COMMITTEE ON PUBLIC UNDERTAKINGS (1969-70)

(FOURTH LOK SABHA)

SIXTY-SIXTH REPORT

INDIAN OIL CORPORATION (PIPELINES DIVISION)

MINISTRY OF PETROLEUM AND CHEMICALS AND MINES AND METALS

(DEPARTMENT OF PETROLEUM)



LOK SABHA SECRETARIAT NEW DELHI

April, 1970/Vaisakha, 1892 (S)
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COMMITTEE ON PUBLIC UNDERTAKINGS

(1969-70)

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^{*}Appointed Chairman from 10-12-1969 vice Shri G.S. Dhillon resigned.

^{*4} Ceased to be member w.e.f. of 3-4-1970 consequent on his retirement from Rajya Sabha.

STUDY GROUP III ON ELECTRONICS, PETROLEUM AND OIL UNDERTAKINGS

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- 2. Shri G. Viswanathan-Alternate Convener.
- 3. Shri R. K. Amin
- 4. Shri K. Ananda Nambiar
- 5. Shri Digvijaya Narain Singh.

INTRODUCTION

- I, the Chairman, Committee on Public Undertakings having been authorised by the Committee to present the Report on their behalf, present this Sixty-Sixth Report on the Indian Oil Corporation (Pipelines Division).
- 2. This Report is based on the examination of the working of Indian Oil Corporation upto the year 1969.
- 3. The Committee took evidence of the representatives of the Indian Oil Corporation on the 20th and 21st August, 1969 and the Ministry of Petroleum & Chemicals and Mines and Metals (Department of Petroleum) on the 3rd September, 1969.
- 4. The material relating to the Indian Oil Corporation (Pipelines Division) was processed at various stages by the Study Group III on Electronics, Petroleum and Oil Undertakings of the Committee.
- 5. The Report was considered by the Committee on the 2211d and 24th April, 1970 and adopted on the 27th April, 1970.
- 6. The Committee wish to express their thanks to the officers of the Ministry of Petroleum & Chemicals and Mines and Metals (Department of Petroleum and Chemicals) and the Indian Oil Corporation for placing before them the material and information that they wanted in connection with their examination.

New Delhi; April 29, 1970. Vaisakha 9, 1892 (S).

M. B. RANA,
Chairman,
Committee on Public Undertakings.

HISTORICAL BACKGROUND

At the time of construction of the Gauhati Refinery in 1961, it was estimated that bulk of its production would have to be transported outside Assam. In addition, a small consignment from the Digboi Refinery was also expected to be transported. In order to ensure economic and reliable transportation of these quantities, Government sanctioned a project study for the construction of a pipeline between Gauhati and Siliguri. A similar study was made in 1962 of the requirements of transportation of the products of the Barauni Refinery towards Calcutta as well as towards Delhi. Eventually the Gauhati-Siliguri pipeline was sanctioned by Government in October, 1962, and the Haldia-Barauni-Kanpur pipeline in July, 1963.

- 1.2. In June, 1962, Government decided that the Indian Refineries Ltd., (since merged with the Indian Oil Corporation Ltd. which was at that time responsible for constructing and running the Gauhati and Barauni Refineries) would also be responsible for undertaking the Gauhati-Siliguri Pipeline Project. A similar decision was taken in October, 1962 in respect of the proposed Barauni-Delhi and Barauni-Calcutta Pipeline Project. In the beginning of 1962, the project planning reached an advanced stage and a General Manager was appointed to look after these projects. He was on the strength of Indian Refineries Limited.
- 1.3. On the 1st of September, 1964, the Indian Refineries Ltd., was amalgamated with the Indian Oil Company Ltd., which was renamed as the Indian Oil Corporation Ltd., with two Divisions, namely Refineries Division and Marketing Division. The Pipeline Projects formed a part of the Refineries Division. However, on the 11th March, 1965 three separate Divisions—Refineries, Marketing and Pipelines were created. The Refineries and the Marketing Division were to be looked after each by a separate Managing Director. The Pipelines Division was put under the charge of a separate Director-in-charge. The Pipelines Division was to be responsible for the construction, maintenance and operation of product pipelines.
- 1.4. The Koyali Ahmedabad products Pipeline was constructed by the Italian firm Snam-Saipem under the supervision of the Pipelines Division. The Pipeline was originally assigned to the Oil and Natural Gas Commission. Government of India subsequently decided to transfer the ownership of the pipeline to the Indian Oil

Corporation Ltd., (Pipelines Division). *The pipeline was held on lease and formal transfer of the ownership was expected to take place with effect from 1st July, 1968.

1.5. In their Thirty-Sixth Report (Third Lok Sabha) the Committee on Public Undertakings had recommended as follows:

"The Committee, however, found that the Pipelines Division had its full-fledged office with its own Financial Controller, Administration Department, Accounts Department etc. apart from the Technical Departments and Officers. The Committee wonder whether there has been any definite advantage in effecting the separation of the Division. It has certainly added to the overhead expenditure That there has been lack of coordination between this Division and the Marketing Division is only too obvious. It is only now that the coordination meetings have been taking place at which the Pipelines Division is represented. The product pipelines are managed by the Pipelines Division and monetary transactions between the Pipelines Division and Marketing Division entail several accounting procedures and accounts staff. The Committee do not consider that this has led to efficiency and economy. It should be examined whether the Division could be amalgamated with either the Refineries Division or the Marketing Division."

In their Action Taken Report—Twenty-Fourth Report (Fourth Lok Sabha), of the Committee on Public Undertakings the Government have stated as follows:—

"Government agree with the recommendation that the Pipelines Division may be merged with one of the two Divisions, namely Refineries and Marketing of the Indian Oil Corporation Ltd."

On 16th February, 1968, the Government of India intimated their decision regarding the abolition of the Pipelines Division with effect from 23rd February, 1968 with the result that the work of the Pipeline Division was entrusted to the Managing Director (Refineries Division) from the same date pending final arrangements.

"The permanent set-up of Pipelines organisation has since been finalised by the Board of Directors. Pipelines maintain a separate entity within the Refineries Division."

^{*}At the time of fectual verification ministry has informed "The lease however continued from 1 4-66 to 31-3-70 and formal transfer of the ownership has been effected from 1-4-70."

1.6. An independent examination of the Pipelines Division of the Indian Oil Corporation Ltd. has not been done either by the Estimates Committee or the Committee on Public Undertakings. But the working of the Indian Oil Corporation Ltd., and erstwhile Indian Refineries Ltd. had been examined by the Committee on Public Undertakings in 1966-67 and their recommendations observations are contained in their Thirty-fifth and Thirty-sixth Reports, (Third Lok Sabha). The replies furnished by the Government indicating the action taken by them on the recommendations contained in the Reports were considered by the Committee on Public Undertakings in 1968-69 and Reports thereon (Twenty-fourth and Thirty-ninth (Fourth Lok Sabha) were submitted to the House.

GAUHATI SILIGURI PIPELINE

The main features, working in financial and physical terms, Organisational and other related matters of Gauhati—Siliguri Pipeline are given below:

Main	Features	
(i)	Construction Contractors	 SNAM-SAIPEM Subsidiary of State owned Ita- lian Co ENI.
(ii)	Design Engineers and overall Supervisors	BECHTEL CORPORATION OF USA
(iii)	Date of commencement of construction	· 1-3-1963
(iv)	Target date of completion ·	· 31-8-1964
(v)	Actual date of completion	• 24-10-1964
(vi)	Length and inner diameter of pipeline	· 426 Km.—8"
(vii) Actual installed capacity ·	 480,000 M. Tonnes per year (Since increased to 559,000 M. Tonnes per year).
(viii	Project Cost:	
	Original estimates · ·	· Rs. 650 Lakhs
	• Final Estimates · ·	 Rs. 775 38 Lakhs increased to Rs. 847 38 Lakhs due to devaluation.

- 2.2. The maintenance of the pipeline is being done by Messrs. Oil India Limited, as this line has also been laid on the common Right-of-Way with their Oil crude oil line at an agreed rate of service charge.
- 2.3. The system provides for reverse flow facilities also, i.e., in case it is necessary to carry products from Siliguri to Gauhati, it can be done.

[•]Subject to variation on finalisation of Certain adjustments in capital account.

Working of the Pipeline

2.4. The Pipeline was commissioned in October 1964. During the last 4 years, a total of about 15.8 lakhs metric tonnes of petroleum products have been transported from the Gauhati Refinery to Siliguri terminal. The year-wise and product-wise break-up as well as the number of working days during the last 4 years was as follows:—

(figures in m. t.)

	196 5-66	1966-67	1967-68	1968-69
Motor spirit ·	137,517	135,204	128,793	130,244
Inferior Kerosene ·	65,383	41,024	50,350	48,859
Superior Kerosene.	• •	• •	6,904	
HS.D. · ·	163,588	170,344	157,322	170, 051
Diesel Oil · ·		16,056	62,372	51,350
Icmex · ·	• •	9,292	31,310	5,644
TOTAL ·	366,488	371,920	436,951	406,148
No. of days worked:	274	279	324	294

Percentage of Utilisation

2.5. The percentage of utilisation during last three years was as follows:

2.6. The main factors affecting the utilisation of the pipeline are—

1965-66	•	•	•		•	•		•	76.2
1966-67	•	•	•	•	•	•	•	•	76.6
1967-68	•	•			•	•	•	•	91 4
1968-69	•	•	•		•	•	•	•	84.6

- (a) the availability of products from the Refinery which in turn depends upon the capacity of the Refinery, and
- (b) off-take at the Siliguri terminal by the Marketing Division, in respect of both quantity and regularity.

