on account of poor maintenance and mechanical problems (Trombay, Baroda and Vizag), (iv) unplanned shutdowns on account of unforeseen technological difficulties (Namrup, Durgapur and Cochin), (v) defective design and obsolescence of technology (Neyveli), (vi) reduced quantum of critical inputs (like inadequate availability of coke oven gas in the case of Rourkela and non-availability of power in the case of Nangal) and (vii) extreme age of some of the plants (Sindri, where the equipments were stated to be worn out and to

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have outlived their normal life, and Udyogamandal, where certain sections of the plant have been operating over a long period of time with equipment which have outlived their normal life). The Committee have also been informed that from 1975-76, learning from past mistakes, the monitoring systems have been improved considerably not only in the Department of Fertilisers and Chemicals but in other Ministries as well and various programmes initiated for de-bottlenecking for most of the existing plants under a 'Plant Operations Improvement Project' (POIP) launched with the support of the World Bank. As part of the monitoring operations, the production performance of the operating units is stated to be monitored on a weekly and monthly basis and the reasons for shortfalls in production carefully scrutinised and necessary corrective measures taken, "not on any theoretical basis but as a regular production plan", and the project management and operating management had also been separated. As regards the steps taken under the 'Plant Operations Improvement Project', the Committee have been informed that on the basis of the suggestions of the World Bank and of a Technical Coordination Group constituted to review the performance of the operating units of FCI and FACT and identify areas where modifications and improvements could be carried out for achieving better levels of production, as well as the advice given by specialists and consultants in regard to problems faced by certain individual plants like Durgapur, Cochin and Trombay, various programmes to improve capacity utilisation have been evolved and are being implemented. The representative of the Department of Fertilisers and Chemicals also stated

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during evidence that it was Government's endeavour "to bring all the plants to a high degree of stability" and that they would not be satisfied unless 80 per cent capacity utilisation was reached and that as a result of the de-bottlenecking measures undertaken it was expected that capacity utilisation would register an increase of 12½ per cent, from 58.5 per cent to 71 per cent, during 1975-76. The Committee are informed that as a result of various measures taken to augment production, the capacity utilisation of nitrogen during 1975-76 and 1976-77 has substantially improved, being 70 per cent and 72.5 per cent respectively. They hope that Government would keep a contemporaneous watch on the implementation of various capacity augmentation measures so as to improve the capacity-utilisation further in the years to come. It should also be ensured, particularly in the context of the massive investment involved (for the FCI and FACT schemes alone a credit of 17 million dollars has been negotiated with the World Bank), that these measures actually subserve the objectives envisaged.

In order to correct the present imbalances between installed capacity and production of fertiliser plants in the country, the Committee would also suggest the following measures for implementation on high priority:

- (a) The cost of production of individual units should be critically examined and conclusive steps taken to effect economies in costs which could generate funds for re-investment in programmes for de-bottlenecking and improved capacity utilisation. For instance, it should be possible to reduce inventories and thus cut down the inventory carrying charges by scientific inventory planning and control.

- (b) Adoption of scientific materials management and maintenance management principles would go a long way in reducing idle capacity caused by non-availability of raw materials and spares for maintenance. There should also be a proper schedule of preventive maintenance and repairs and it should be ensured that maintenance is carried out according to this schedule so that there may not be any loss of Production on account of inadequate maintenance.
- (c) Special R&D efforts should be directed towards the development of technology to meet shortages in respect of feed stock, raw materials and spare parts.
- (d) Government may also examine the feasibility of establishing a centralised 'Spares Bank' where costly and important spares in common use could be stocked instead of each individual unit carrying this heavy burden on itself and the resultant economies in costs channelised into more productive activities which might have been deferred on account of financial constraints.

Yet another factor which has necessitated continued imports of fertilisers at heavy foreign exchange outflow is the serious delays that have taken place in the implementation and commissioning of new projects. According to the information furnished by the Ministry of Petroleum and Chemicals to the Estimates Committee (1972-73), delays ranging from six months to three and a half years had taken place in the commissioning of various

projects of the Fertiliser Corporation of India. Similarly, in respect of Cochin, Phase I and Udyogamandal Fourth Stage Expansion projects of FACT, delays ranging between one to four years had occurred in completing and commissioning various components of the projects. It has also been conceded by the Department of Fertilisers and Chemicals that slippages in the commissioning of new projects had led to the periodical revision downwards of the estimates of indigenous production, on the basis of which the import strategy was worked out, necessitating larger imports than were anticipated initially. Besides, such delays have also led to an inevitable escalation of costs. That important projects vital to the country's agricultural economy should have thus lagged considerably behind schedule, in spite of the fact that the public sector has more resources at its command and also the backing of the entire governmental machinery, causes serious concern to the Committee.