2.7. The financial results of the working of the pipeline are given below:

	***	(Rupecs	in lakhs)
1965-68	1966-67	1967-68	1968-69
106 86	112 49	132 87	137 36
0 13	0 07	0.21	0 13
106.99	112 56	133 08	137 49
84.98	92 98	90.61	81.07
22.01	19.70	42 47	56.42
	5.63%	12 13%	16.12%
	106 86 0 13 106 99 84.98 22.01	106 86 112 49 0 13 0 07 106.99 112 56 84.98 92 98 22.01 19.70	1965-68 1966-67 1967-68 106 86 112 49 132 87 0 13 0 07 0.21 106.99 112 56 133 08 84.98 92 98 90.61 22.01 19.70 42 47

2.8. During the following two years, the profit are expected to be as follows:

***	a trapparetra committa Cont	40.00	21 2 3 1 1 1 mage	and the second second second	a talah sa	- Sale state a section of	(A) - N. Seminater (A) - Annual
	Ye	ar					(Rs. in lakhs)
	1969-70	•	•	•	•	56 32	*Subject to adjustment on finalisation of accounts.
	1970-71	•	•	•	•	63 45	As per budget Estimates.

2.9 In April, 1961 the Indian Refineries Ltd., requested Burmah Oil Company (Pipelines) to prepare a preliminary study for a pipeline from Gauhati Refinery to Siliguri. Accordingly B.O.C. (Pipelines) submitted a preliminary Project Assessment. Salient features of this study were:

Construction Design Data: The Study assumed the length of pipeline to be 250 miles of 8-5/8" O.D. pipe size initially capable of transporting 3,00,000 M. Tonnes of products per

- annum from Gauhati to Siliguri. One pump station having two pumps of 100 Hydraulic Horse Powers each was considered adequate for the above throughput.
- Capital Costs: Considering that the pipe required would be available from Rourkela Steel Plant, the study envisaged the total capital cost of the pipeline as Rs. 600 lakhs including a foreign exchange element of Rs. 200 lakhs.
- Annual Operating Costs: The operating costs were considered as Rs. 10.08 lakhs per annum. These costs, however, did not include depreciation finance and administrative charges.
- 2.10. Based on the above cost estimates and the operating costs, the cost of transporting the products by pipeline from Gauhati to Siliguri was considered as Rs. 11 per tonnes as against the corresponding Railway freight of Rs. 28 per tonne which could be reduced to say Rs. 25 per tonne on long distance traffic.
- 2.11. Later, in order to get a clear idea of the scheme a detailed study in the form of a Project Report was got prepared by M|s. Bechtel Corporation of U.S.A.
- 2.12. In reply to a Committee's question, it has been stated that M|s. Bechtels were introduced to the Indian Refineries Ltd. for the first time for the preparation of the project Report for Gauhati-Siliguri pipeline. In reply to another question as to how Bechtels were given the contracts, the Ministry have furnished the following extract from the Minutes of the meeting of the Board of Directors held on 3-7-1961:—
 - "....As regards the consultants for the preparation of the project report, Managing Director stated that there were three parties in view namely ENI of Italy, Bechtels Corporation of the USA and John Brown of the U.K.
 - The Bechtels Corporation have already worked in that area in 1965 and they recently indicated that they can prepare a report in about 4 to 6 weeks. In a recent telegram the Corporation have indicated the possibility of reducing the cost of the Project study and they may be able to persuade the World Bank or other agencies in the USA over the question of financing of the foreign exchange component of the project cost if we entrust to them the preparation of the project report."

2.13. The Ministry has further stated that-

"In the light of the foregoing the Board felt that in order to get a realistic picture on all the techno-economic issues it was necessary to obtain a project report and for this purpose the Bechtel Corporation may be entrusted with the work if the ENI credit is not forthcoming and subject further to the condition that a reduction in fee and other favourable terms can be secured."

- 2.14. The Ministry have further stated "At the meeting of the Board of Directors held on 10-10-1961 it was decided to carry negotiations with Bechtels Corporation for their undertaking the technoeconomic study. The relevant extract from the minutes of this meeting is reproduced below:
 - "Managing Director reported that the Government have since concurred in the proposal of IRL undertaking a techno-economic study of the product pipeline between Noonmati and Siliguri and sanctioned a foreign exchange not exceeding Rs. 50,000 for this purpose. From this discussion with the Government we understood that credit from ENI for this study and project is not available. Therefore, the alternative was to obtain this techno-economic study from Bechtel Corporation of U.S.A. He, therefore, sought the Board's approval to carry on negotiations with Bechtel Corporation for their undertaking the techno-economic study within the ceiling fixed by the Government. The Board approved of this."
- 2.15. Messrs Bechtel Corporation of U.S.A. were entrusted to prepare a feasibility Report on the Gauhati-Siliguri Products Pipeline at a total fee of Rs. one lakh—half of it being in foreign exchange.
- 2.16. In reply to a query it has been stated that the Board of Directors of Indian Refineries Ltd. recommended Bechtel as they had some years before carried out certain preliminary studies on such project for the Assam Oil Company and appeared to be in a position to prepare the report, as envisaged within a period of four to six weeks. The Government's approval to the appointment of the firm as consultants for the preparation of the Project report was received on the 1st December, 1961.
- 2.17. The Project Report was submitted in February, 1962. A summary of the same was sent to Government on April, 16, 1961 along with a request for sanction of the project. The pipeline project was expected to cost Rs. 600 lakhs. It was also pointed out that subject to approval being obtained by June, 1962 the pipeline could be commissioned by June, 1963.
- 2.18. Bechtels also reported on the estimated throughput and revenue for the period 1963 to 1972. According to that forecast, the throughput was to start with 457,000 tonnes in 1963, and decrease to 322,000 tonnes by 1972 making a total of 3,895,000 tonnes for 10

years. The gross revenue earned for the same period was to be Rs. 1596 lakhs. After deduction of operating costs, interest on debts and amortization of loan, the net earning before taxes for the ten year period was expected to be Rs. 564 lakhs. An increase in throughput of 200,000 tonnes per year was envisaged from 1966 on the basis of the proposed increase in the capacity of the Gauhati Refinery from 0.75 million tonnes to 1.25 million tonnes per year.

- 2.19. The Government of India conveyed their approval on 5-10-62 vide their letter No. 31/6/62-ONG dated 5-10-62 to the Managing Director Indian Refineries Ltd. which stated as follows:—
 - "I am also directed to convey the approval of the President to the Indian Refineries Ltd's proposal to entrust Bechtel Corporation Ltd. of USA with the design, engineering and the management of the project at a total cost of Rs. 41.20 lakhs (Rupees forty one lakh twenty thousand only) including foreign exchange cost of Rs. 18.21 lakhs (Rupees eighteen lakhs twenty one thousand only)".
- 2.20. The Ministry have stated "Whilst the study report was awaited, it was considered that the process involved in the examination of the report and in the receipt of Government's sanction for the project was time consuming and therefore, it was recommended that Bechtel Corporation be commissioned to undertake the designing of the pipeline project, preparation of tender documents etc., so that a start on the execution of the work could be made in the winter months."
- 2.21. The Ministry have further stated, "Bechtels were, therefore, apparently given the contract for design and engineering management for the Gauhati-Siliguri Pipeline primarily because of the experience that they had in that area."
- 2.22. The Committee pointing out that while approving the appointment of Bechtel Corporation for preparation of feasibility study in April, 1962, Government had stated that no other contract should be given to that firm without inviting global tenders and asked whether global tenders were invited before Bechtel Corporation was awarded the subsequent contract for Design Engineering and Supervision. The Ministry have in reply stated:—
- "In accordance with the resolution passed by the Board of Directors at their meeting held on 27th February 1962 the Sub-Committee of Directors met on 8th and 15th April, 1155(Aii) LS-2.

1962, to consider the project report submitted by Ms. Bechtel Corporation of U.S.A. for the Gauhati-Siliguri Project. In the minutes of the meeting of the sub-Committee the following was inter alia recorded:

- "....The Sub-Committee also went into the question of the fees demanded by the consultants in the event of their being engaged in the management of the construction, testing and commissioning work of the pipeline, and the guarantees offered by them. Managing Director mentioned that the question of fees asked by Bechtel Corporation for their services represented about 8 per cent of the total cost of the Project. As against this, the fees being charged by BOC (Pipelines) for similar services on the crude oil pipeline represented about 7 per cent of the total capital cost of the project (BOC Pipelines fees were Rs 3.13 crores on a total capital of Rs. 43.79 crores). On this basis there appeared to be a case for asking Bechtel Corporation to reduce their fees to 7 per cent. The Sub-Committee agreed with this view and requested the Managing Director to negotiate this point with the representatives of Bechtel Corporation.."
- "....In the light of the preceding discussion the sub-committee took the view that the scheme as recommended by M|s. Bechtel Corporation of U.S.A. should be approved and sent to Government for acceptance...."
- "....the sub-Committee authorised the Managing Director to approach the Government for sanction to the following:
- (i) Project being undertaken at a total estimated cost of Rs. 6 crores of which the Foreign Exchange component will be Rs. 1.3 crores.
- (ii) Bechtel Corporation being entrusted with the design engineering and management of the Project the remuneration payable being:—
 - (a) the reimbursable expenses for all services rendered outside U.S.A. at Rs. 19.75 lakhs of which 32 per cent will be payable in Dollars; and
 - (b) for services rendered outside India and towards fee for Betchels know-how services etc., a sum not exceeding Rs. 27.65 lakhs of which 43 per cent will be

payable in Dollars (M.D. will endeavour by negotiation with Bechtel to secure a reduction in the amount of this fee by about Rs. 6 lakhs)."

It has been further stated:

"The Board was apprised of the above decisions of the sub-committee at the meeting held on 28th May, 1962 and was also informed that Bechtel Corporation had since agreed to the reduction of Rs. 6 lakhs in their quotation for engineering services and management. At this meeting of the Directors suggested that it might be useful to call for tenders for engineering and management services in order to verify the reasonableness of the offer made by Bechtel Corporation particularly as some delay appeared inevitable in deciding the question of the product pipeline crossing the rail bridges. The Managing Director stated that a decision about the use of railway bridges was expected to be taken soon or alternaarrangements for independent crossing would be made. He also stated that in any case. as the Bechtel Corporation's offer compared quite favourably with the similar jobs executed elseand offers received for other jobs the calling of tenders at that stage would merely delay the project. The Board noted this clarificaand observed that a decision had already taken by the sub-committee of Directors empowered to deal with the matter."

2.23. The Government of India approved the Gauhati Siliguri Products Pipeline Project in October, 1962 and conveyed their intention to include this project in the Government of India ENI Credit Agreement of August, 1961. It has been stated that ENI were agreeable to do the entire construction of the Project under the Credit Agreement concluded with the Government of India in 1961. Under the Agreement it was open to IRL either to advertise and invite global tender or to negotiate with ENI. It is stated that if advertising were resorted to, there was no certainty that any other party would come forward with better terms than the one which ENI might offer in the context of the fact that M.s. Snam-Saipem of Italy in collaboration with Mis. Mannesmannsaiph of Germany had constructed the crude oil pipeline from Naharkatiya Barauni for Oil India. They besides the requisite experience and knowledge of the terrain of the route possessed the necessary construction equipment in India which could be immediately switched over to the Gauhati-Siliguri pipeline project if the work was entrusted to ENL

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- 2.24. It was, therefore, felt by I.R.L. that it would be expeditious and economical if the work was entrusted to E.N.I. after negotiating a turn-key contract with them with the assistance of M|s. Bechtel Corporation who had already been entrusted with the design engineering and the management of the project with the approval of the Government. The rates offered by Snam-Saipem for construction of the project and supply of imported material were carefully checked with reference to the charges earlier contracted for by Oil India Ltd. for their crude oil pipeline after receiving global tenders and the final offer of Snam-Saipem was considered as reasonable.
- 2.25. Accordingly, with the assistance of Bechtel Corporation negotiations started with the ENI and the construction contract was awarded to Snam-Saipem (belonging to ENI group of Italy) on the 15th January, 1963. The construction started on 1st March, 1963 and completed on all essential points by 31st August, 1964. Thus the time taken for completion of the Gauhati-Siliguri pipeline, which is about 426 Km. long, was little over 1½ years. Due to difficulties encountered with certain imported equipment during testing and start up, actual pumping tests could be undertaken only on the 15th October, 1964, and regular operations started on the 25th October, 1964, with the pumping of motor spirit.
- 2.26. In reply to the Committee's query as to what were the basis for not inviting global tenders for the construction of pipelines and who was responsible for it, the Chairman, IOC stated that in respect of the Gauhati-Siliguri Pipeline, they had decided to entrust the work to the party who had experience and the knowledge of the terrain of the route. The Chairman added, "In the Agreement concluded with the Government of India in 1961, it is open to the Indian Refineries Ltd. (IRL) either to advertise and invite global tenders or to negotiate with an Italian firm E.N.I. The process of advertising is time consuming and even after advertising it is not certain that any party will come forward with better terms than one which ENI may offer."
- 2.27. He added, that "MIs. Saipem of Italy in collaboration with Mis. Mannesmann of Germany have already constructed the crude oil pipeline from Naharkaitya to Barauni and they have, therefore, the advantage of necessary experience and knowledge of the terrain of the route, besides possessing the necessary construction equipment in India, which could immediately be switched over to G.S. pipeline project, if the work was entrusted to E.N.I." From this point of view "it is considered that it will be expeditious and economical if the work is entrusted to E.N.I."
- 2.28. The matter was also referred to the Board of Directors, wherein it was proposed to negotiate the turnkey contract with ENI for the construction of the product pipeline from Gauhati to Siliguri

with the assistance of Mis. Bechtel Corporation of USA, who would also be responsible for designing, engineering and the management of the project.

2.29. The Committee find that there were three reasons mentioned at the meeting of the Board of Directors of Indian Refineries Ltd. of 3rd July, 1961, for preferring Bechtels to ENI of Italy and John Brown of U.K., for the preparation of the Project Report.

First that Bechtels had worked in the area in 1955. Secondly that Bechtels would prepare the Project Report in about 4 to 6 weeks and finally they might be able to "persuade the World Bank or other agencies in the USA on the question of financing the foreign exchange component of the Project". The Board of Directors had, however, clearly directed that Bechtels might be entrusted with the work "if the ENI credit is not forthcoming."

2.30. The Committee would, therefore, like to take up first the non-availability of ENI credit. The Minutes of the meeting of the Board of Directors held on 10th October, 1961, show that the Managing Director reported that "from his discussions with the Government, we understood that credit from ENI for this study and Project is not available."

In this connection, the Committee would like to recall that the agreement with the ENI for foreign credit was concluded by the Government of India in August, 1961, and it was Government's intention to utilise it for Pipeline Projects also. It stands to reason that if the credit was available for the Project costing over Rs. 6 crores as a whole, it should have been possible to accommodate an expenditure of a few lakhs which would have been incurred on the preparation of the Project Report.

Further, it was obviously in the interest of Snam Saipem (belonging to ENI Group) to prepare the Project Report, which would have greatly facilitated the execution of the Project by them.

2.31. Even if for the sake of argument, it is assumed that ENI credit was not available for preparation of the Project Report, the Committee are unable to understand how Bechtels could be singled out for being entrusted with this work, specially when it is on record in the Minutes of the meeting of the Board of Directors of 3rd July, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of Italy, 1961, that "there were three parties in view namely ENI of I

- 2.32. The Committee are not inclined to give much weight to the experience claimed by Bechteis as it related to 1955 (6 years earlier). If experience was the criteria, the Committee could understand the work of preparation of the Project Report being entrusted to B.O.C., who had earlier prepared preliminary Project Report for this Pipeline and were actively associated about this time as technical supervisors with a bigger pipeline project for carrying crude oil from Naharkatiya to Barauni, and who had also experience of dealing with Snam, the contractors who were ultimately could understand the execution of the Project.
- 2.33. Another advantage claimed for Bechtels is that they would "Prepare a Report in about 4 to 6 weeks." The Committee are not able to attach much importance to this claim as in actual fact the time taken for concluding the agreement with Bechtels for preparing the Project Report after their name was first mooted in the Board meeting of 3rd July, 1961, amounted to nearly 5 months (the agreement was concluded only in December, 1961).
- 2.34. As regards the claim that Bechtels might be able to "persuade the World Bank or other agencies in the USA on the question of financing of the foreign exchange component of the Project", the Committee need only point out that in actual fact the Corporation/Government decided not to call for global tenders, and entrusted the Project to Snam Saipem (belonging to ENI group) to be financed from ENI credit, agreement for which had already been concluded in August, 1961 i.e. four months before Bechtels were formally commissioned for the Project Report.
- 2.35. The Committee are unable to accept that ENI credit was not available for the Project study in October, 1961, for they find that Government had informed the Indian Refineries Ltd. on 17th October, 1961, that the Project Report for Barauni-Calcutta, Barauni-Delhi-a bigger pipeline-had been entrusted to Snam Progetti (belonging to ENI group). If, therefore, the Project study of a bigger pipeline project could be entrusted to Snam Progetti (belonging to ENI group) by Government at that time-October, 1961—the Committee are unable to understand how Indian Refineries Ltd./Government could persuade themselves to entrust the Project study of Ganhoth-Siliguri pipeline to Bechtels to the exclusion of others. As the miduction of Bechtels in the pipeline project on unfounded gratinds has led to several complications later in this and Haldin-Baratani-Kampur pipeline project, the Committee cannot but take airtave view of this failure of IRL/Government to mp the mischief in the budie ?

d international standing

2.36. The Committee wire even more puzzled by the decisions of IRL Government to appoint Bechtels as design engineers and over-

all supervisors for this pipeline and pay Bechtels as much as Rs. 51.26 lakhs in rupees (Includes Rs. 22.48 lakhs as Income Tax liability) and 2.86 lakhs dollars (Rs. 13.63 lakhs).