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According to the Department of Fertilisers and Chemicals, the following factors were responsible for the delays in completing and commissioning of new projects under implementation:

- (a) Delay in supply of equipment, both indigenous and imported, required for fertiliser plants which, in turn, was attributable to unforeseen factors like labour unrest in the fabricators' workshops, power cuts, difficulty in obtaining material for fabrication, etc.
- (b) Difficulties in fabrication of some sophisticated equipment being indigenised for the first time.
- (c) Extended time taken in arranging credits and finalising contract arrangements.

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- (d) Delays by entrepreneurs in finalising their own plans and finalising arrangements.
- (e) Delay on the part of construction contractors.
- (f) Difficulties in procurement of construction and structural items like cement, steel, etc.
- (g) failure of critical items of equipment including imported equipment.
- (h) Delays due to adoption of new technology on a large scale.
- (i) Constraints in taking up new schemes on account of paucity of funds.

The Committee are of the view that some of these problems were, by no means, insurmountable and could have been solved by more effective co-ordination between the different agencies involved, and by reviewing critically the progress of the projects at regular intervals. The delays and gestation periods could have also been minimised by an efficient system of monitoring and adoption of techniques like PERT, CPM, etc.

The Committee note in this connection that, though late than never, a number of remedial measures, like streamlining of the distribution procedure for steel materials, expeditious disposal of individual requests received from fabricators for the import of tools and for obtaining foreign technical know-how for the manufacture of sophisticated equipment, timely placement of orders for equipment on the fabricators as soon as possible after the projects are sanctioned, ensuring that the items produced by the

indigenous manufacturers are of the requisite quality, etc., have been taken in pursuance of the recommendations of a committee (Kasturirangan Committee) appointed to examine the reasons for the delays in commissioning of public sector plants. The Committee have also been informed that "a careful watch" is being kept by the Department of Fertilisers and Chemicals on the progress of all the projects under implementation through monthly progress reports and quarterly performance review meetings. As regards the steps taken to eliminate delays in the supply of equipment for fertiliser plants, particularly by Bharat Heavy Plates and Vessels Ltd., the Committee learn that the Ministry of Heavy Industry have taken "very strong monitoring steps" to reduce delays in deliveries and a number of remedial measures like allocation of blanket foreign exchange for import of components and materials, streamlining of procedure for authorisation of imports, monitoring of processing of orders placed on foreign suppliers, off-loading of some of the items on other manufacturers, monitoring of progress of major orders by means of CPM/PERT charts, etc. have been adopted and that with these measures, further slippages in delivery schedules would be avoided. The Committee need hardly emphasise the imperative need for reducing the gestation periods and expediting the commissioning of various new plants in the context of achieving self-sufficiency in fertilisers in none-too-distant a future and they trust that the measures now stated to have been taken would produce the desired results. Their adequacy should also be kept under constant review and timely corrective action taken whenever deficiencies come to notice.

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With a view to expediting increase in the growth rate of installed capacity, a decision appears to have been taken to speed up investment in

new fertiliser projects and to sanction at one time a large number of projects and to ensure their completion simultaneously instead of staggering the implementation of new projects. Thus, a massive investment of Rs. 1,100 crores in the public sector had been provided in the Fifth Plan for the purpose and with the escalation in costs, the investment necessary has been presently estimated at Rs. 1,700 crores, which represents a five-fold increase over the investments made in the public sector fertiliser industry during the last four year of the Fourth Plan period (1970-71 to 1973-74). In the context of the sizeable shortfalls that had occurred in the achievement of financial as well as physical targets envisaged for augmentation of fertiliser production capacity during the Fourth Plan, the already over-loaded order book position of units manufacturing fertiliser plant equipment, problems of feedstock and raw materials and other constraints that have come in the way of realisation of targets earlier, the Committee are doubtful how far the ambitious programme now proposed is capable of attainment. There is also need for a balanced approach to evolve a workable system to ensure that the fertilisers reach the farmer at the right time and place in the right quantities and at minimal cost. All this, therefore, naturally calls for the most careful planning, effective coordination and scientific monitoring. The organisational machinery also needs to be properly re-oriented and geared upto face the challenges likely to be posed by such a gigantic task, so as to be in a position to tackle effectively the multitude of problems likely to crop up in the implementation of any programme of such magnitude. The Committee would, therefore, urge Government to ensure that the fulfilment of the programme is not hampered in any way and to have the progress achieved so far proper-

ly and expeditiously evaluated by a body of experts and take conclusive steps to remedy deficiencies, if any.