- 2.37. The Committee note that one of the Directors of IRL had pointed out at the Board meeting held on 28th May, 1962, that it might be useful to call for tenders for engineering and management services in order to verify the reasonableness of the offer made by Bechtel Corporation." The Committee are unable to appreciate how this reasonable proposition was talked out of hand on the ground that "Bechtel Corporation's offer compared quite favourably with similar jobs executed elsewhere and offers received for other jobs", and "the calling of tenders at that stage would merely delay the Project". It is also on record that the Board noted "this clarification" and observed that "a decision had already been taken by the Subcommittee of Directors empowered to deal with the matter."
- 2.38. The Committee are unable to appreciate how the Board of Directors could allow an issue which involved payment of nearly half a crore of rupees to be peremptorily taken out of their purview and considered judgment merely because they had asked a Subcommittee of their own Directors to go into the matter.

The Committee are baffled how a part of a directing body could dictate in this manner to the parent body to the detriment of public interest.

- 2.39. Moreover, the claim that the offer of Bechtels "compared quite favourably with similar jobs executed elsewhere and offers received for other jobs" is open to question. It is on record that BOC pipelines fees for Naharkatiya-Barauni pipeline amounted to about 7 per cent of the capital cost. At the relevant time, the estimate of capital cost of Gauhati-Siliguri pipeline was Rs. 6 crores while the amount paid to Bechtels has worked out to Rs. 51.26 lakhs in rupees (Includes Rs. 22.48 lakhs as Income Tax liability) and 2.86 lakhs in dollars (Rs. 13.63 lakhs) which would wor out to 10.81 per cent, a much higher percentage than 7 per cent.
- 2.40. The Committee would also like to point out that Government sanction (vide letter No. 31662-ONG dated the 5th October, 1962) was for the IRL proposal to entrust Bechtels with "the design engineering and the management of the Project" at a total cost of Rs. 41.20 lakhs including foreign exchange cost of Rs. 18.21 lakhs." The Committee would like Government to verify whether payment in excess of their sanction was made, and if so, by whom and on what authority, and fix responsibility for the lapse.
- 2.41. To conclude, the Committee are not able to appreciate the reasons why Indian Refineries Ltd./Government did not invite offers for undertaking engineering and supervision work from several

well-known experienced parties of national and international standing before favouring Bechtels with the assignments on rates which proved to be far from competitive and without any commensurate benefit.

2.42. The Committee are also not able to appreciate why Indian Refineries Ltd. Government did not call for global tenders for execution of the Project specially when the ENI credit which was ultimately availed of for the Project contained a specific provision to the effect that IRL could "advertise and invite global tenders". While the Committee appreciate that Snam Saipem had the experience and knowledge of terrain, it would not have been unreasonable to expect that Snam Saipem would have offered even more competitive rates to gain the new contract in the face of keen competition by firms of national and international standing who were openly evincing keen interest in the work. The Committee need hardly point out that ENI group of companies had already their machinery equipment and men in the country for execution of the Naharkatiya-Barauni crude pipeline and it was obviously in their interest to gain another pipeline contract. The Committee are of the view that had global tenders been invited nothing would have been lost, while there is every reason to believe that IRL would have considerably gained by inducing the firms to give most competitive offers in respect of cost and accommodation for foreign exchange component of the Project.

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HALDIA-BARAUNI-KANPUR PIPELINE

Haldia-Barauni-Kanpur Products Pipeline is comprised of two major sections namely:—

(a) Barauni-Ka	npur · 688 Km. line, and
(b) Barauni-Ha	sldia 524 Km. line plus a branch line of 58 Km. from Baradabar to- Maurigram.
Main	Features—Barauni-Kanpur line

- (i) Construction Contractors: SNAM-SAIPEM
- (ii) Design E. gineers · SNAM-PROGETTI
- (iii) Project Managers and
 Design Monitors

 Bechtel Corporation up to 30-6-65
 and thereafter Pipelia Division of IOC.
- (iv) Date of commencement of construction October, 1964
- (v) Target date of completion 30-6-1965
- (vi) Actual date of completion. 17-8-1966
- (vii) Reasons for the delay (if any)

The delay was largely due to late completion of rail bridge crossings, delivery stations and pump stations

- (viii) Length & inner diameter of the pipeline . . . 60
 - 668 Km. -12" dia.
- (ix) Actual installed capacity
- 1,512,000 M. T. per annum.
- (x) Capital cost of the pipeline Rs. 1450.34 lakhs (Approx).

(Subject to certain adjustments to be carried out in the matter of final payments to the contractors)

Working of the Pipeline

3.2. The pipeline was commissioned on 26.9.1966 and since them a total of 10,57,866 metric tonnes of petroleum products have been transported from the Barauni Refinery to the delivery points of

Marketing Division at Patna, Allahabad, Mughalsarai and Kanpur till 31-3-1969. The product-wise break-up as well as the number of working days are given below:

(Pi	odu	cts in(M T) }			1966-67	1967-68	1968-69
Motor Sp	oirit		•		demail sebble mes.	44,337	147,450	126,710
Superior	K.	rosene				14,926	52,125	40,540
H.S.D.	•	•			•	38,566	240,542	32 0,242
					•	97,829	440,117	519,920
					(including 32	,428 of inferi	or Karose c
Number	of	days	wo:ke	d		25	117	128

- 3.3. The percentage of utilisation was 6.4 per cent in the year 1966-67 and 29.1 per cent in the year 1967-68, and 34.4 per cent in 1968-69.
- 3.4. The financial results of the working of the pipeline are given below:—

Income	1966-67	1967-68†	1968-69	
	(T	ls. in lakhs)		
Freight recovery from Marketing Division Miscellaneous	21 • 64 0:13	203.62 0.29	235.08 0.36	
	. 21.77	273 91 ,	23 5 · 44	
Operating expenses including de- preciation	71 89	173 47	160-11	
Net Loss (—)	50 12	(+)30 44	(+)75-33	

The initial phase of the operation was upto Patna which was subsequently extended upto Kanpur in March 1967. The pipeline is running satisfactorily.

3.5. The pipeline is expected to show the following profits* during the current and the next four years:

-				- y ca						
							(Rs. in	lakhs)		
1969-70	•		•	•	•	•	150-1	15		
1970-71	•	•	•	•	•	•	224.	10		
1971-72	•	•	•	•	•	•	390.6	55		
1972-73		•				•	429 -	20		
3·6. Main Featu	res—	Barau	mi—F	laldıa	Pipe	line				
(i) Constructio	n Cor	itract	ors ·	Sna	ım-Sai	ipem				
(ii) Design Eng	gineer	3		Sna	m-pro	getti				
(iii) Design Mor ject Manag		and.	Pro-	and		lines		up to 30-6-65 sion of IOC		
(iv) Date of com		emen	t of		rch	1964				
(v) Target date	of c	omple	etion	30	-4-19	65				
(vi) Actual date	of co	omple	tion			con 7, 196		was completed		
(vii) Reasons fo	r the	dela	y .	la	nd :	acquis	ons for ition i way per	delay were the for the pump mits etc.		
(viii) Length and Inner diameter of the pipeline .					r Haldia-Barauni 524 Km. Baradabar Maurigram 58 Km.					
							Total:	582 Km.		
							Both	12"		
(ix) Capital Cost (Up to 318	of p	oipelii ch, t	ne 968)	1	subjec se car	t to (ried	certain a	approximately), djustment yet to the matter of ontractors.		

^{*}At the time of factual verification, the Ministry gave the following figures of profits during the years 1969-70 & 1970-71:—

1969-70 Rs. 195.00 lakhs (subject to adjustment on finalisation of account)

1970-71 . Rs. 172.27 lakhs (As per budget estimates)

3.7. The Pipeline from Barauni to Maurigram was commissioned on 23rd Sept. 1967 on trial run, in stages, except a small portion from Baradabar to Haldia which was commissioned on 2.8.1968. Since commissioning, a total of 456.973 M. tonnes petroleum products have been transported from Barauni Refinery till 31.3.69. The product-wise break-up as well as the number of working days are given below:

						1967-68	19 68-69	
Product (uct (in M. T.)			M.		. Tonnes	M. Tonnes	
Motor Sp	irit ·	n conjunction to	THE COURSE OF SPECIAL PROPERTY.		•	98,953	269,291	
Superior '	Kerosene	•		•		2,636	19,852	
H.S.D.	•	•	•	•	•	6,031	60,210	
						107,620	3,49,353	
No. of	Working	days	;			33	91	

3.8. The pipeline is expected to show the following profit* during the next four years:—

(Rs. in lakhs)

Madrial control of the control of th	aja ar asabans ing un		· Arabahan meriki adilanda	- Archester - militare my degr		(
1969-70	•	•	•	•	•	•	•	41.70		
1970-71	•	•	•	•	•	•	•	98. 50		
1971-72	•	•	•	•	•	•	•	130 63		
1972-73	٠	•	•	•	•	•	•	215.35		
allend bender statement of the statement		to the second second								

3.9. Like the Gauhati-Siliguri Pipeline Project, the Haldia-Barauni Kanpur Pipeline Project was also financed from the ENI credit Agreement. Accordingly, an offer was received from Snam Progetti (a Design Engineering Company of the ENI Group of

1969-70 . 15.00 (subject to finalisation of accounts for the year).

1970-71 . 20.01 (As per Budget Estimates).

^{*}At the time of factual verification, the Ministry gave the following figures of profits for the year 1969-70 and 1970-71:— (Rs. in lakhs.)

Italy) for the preparation of preliminary project Report and tender documents, which were accepted by the Government of India for a total fee of Italian Lire 40.5 million. Whilst the preliminary project Report was awaited, Snam Progetti submitted another offer for the preparation of a detailed project report, which, on an examination by the Board of Directors was accepted at a total fee of Rs. 39 lakhs. The original scope of the Project was to lay the pipeline from Calcutta-Barauni and Barauni-Delhi, but in the light of the Government's decision given in early 1963, the former sector was changed to Haldia-Barauni. It was also decided to lay a branch line from Baradabar to Haurigram so as to feed the Calcutta area. On the Barauni-Delhi Sector, it was decided to lay the pipeline upto Kanpur only as it was felt that the products beyond Kanpur towards Delhi could, with advantage, move by rail road. The cost estimated for Haldia-Barauni-Kanpur with necessary pumping stations about Rs. 29 crores (covering a length of 723 miles of pipeline with a diameter of 12"). The discussion with the Government revealed that, in view of the foreign exchange available from the ENI Credit Agreement negotiations for executing the project might with advantage be undertaken with ENI with the assistance of Bechtel Corporation to advise on certain aspects of designs. A series of discussion were accordingly held with the representatives of ENI and Bechtel Corporation, which resulted in bringing down the estimate of Rs. 29 crores to Rs. 26 crores. It also included the cost of turnkey contract to be awarded to Snam-Saipem a total value of Rs. 13.4 crores which included the supply of all the material and equipment required for the pumping stations etc., but excluded the cost of the pipes and telecommunication system.

- 3.10. Following these negotiations, four contracts were signed with the following parties for the construction of Haldia-Barauni-Kanpur Pipeline after obtaining Government's approval:--
 - (i) Snam-Saipem in July, 1963.
 - (ii) Bechtel International Ltd., March, 1964, and
 - (iii) Bechtel International Corporation Ltd., in February March, 1964; and
 - (iv) Bechtel Asian Corporation in June, 1964.
- 3.11. The Barauni-Kanpur Section of the pipeline was completed in August, 1966 and its commissioning in gradual stages commenced on the 26th September, 1966. Construction of the main line of the Barauni-Haldia section was completed by May, 1966—and trial run with water completed by 2nd June, 1966.

- 3.12 Asked by the Committee whether any fresh Detailed Project Report was prepared after it was decided to change the Barauni-Calcutta and Barauni-Delhi pipelines to Haldia-Barauni-Kanpur, the Ministry have in their Note stated:—
 - "In the Government ENI agreement of August, 1961, a product pipeline from Calcutta to Barauni to Delhi was envisaged. This was intended primarily to transport the products of the Barauni Refinery but certain products might have to be imported through Calcutta to feed the U.P. and Delhi areas might also be moved: ENI asked to prepare a detailed project report and also, save time, to go-ahead with the engineering of the sys-The Preliminary project Report of June, 1962 envisaged for the Barauni-Calcutta section, two products pipelines one 8" line for the movement of products from Barauni to Rudrani (70 miles short of Calcutta) and the other for the movement of imported products from Calcutta (Budge-Budge) to Barauni, the second line being 8" from Budge-Budge upto Asansol and 6" from Asansol to Barauni. The project report also considered the possibility of having one 12" line between Barauni and Calcutta through which the products could move in directions and came to the conclusion that it would be more economical to have the 2 lines of a smaller diameter mentioned above. In support of the proposal to lay pipeline from Calcutta to Barauni, the project report took into account the quantities of imported products would be moved initially by pipeline to Asansol and from there distributed to destination points by rail road. It also envisaged a 12" line from Barauni to Delhi."
- 3.13. "On examination of the above proposals, it was found that there was no justification for the two proposed lines between Calcutta to Barauni consistent with the economics of marketing and the quantities of products likely to be available for movement from Barauni or needed to be moved in the reverse direction."
- 3.14. The Ministry have further stated that the decision to construct pipeline upto Kanpur only was based on the considerations firstly that the bulk of the products of the Barauni Refinery even on 3 million tons throughout would be absorbed at Kanpur well before 1971 and secondly that meeting the demand beyond Kanpur from imports through Calcutta would be unsound having regard to the pattern of pricing of supplies derived from alternative ports (Bombay, Kandla and Calcutta). The Ministry have also added that—
 - "ENI concurred in these conclusions and produced in October, 1962 fresh e timates for (a) 8" line from Cal-

cutta to Barauni; (b) a 10" product-cum-crude linef rom Calcutta to Barauni; and (c) a 12" product line from Barauni to Kanpur."

3.15. In January, 1963 in the context of Emergency, it was decided that as a measure of abundant safeguard, pipeline from Haldia to Barauni should be built for a possible transport of 3 million tonnes of imported crude oil. In normal times (i.e. when uninterrupted supplies of crude oil are available from Assam), the line will work as a product pipeline as earlier envisaged though line capacity would be greatly under-utilised. For the objective aimed at, ENI suggested that the pipeline would have to be of 12" diameter size and that greatly increased pumping capacity must be provided. In March, 1963, ENI gave following estimates of costs:

(a) 12" line from Haldia to Barauni Rs. 13.50 crores-

(b) 12" line from Barauni to Kanpur Rs. 15.57 crores.

3.16. The Board of Directors approved the above estimates and desired that Government be addressed to sanction the estimates. Accordingly in March, 1963, IRL requested the Government for approval to the execution of the project at an estimated cost of Rs. 29.07 crores. After this the execution of the project and the estimates for the work were the subject of a number of discussions with the Government. In July 1963, IRL approached the Government for approval to (a) IRL entering into a contract with SNAM for the total value of Rs. 13.44 crores with a foreign exchange component of Rs. 6.22 crores to be financed from ENI credit and (b) the estimated project cost of Rs. 26.42 crores

3.17 The Ministry have concluded:—

"No fresh project reports as such were prepared consequent upon the changes made from time to time mentioned above. However, the economics of the project had been gone into in sufficient detail in the project report which established that the pipeline movement would cost in this case about 40 per cent of rail freight. Further the justification for the project was based on the necessity of adopting modern and reliable means of transportation of a growing volume of oil products in the country. Asked whether the considerations which led to the decision of constructing pipeline upto Kanpur only were lost sight of at the time of entering into Agreement with ENI in 1961 and preparation of DPR which envisaged Calcutta, Barauni-Delhi, the IOC in a written reply has stated that

- the Ministry of Mines and Fuel after examining the problem of movement and distribution of the oil products in Eastern India supplied to ENI the figures for processing the study of the following pipelines:—
- "(i) Barauni-Delhi. Passing through (or near enough to serve) important consumption-transport points and route including Patna, Mughalsarai or Varanasi, Allahabad, Kanpur and Agra.
 - (ii) Barauni-Asansol, Calcutta (Budge Budge) with the possibility also of the pipeline terminating at proposed new subsidiary port at Haldia south of Calcutta."
- 3.18. The above was done at the time of negotiating the Government of India-ENI Agreement of August, 1961.
- 3.19. The preliminary project report of June, 1962 received from Snam and studies conducted by Indian Institute of Petroleum received in August, 1962, was examined by IRL. The Indian Institute of Petroleum recommended that oil products from Barauni should be piped only upto Kanpur. It was further stated that Delhi and Tundla areas were one of the natural markets for the petroleum products of the Koyali Refinery. ENI, who were consulted on this point, agreed to modify the project accordingly.
- 3.20. During the course of evidence of the Ministry of Petroleum & Chemicals and Mines & Metals, the Committee enquired from the Special Secretary of the Ministry as to why ENI was allowed to commence the engineering works before the completion of the Detailed Project Report and whether any special advantage was gained by such procedure or not. The Special Secretary of the Ministry informed the Committee as follows:—
 - "It appears that the main and possibly the compelling final reason for following this procedure was that in the interest of speed. The documents recorded at that time indicate that both the Government as well as the Board of Directors of IRL considered that it would be possible in this way to start the work in the 1962-63 working season. The Engineering works, as it is now described, was simultaneously started with the Preliminary Project Report. This speed was also achieved, even it were considered to be a mistake in retrospect. This was also achieved at small cost, the amount involved being Rs. 39 lakhs.