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In this connection, the Committee also feel that it would be worthwhile to have a critical appraisal of the targets proposed for the Fifth Plan particularly in the light of certain weighty observations contained in the Reserve Bank of India study referred to earlier in Chapter I. The study rightly points out that under existing conditions, the scope for further growth of fertiliser consumption is rather limited and that unless there was a breakthrough in the technology of cultivating commercial crops (such as cotton, jute and oilseeds) on the scale achieved in wheat, areas under multiple cropping were stepped up for improving the off-take of fertilisers and steps were taken to aid small farmers in taking to fertilisers on a much larger scale than they had done so far, the country might well reach a point of stagnation in fertiliser use. These facts only serve to underscore the importance of an integrated and multi-pronged approach to the entire question and the Committee would, therefore, like to be reassured that all these factors have been duly taken note of and necessary supporting measures initiated while arriving at a decision to speed up investment in new fertiliser projects.

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Another aspect over which there has been considerable uncertainty and shift in policies from time to time relates to the feedstock to be adopted for fertiliser production. Till recently, naphtha had been the preferred feedstock for production of nitrogenous fertilisers. However, in the wake of the oil crisis and in view of the anticipated deficits in naphtha supplies on account of hardening of world supplies, increase in prices and uncertainties in regard to internal availability to sustain a major expansion programme for the pro-

duction of fertilisers and also in the light of the findings of the Feedstock Committee, a policy decision appears to have been taken that there should be maximum diversification of the feedstock and that, as far as possible, fertiliser capacity should be developed on other feedstocks like fuel oil, heavier petroleum fractions and coal. The Committee, however, understand that with the prospect of improved availability of naphtha following the oil strike in Bombay High, there appears to be a shift once again towards the use of naphtha as feedstock as is seen from the recent decision to use this as the feedstock for the Mathura Fertiliser project. While the Committee concede that the issues involved in the determination of an appropriate feedstock are complex and that the various options available should be kept open taking into account the changing situations, they would nevertheless stress the need for evolving a definite and long-term feedstock policy to facilitate timely and correct investment decisions being taken. In view of the fact that considerable time has also elapsed since the various options available were last gone into in detail by the Feedstock Committee (1969), the Committee also feel that it might be worthwhile for an expert body to have a fresh look at the entire question. The Committee would also like Government to consider whether it is not possible to provide "built in" option in the new plants to enable them to switch over to naphtha, fuel oil etc., or any other fraction of crude oil as may be most economic and advantageous to be used in given circumstances.

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The Committee find that in spite of the fact that coal is abundantly available in the country and would, therefore, appear to be the most suitable

feedstock from the point of view of self-reliance, adequate and serious attention had not been given to the use of coal for fertilisers until recent years, when a decision was taken to establish three coal-based plants at Ramagundam, Talcher and Korba, of which implementation of the Korba project has also been slowed down on account of financial constraints while the Ramagundam and Talcher plants were expected to be commissioned in 1977. What is more disconcerting is the fact that some doubts have also been raised about the very success of the coal-based project, which has been described as a 'major experiment'. The Committee have been informed in this connection that apart from an ICI plant in South Africa, coal-based technology had not been used as yet the world over and that as it was the first time that a large coal-based project was being taken up for implementation in the country, an "obvious investment risk" was involved. The Department of Fertilisers and Chemicals have, however, sought to reassure the Committee and have stated that they were in touch with the experts possessing the requisite experience in coal gassification processes and that the consultants for the project were also the consultants for the earlier South African projects which had been successfully commissioned and was in operation. While the Committee are not averse to forward technology being employed in establishing projects, they cannot, however help feeling that in view of the apparent risks and uncertainties involved in and the misgivings expressed by Government spokesmen over the experiment with coal-based fertiliser plants, a smaller pilot project with a view to ensuring that the technology was a proven one might have been more prudent to begin with before going in for large-sized plants involving larger capital outlay and which were also going to take a longer time for commissioning. No doubt, this would have post-

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poned further, as has been contended by the representative of the Department of Fertilisers and Chemicals, the possibility of using coal in any significant scale. However, such a step would have ensured that the country's meagre resources were not expended injudiciously in major experiments whose outcome is uncertain. In any case, the performance of the two coal-based plants at Ramagundam and Talcher should be closely watched and monitored and timely action taken to remedy the deficiencies in these plants as well as the new project coming up at Korba.