As it happens, no advantage was in fact gained because of certain complicating factors which could not be envisaged at that time. The complicating factors were these:

- First of all, the Chinese Invasion occured in 1962. Soon after that, at one stage, Government thought that this particular project (pipeline project) at that time should be put in the cold-storage for various reasons. Soon after that, at the end of 1962, Government reviewed the whole situation and thought that it would be useful to go ahead with the Project at a much greater speed, though with a partially different objective. The objective was to construct the Barauni-Haldia Pipeline as a two-way pipeline carrying the products normally, but with the ability carry crude in case there was a crisis as a result of which the Assam was cut off. The whole project has to be revised again and its whole scope changed considerably. The reason for the decision to go in for detailed Project Report planning was to achieve speed, particularly to achieve the working season 1962. In fact certain complications occurred which could not be envisaged at that time."
- 3.21. To another question whether the Ministry had any detailed Project Report, the representative of the Ministry informed the Committee that they had got preliminary project report and afterwards they had the executive project report containing work specifications of the project and these two constitute the Detailed Project Report. The representative of the Ministry informed the Committee that on 12.10.61, Government of India had accepted the offer of ENI for the preparation of the Project Report and tender documents. In January, 1962, they were asked to prepare the executive project Report.
- 3.22. The preliminary project was received in July, 1962 and the executive project report started coming in the form of drawings and specifications in 1963 and was finally completed in 1966.
- 3.23. To a question as to when the project for Haldia-Barauni pipeline was sanctioned, the witness informed the Committee that the sanctioning of the Project might be considered in two parts. It was accepted in principle as an dejective by the Cabinet decision made in January, 1963. Formal sanction to go ahead with the particular contract to achieve the project was given by Government on the 31st July 1963.
- 3.24. To another question whether it was Government's decision that instead of one pipeline for transport of imported crude oil, two way pipeline should be laid, the witness informed the Committee that the decision was in terms of using the already planned pipeline from Barauni to Calcutta in a manner so that it could take two way transport of products, if things were normal, and of crude, if there was a crisis.

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3.25. As the two contracts for Gauhati-Siliguri Pipeline and Haidia-Barauni-Kanpur Pipelines were not placed simultaneously and there was some time lag in between the two, the Committee felt that there was no great hurry for the second contract, and therefore nothing could have been lost if global tenders had been invited. Since there were 9° companies interested in the job and all of them were even ready to provide the foreign exchange as credit, the Committee enquired the reason for not doing so. The witness stated, "As a matter of fact, there was an original thinking in the Ministry on 15th May, 1963 that Global tenders might be invited from USA, France, U.K. etc. Subsequently further discussions were held. I quote from a letter written by the management of the IRL to the Secretary, Government of India, Ministry of Mines & Metals, dated 6th July, 1968. It says:

"The execution of this project has been the subject of a number of discussions with the Government, the final outcome of which was as follows:—

- (i) The execution of the project may be settled by negotiation with the concerned ENI company. An earlier decision to invite tenders from a number of selected companies being given up, mainly because of the probable difficulty of finding the foreign exchange involved and also because of the likely delay in execution"
- 3.26. The Committee wanted to know whether the other companies which had offered credit were in a position to give it or not. The witness stated as:

"There is some record of 15th May, 1963 which I quote: 'As regards the main pipeline, Shri Nayak stated that several companies had offered to undertake the work, and in addition expressed the possibility of furnishing credit..."

Asked whether this aspect was examined the witness stated:

"There is nothing on record, except that there have been some discussions between the Ministry, the Government and the Management of IRL, and this was decided. It was thought thereafter that credit may not be available...."

The Committee pointed out that that was all conjecture and there was no basis on which that decision was taken.

The Chairman, IOC stated:

"At that stage, and even today, we face so many difficulties about the procurement of foreign exchange. The foreign exchange availability is a very very major factor. We

[•]The names of firms which had expressed interest intending for the execution of H B.K. pipeline with their capacity and reference, are given in appendix I.

- cannot ignore that. And then it would have meant looking for foreign credit, which would have lost three or four months unnecessarily."
- 3.27. To another question, if global tenders had been invited it would have indicated whether the IOC figures of contract were reasonable or not, the Chairman, IOC stated as follows:
 - "Global tenders would have given us a more certain picture, but the fact remains we would have lost four months and unless the possibility of free foreign exchange was there, there was no point in floating the global tender."

The Chairman, IOC added, "My candid opinion is if I am given free foreign exchange, I am definite free to get a competitive price."

- 3.28. Asked whether it was within his power to call for tenders or not, the Chairman, IOC stated, "In this particular case the power lay with the Board and not with the Managing Director, but he was in touch with the Ministry throughout and there were discussions with the Ministry and decision taken. As the quantum of money involved was above Rs. 50 lakhs and free foreign exchange was also involved the Company could not take the decision without the approval of the Government."
- 3.29. The Committee pointed out that there seems that no effort to get the competitive rate even for the second project had been made by IOC and asked, whether it was pressed upon the Ministry of Economic Affairs that the country would gain if free foreign currency could be found, the witness stated that at the meeting held for the purpose a representative of Economic Affairs was also present, who said that the foreign exchange picture would become clear only after the consortium meeting, but it appeared unlikely that U.K. credit would be available as it's position was not as good as it was before. The Committee asked whether the Department of Economic Affairs specifically said that I.O.C. must limit only to the Italian credit. The Chairman, IOC, stated that "Between 15th May and 6th July, 1963 there were a number of discussions with the Government and decision was that we should go ahead with ENI. When the Government approved, it meant it went to Economic Affairs. It was not without their consent. They were fully in the picture"
- 3.30. The Committee enquired from the Chairman, IOC as to what was the special advantage in two sets of engineering firms in respect of Gauhati-Siliguri products pipeline and Haldia-Barauni pipeline whereas for koyali-Ahmedabad pipeline, the work for construction and designing was entrusted to only one group of firms i.e., ENI. The Committee further wanted to know whether it would not have been economical to entrust the whole job to one group of engineers which would have avoided duplication of work and extra payment.

3.31. The Chairman, IOC informed the Committee as follows:-

"These are two jobs, One is designing, engineering, drawings and construction. The other is monitoring them and supervisory work. It is not good to entrust all these jobs to a single firm. They wanted to have experts who could monitor design and do construction supervision also. At that stage we did not have expertise for all these jobs within India. We got exports by this time Gujrat pipeline came. We did monitoring and construction supervision ourselves. Before that Gauhati Line and HBK Line, we had to depend on foreign firms."

"The other point, whether it cost more or less, I have to say that all these jobs cost a certain amount of money. If you enstrust the job to the same party the amount may be same. If you entrust to an outside party to supervise the construction it will cost more. I would hesitate to give it all to one party. It is just like when you construct a house, the contractor builds it, but you rely on the architect for supervision."

3.33. To another question as to whether it was a fact that payments a fact that Bechtel started working for IRL before signing of contract, the Chairman, IOC replied as follows:—

"The contract was signed later and as the requirement of the job wanted consultation with them, they were associated earlier."

3.33. To another question as to whether it was a fact that payments were made to Bechtel in respect of H.B.K. Pipeline before the contracts were executed, the Chairman I.O.C. stated as follows:—

"The reimburseable payments in rupees were made to them before the contract was signed. But the dollar reimburseable payments were made only after the contract was signed. When they were operating, some payments had to be made to them to cover the expenditure in India. So, the Indian rupee reimbursement was made before the contract was signed while the dollar payment was made only after it was signed."

3.34. Asked as to when the first payment was made to the Bechtel in respect of H.B.K. Project, the Chairman IOC informed the Committee as follows:—

"The first payment was made to Bechtel in December, 1963 in rupees while the dollar reimbursements were made on the 26th October, 1964 after signing of the contract."

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- 3.35. Asked by the Committee as to what was the normal procedure for payments, the Chairman I.O.C. stated as follows:—
 - "Strictly according to financial codes..... The normal procedure is to make payment only when the contract is signed and the work is to start thereafter. But it depends upon the exigencies..... As soon as the work starts, payment have to be made to the contractors, even though formal contract may not have been signed at that time. "Work done payment made" that is the theory."
- 3.36. Asked whether the IOC was satisfied with the duties and responsibilities discharges by the contractors, design engineers and overall supervisors and project managers, the Corporation has in reply stated:
 - "We are satisfied with the performance of duties and responsibilities by the Contractors, Design Engineers and Overall Supervisors and Project Managers to a large extent. However, in regard to two matters (design capacity and corrosion of a portion of the Haldia-Barauni pipeline) it was noticed, recently, that there had been some delay/failure on the part of SNAM and Bechtel. SNAM have since given suitable compensation for making up the shortfall in the capacity of Haldia-Barauni pipeline for movement of crude. They have also since repaired the corroded portion of the pipeline under an agreement reached with them in the nature of a package deal, whereby the cost of repairs and some materials was borne by SNAM and IOC had to incur an expenditure of about Rs. 4 lakhs on the supply of materials for the job. The exact nature and extent of lapses on the part of Bechtel and others concerned is being looked into by a Sub-Committee of the Board of Directors of IOC."
- 3.37. The Committee after examining all the material submitted to them by Government I.O.C. and also after taking evidence asked certain questions to elicit further information. The fresh set of information has been submitted to them by the Ministry/IOC on 13th April, 1970, as asked for by the Committee vide the L.S.S. letter No. 16 (PU)-68, dt. 28th March, 1970. After examining this material the Committee have noted the following facts regarding Haldia-Barauni-Kanpur Pipeline:
- 3.38. In May, 1967, the designed capacity of Haldia-Barauni pipeline was examined by Pipeline engineers, and it was found that the actual capacity of Haldia-Barauni Pipeline for transportation of crude oil was lower than 2 million tonnes per year.

- 3.39. The findings of the Pipeline Division have been spelt out by the Director-in-Charge of Pipeline Division of I.O.C. in a note dated 16th May, 1967, for the consideration of the Board of Directors of the Indian Oil Corporation. The note inter alia states as follows:
 - "A Committee of six engineers in the Pipelines Division was recently asked to examine these specifications in the light of the hydraulic gradient of the Haldia-Barauni pipeline. the specification of the pipe and the maximum pressure which can be built up by the pump installed. It was found that even with all the pumps at Haldia, Burdwan and Asansol working 24 hours a day for 335 days a year. it is not possible to deliver more than 1,774,800 metric tons of Kuwait type of crude to Barauni. If the crude is lighter (like Agha Jari) the quantity will be even smaller. However, it may be pointed out that it is not usual that all the pumps will work all the time and according to SNAM's own design concepts, as followed in the pumping stations at Gauhati, Barauni and Mughal Sarai, one pump at least is always kept as a stand-by and the station is assumed to work 8000 hours per year. Therefore, under normal operating conditions, even with 335 x 24 hours pumping, when provision for stand-by pumps is kept as would be necessary at Haldia and Asansol, the quantity of crude that can be delivered at Barauni will be less than even 11 million tonnes per year.
 - This discovery of the shortfall of line capacity means that SNAM Progetti has failed in more than one document forming part of their contractual obligations to make a correct statement of what the pipeline capacity is. Even Bechtel who was closely associated on our behalf in the examination of the design and engineering failed to notice this anomaly."
- 3.40. The Board of Directors of the Indian oil Corporation decided at a meeting held on the 1st July, 1967 that "the Chairman may go into the entire matter and place his findings before the Board for further action."

The Board at its meeting held on 27th November, 1967 considered a note submitted by the Director-in-Charge, I.O.C., Pipeline Division. on the subject of review of payments to SNAM Ltd., and decided that "no payment should be made to SNAM Ltd. for the time being," and constituted a sub-Committee of Directors, consisting of the Chairman, Shri S. K. Guha, Shri M. V. Rajwade and Shri R. S. Gupta for "(i) a detailed study and report to the Board, and (ii) holding discussions without delay with Messrs. SNAM and other and to take action thereafter in the matter at their discretion."

- 3.41. The Sub-Committee of the Board of Directors held several meetings between the 18th and 23rd December, 1967, 12th January to 24th January, 1968, with their (SNAM's) delegation led by Dr. Gasparine, and with the representative of Bechtel, Mr. H. McCanish from 12th to 18th January, 1968. The report of the Sub-Committee of Directors was circulated by a note by the Chairman, IOC, dated 25th January 1968 and was considered at a meeting held in Hyderabad on 3rd February, 1968. An extract from the minutes of the meeting is reproduced below:
 - "Item No. P|45: Before taking up the next item of the agenda, the Board decided to proceed with report of the Sub-Committee constituted vide item No. P|33. The Secretary pointed out that on the same subject, a note has been desired to be circulated by Shri S. K. Guha Director-in-Charge as also another item has been circulated by Pipelines Division (i.e. item No. P|42).
 - The Chairman pointed out that the Director-in-Charge had signed the Sub-Committee's report and as such asked the Director-in-Charge if he still desired the note to be circulated as also the item No. P|42 already circulated, to be discussed.
 - With the permission of the Chair, Shri S. K. Guha, withdrew item No. P|42 as also the note dated 18th December, 1967.
 - A very lengthy discussion took place on the Sub-Committee's report. The report was supplemented by the verbal information provided to Board by the Chairman, Shri M. V. Rajwade and Shri S. K. Guha. The Chairman pointed out that irrespective of our claim on M|s. SNAM Ltd., the pumping capacity of the Pipeline has to be brought to 2 million tonnes at the earliest possible opportunity. He also stated that M|s. SNAM did not accept the liability for this work. The Board decided that the case may continue to be studied in its all aspects and suitable action taken for bringing the capacity to 2 million tonnes; the cost of which may be tried to be recovered from M|s. SNAM to the extent possible depending on our case and circumstances.
 - In regard to the capacity to be raised from 2 million to 3 million tonnes, a view was expressed that the Government had already desired the capacity to be 3 million tonnes and as such action for it lay with the Corporation. The Board, therefore, directed that the matter may be considered by the Pipeline Division and a note submitted to the Board as early as possible.

About the second part of the Sub-Committee's report the Board approved that the first part and second part may be de-linked as desired by M|s. SNAM. The recommendations of the Committee on second part to the effect that to rectify the corrosion of pipeline on the Haldis-Mahishadal Section, the pipes and other materials costing about Rs. 20.00 lakhs be provided by the Corporation while M|s. SNAM will provide the workmanship; the cost of which was estimated at about Rs. 16.00 lakhs. The Board accepted the Sub-Committee's recommendations about the package deal and observed that the leakages in the pipeline should be rectified if possible before the onset of monsoon.

On an enquiry, it was revealed that about a crore of rupees were due to M|s. SNAM Ltd. A major part of which will have to be released to them as a part of the package deal. The Chairman informed that in pursuance of this, the Sub-Committee had already indicated to M|s. SNAM that that 50 per cent of the payment can be released which M|s. SNAM were reluctant to accept. The Board authorised the same Sub-Committee to decide about the quantum of release of payment to them keeping in view the fact that sufficient amount to cover the estimated expenditure on increase of pumping capacity to 2 million tonnes of the pipeline be retained as far as possible under the circumstances with the Corporation.

About the internal administrative action for any lapses in the matter it was desired by the Board to be thoroughly enquired into by the Sub-Committee as soon as the records are made available to them."

3.42. The Committee find that the further report on the internal administrative lapses in the matter of occurrence of shortfall in the designed capacity of HBK Pipeline Section was gone into, in pursuance of the decision taken at the Board meeting on 3rd February, 1968, the Sub-Committee of the Directors consisting of the Chairman, S|Shri M. V. Rajwade, R. S. Gupta and Maj. Gen. Sarda Nand Singh (Retd.) met on 13th May, 12th, 15th, 16th and 27th July and on 18th December, 1968 and 4th and 10th February, 1969 and gave a Report in two parts, dated 10th February, 1969, dealing with corrosion and shortfalls in design capacity. The Report of the Sub-Committee was placed before the meeting of the Board of Directors on and the Board passed the following Resolution:—

"After a lengthy discussion, the Board approved of the recommendations made by the Sub-Committee and passed the following resolution: :

- "Resolved that the Board accepts the recommendations made by the Sub-Committee appointed by it vide item No. P|33 of 27th November, 1967 and P|45 of 3rd February, 1968, for going into the internal administrative lapses in the matter of occurrence of corrosion and shortfall in design capacity of Haldia-Barauni Pipeline Section."
- "RESOLVED FURTHER that the Board's acceptance of the findings of the Committee be conveyed to the Government of India."
- "The Members of the Board, however, expressed serious concern on the question of non-availability of records. They were particularly perturbed to note the findings of the Committee as contained in paragraph 17 of its report to the effect that it seemed that due care had not been taken in scrutinising, editing and assembling the contractual documents. It was revealed that the file which should have indicated the movement of the contractual papers, was not available. The Board therefore, decided that the Managing Director (R&P Division) may conduct further enquiries as to the loss of the file and also fix responsibility, if possible. The Managing Director (H&P Division) was requested to report his findings to the Board as its next meeting.

Emanating from the discussions on this item, the following points and decisions were also made:

- (1) that in view of the fact that the compensation for the shortfall in the design capacity of the pipeline having been obtained from M.s. SNAM, there was no further action necessary against M.s. SNAM;
- (2) that the capacity of the pipeline will ultimately have to be raised to three million tonne in due course of time. In view of this, therefore, it was decided by the Management that to bring the capacity upto 2 M. Tonne now would be an infructuous expenditure once the capacity has to be raised to 3 M. Tonne.
- On the suggestion of some Directors, it was decided that this aspect of the matter may be specifically brought to the notice of the Government.
- Looking into the dealings and records of M s. Bechtel, the Board decided that the Corporation will not have any dealings in future with the party."

- 3.43. The Committee find that Shri Arun Roy Choudhary, Director, I.O.C. dissented with the above decision of the Board and handed over a note to the Chairman at the meeting of the Board on 6th August, 1969 which was referred to Managing Director (Refineries and Pipeline) for examination and reply. The note of dissent of Shri Roy Choudhary has been reproduced in Appendix II and the comments of the Managing Director (R&P) thereon are reproduced in Appendix III. The matter was discussed by the Board of Directors at a meeting held in February, 1970 when the following Resolution was passed by the Board:
 - "Shri Roy Choudhary did not so far circulate any further note but indicated that he had already taken up the points in his minutes of dissent with the Ministry. The Chairman stated and the Board agreed that the Board was the proper forum for a Director to discuss such matters. After a lengthy discussion it was agreed to file this item."

The Committee find a reference in these notes, particularly in the note of dissent by Shri Roy Choudhary to the Report of the Internal Audit Officer. As this is a detailed report, the Committee have reproduced it as Appendix IV.

- 3.44. The Committee would like to bring to light the observations contained in the afore-mentioned document under the following heads:—
 - (i) Contractual agreement with Snams;
 - (ii) Floating of global tenders;
 - (iii) Engagement of Bechtels as Management Supervisers and Design Monitors;
 - (iv) Capacity of Haldia-Barauni line.