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The Committee would also like to recall in this context that more than two decades earlier, the possibility of evolving a coal-based technology had been suggested and supported by Indian scientists like late Dr. A. C. Ghosh and some studies in this regard had also been started subsequently at the Dhanbad Institute. The Committee cannot resist the impression that had these suggestions and studies been given positive encouragement and pursued to their finality, a good deal could perhaps have been learnt earlier from the experience instead of relying now heavily on the somewhat uncertain outcome of foreign know-how. It is sad that coal-based technology had not been considered then with the seriousness that it rightly deserved.

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Incidentally, the Committee find that the Feedstock Committee had also examined the economic feasibility of using electricity as a feedstock for fertiliser production had felt that certain developments then in experimental stage might be of interest for adoption if proved successful for commercial use in fertiliser production. While the Committee would like to be

informed, in some detail of the outcome of these experiments, they would also stress the importance of directing indigenous R&D efforts towards the development of a suitable technology for low cost electrolysis which could be profitably utilised, among other things, for the economic production of fertilisers. Similarly, R&D efforts should also be oriented towards the development of simpler processes to reduce costs and newer methods of potash recovery from all available sources to reduce the country's dependence on imports of potassic fertilisers, which are at present being imported cent per cent. There is no dearth of technical and scientific talent in the country and given the requisite encouragement and resources there is no reason why they should not be able to find solution to these problems.

In the present context of short supply and high prices of chemical fertilisers, the development of local manurial resources and the use of organic manures assume great importance. Besides, the use of organic manures in conjunction with chemical fertilisers is also very essential for preserving nutritional balance and fertility of the soil. While the Committee note that some organised steps are at long last being taken to produce organic fertilisers from the abundantly available urban and agricultural wastes in the country and to promote their use, (like the establishment of mechanical compost plants in cities with a population of 3 lakhs and above, of sewage and sullage utilisation schemes, setting up of 1 lakh gobar gas plants in rural areas during the Fifth Plan for the production of gas for fuel purposes and good quality manure for agricultural production, organisation of demonstration-cum-training camps for popularising the production and use of organic manures, etc.), they, however, feel that a lot more still needs to be done to tap the vast potential available in the country for the purpose. For instance,

the Committee find from an article by Dr. Sethna (Chairman, Atomic Energy Commission) that while it was estimated that around 324 million tonnes of cattle dung would be available in India in 1975-76, only 0.15 million tonnes had been utilised in 1972 in gobar gas plants located in different parts of the country to produce methane gas and manure. According to another expert cited in an article entitled "Bio-gas (Gobar Gas) Plant in Perspective" by R. K. Awasthi, the burning of the cattle dung in the whole of the country amounts to losing annually as much fertiliser as eight Sindri plants can produce. Yet another article featured by the United Nations Environment Programme (UNEP), based on a study by Prof. Amulya Kumar N. Reddy, Convener of ASTRA (Application of Science and Technology to Rural Areas) at the Indian Institute of Science in Bangalore, points out that to produce 230,000 tonnes of nitrogenous fertiliser a year, a developing country can build either one large coal-based plant in the city or 26,150 small, village level biogas (Gobar gas) plants, which would also generate 130 times as much employment in poor, rural areas where employment is most needed. That a lot more needs to be done in this regard is also evident from a report submitted by a committee appointed by the Indian Council for Agricultural Research, which indicates that there is a possibility of increasing the use of organic manures by about 30 per cent by adopting improved methods. The representative of the Department also conceded that there was a need for stepping up the use of organic manures.

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and use of compost and other organic manures. The target fixed for the production of rural compost and urban compost a year by the end of the Plan period is 350 million tonnes and 7.5 million tonnes respectively as against the present production of the order of 200 million tonnes and 5.3 million tonnes of rural and urban compost respectively. Green manuring and sewage/sullage utilisation programmes are also being intensified. The Committee hope that Government will keep a watch over the implementation of these programmes so as to achieve the targets laid down. The Committee expect that the various programmes for increasing production of organic fertilisers during the Fifth Plan would be energetically implemented and concrete and conclusive steps should also be taken concurrently to tap the available potential on a much larger scale. The Committee have been informed in this connection that a committee has been set up under the chairmanship of the Secretary, Department of Fertilisers and Chemicals, for the development of organic fertilisers and that the Department of Agriculture have been asked to work out a specific programme with a view to commercialising some of the ideas suggested by people like Dr. S. P. Dua, Chief Agricultural Scientist, Fertiliser Corporation of India. Considerable time having elapsed since then, the Committee would like to be apprised of the outcome of these efforts and the specific steps taken as a sequel thereto.