The Committee note that the management of the Indian Oil Corporation have already reported the matter in detail to the Government of India. The Committee also note that Shri Roy Choudhary, Director, who had dissented with the decision of the Board had already taken up the matter directly with the Government. The Internal Audit Report is already available on record. The Board of Directors have themselves gone on record to the effect that due care "had not been taken in scrutinising, editing and assembling the contractual documents. It was revealed that the file which should have indicated the movement of the contractual papers, was not available."

- 3.45. It would be recalled that the Sub-Committee consisting of the Chairman, IOC and other Directors had made the following observations in their Report:—
 - "The construction contract signed with Snam Saipem on 31st July, 1963 did not mention the quantities of various products or crude oil to be transported through the pipeline in the preamble. However, on page 1 of Part-III "Job Description—Construction specifications—Exhibits" of the same contract it is mentioned that the quantities of products and of crude oil to be carried by this system are shown in the Enclosure-18. This document, however, is not available in the records of the Pipeline Division. . ."
 - 3.46. The Internal Audit Report records the following decisions were taken in the Ministerial meeting:—
 - (The date of the meeting is not mentioned, but presumably it relates to 15th May, 1963).
 - "As regards the main pipeline contract, Shri Nayak stated in the meeting that several companies had offered to tender for the main work and in addition had expressed the possibilities of furnishing credit on the same terms and conditions as E.N.I. credit.
 - As soon as E.N.I. submitted the tender documents by about 7th June 1963, I.R.L. will direct enquiries for the pipeline execution work and for the supply of technical services and equipment to the firms which had earlier expressed interest in tendering for the work, viz., Bechtel Corporation (USA), William Bros.' Construction, John Brown & Motterwell of U.K., Entrepos and Sociate Parisenne of France, Snam of Italy, Mannesman of West Germany."
 - 3.47. On 25th May, 1963, the Managing Director wrote to Bechtels Asian Corporation indicating:
 - "Indian Refineries Limited have decided to enter into a contract with Bechtels for certain technical services connected with and the management of construction of the Haldia-Barauni-Kanpur pipeline."
 - 3.48. It was also intimated by the Managing Director:
 - "That it was their intention, subject to satisfactory agreement being reached as to cost, to execute this work through Saipem and E.N.I. Company on the basis of a negotiated contract and Bechtel's services will be required during these contract negotiations and eventually in supervising the construction work as Manager."

- 3.49. The sub-Committee of Directors of IOC have recorded inter alia in the Report as follows:—
 - "In May June, 1963 Bechtel were engaged to assist IRL in conducting negotiations for executing the project with ENI and to advise on certain doubtful points about design and specifications. The design concepts for the pipeline were discussed by Bechtel representative with Snam in Milan. Subsequently a cable was received on 24-6-1963 Snam Saipem seeking certain clarifications with regard to the line of approach to be adopted about the designs of Snam Progetti (who were entrusted with the preparation of the project design vis-a-vis Bechtel's concepts about the designs. To this a reply was sent on 25th June, 1963 by the Managing Director indicating that "we desire adoption of Bechtel's concepts agreed by you. In event of disagreement matter may be referred to us for further action." deciding A further cable to Progetti was addressed by the M.D. on 1st July, 1963 requesting them to send a report on the subject with a copy simultaneously to Bechtel's representative for his comments. Accordingly, a letter was addressed by Snam to IRL on 4th July, 1963 with a copy to Bechtel indicating details of SNAM's original design, Bechtel concepts and compromise concepts in respect of Haldia-Barauni Barauni-Kanpur pipeline systems."
- 3.50. Bechtel's representatives summed up the Corporation's stand before the sub-Committee of Directors in the following words:
 - "It was not Bechtel's duty to approve the final design as this remained IRL's responsibility."
- 3.51. The Committee on Public Undertakings find that the contract with Bechtels International Corporation was signed only on 17th March, 1964 and was made effective from 1st September 1963 and that the agreement with Bechtels Asian Corporation was signed on 26th June, 1964 and made effective from 1st September, 1963. They are, therefore, not able to understand how Bechtels played a crucial role in the negotiations at Milan leading to the finalisation of the construction contract of July, 1963.
- 3.52. It has also been recorded in the Minutes of the Board of Directors of the IOC that "Looking into the dealings and records of Mis Bechtels, the Board decided that the Corporation will not have any dealings in future with the party."

The sub-Committee of Directors which went into the question of design capacity of Barauni-Haldia Pipeline have also made the following observations:—

"The sub-Committee could not find any contractual document modifying the scope and facilities with regard to the provision of pumping capacity for 2 million tonnes (and 3 million tonnes as future solution) of crude per year as contemplated in the amendment to the contract in July, 1964."

3.53. The Committee also find that the Project Manager Bechtels had written a letter on 26th September, 1963 to Indian Refineries Ltd. (which has been reproduced in the report of the sub-Committee of the Board of Directors of IOC) which contains a proposal for location of pump station and delivery point in Asansol and states: "The selection of this location would, however, cause a decrease of 1,95,000 metric tonnes per year in the actual maximum capacity obtainable from the presently proposed facilities of 1 crore and 90 lakhs metric tonnes per year." On this letter there is noting by the then General Manager of the Pipeline Project, to the effect that "we may agree", which was confirmed by the Managing Director on 29th September, 1963. The sub-Committee have pointed out: "The mention in this letter of 1.9 metric tonnes of crude oil per year (as against 2 million tonnes envisaged till then) is rather intriguing. The circumstances in which a lower figure was not objected to and a still lower figure was endorsed in the context combined pump station distribution point near Asansol are not quite discernible at this belated stage."

3.54. The minutes of the meeting of the Board held on 3rd February, 1968, at Hyderabad have placed on record:

"The Chairman presented his report vide item No. IMP 77 relating to amendment of main contract with Saipem in July, 1964, HBK Pipeline. Out of the report and the discussions thereon, it emerged that the Board had been bypassed in the matter. The Board was very emphatic that the matters of such importance should necessarily be reported to the Board at the earliest possible, opportunity. The Board also wanted to place on record that in. future all such important matters which entail in itself any project of capital nature involving its performance, its capacity, design or of financial implications should be brought before the Board for its notice and appropriate The Board's decision in the above matter also applies and applies to any significant amendments which are of the above rature to any existing contracts project."

- 3.55. A suggestion was made by no less than three Directors of the Indian Oil Company that the matter relating to missing documents and other related matters should be entrusted to the Central Bureau of Investigation.
- 3.56. The Committee have noted the following facts in respect of sanctioning the HBK Pipelines by the Government and by the Board of Directors:—
 - "On 26th March, 1963 an inter-ministerial meeting was held to discuss matters relating to the Haldia-Barauni-Kanpur Pipeline in which Secretary, Ministry of Mines and Fuel, Managing Director, IRL Joint Secretaries, Ministries of Mines and Fuel, Department of Economic Affairs, etc. participated. At this meeting a note dated 25.3.63 prepared by the then Managing Director, I. R. L. was considered. In this note, it was inter alia explained that Bachtel's estimate of cost of the project would be Rs. 23.1 crores (initially) plus Rs. 1.50 crores (for expansion by 1966) for completing the 2 lines by August, 1964 the capacity of the Haldia-Barauni line being 2 million tonnes initially of crude but to be expanded to 3 million tonnes by early 1966 (when Barauni Refinery expansion may be completed.)"
 - 3.57. At the meeting of the Board of Directors on 5th July, 1963 the Managing Director IRL was authorised to approach the Government for sanction to the award of the contract to ENI at a total value of Rs. 13.4 crores with the foreign exchange component of Rs. 6.21 crores. The estimated cost of the project was worked out as Rs. 26.42 crores.
 - 3.58. Accordingly the Government was approached on 6th July 1963 by IRL for according sanction to the project at the cost of Rs. 26.42 crores and entering into a contract with Snam Saipem. On 24th July, 1963 Managing Director IRL sent a note to the Ministry of Mines and Fuel in which he clarified certain issues connected with the execution of the project. A portion of this note having a bearing on the question of cost estimates of the project and reduction in pump capacity reads as under:—
 - "Indian Refineries Ltd. had addressed Government on 22nd March, 1963 for approval to the execution of a pipeline project Haldia-Barauni-Kanpur at an estimated cost of Rs. 29.07 crores. Subsequently the estimate for this work and the manner of its execution have been the subject of a number of discussions. As a result of these, it was finally decided that the work may be executed

through ENI and that the Indian Refineries Ltd. may make use of the services of Bechtel for resolving certain questions of designs, specifications and cost. The results reached early this month are embodied in my letter to Government of the 6th July, 1963 in which approval to the project cost estimate and to the execution of a contract with Saipem were requested. At that time, some of the points as detailed in para 3 of my letter had been undecided. Subsequently, as I had informed Shri Govindan Nair, Additional Secretary, EAD on the phone last week issues relating to pumping stations and tank farm have been settled following discussions amongst IRL, Bechtel and ENI. I had informed Shri Govindan Nair that the changes made as a result of these discussions have yielded a reduction in the proposed Saipem contract as follows:—

- (a) In the foreign exchange cost, a reduction of \$ 1,926,784.
- (b) In the rupee cost, a reduction of Rs. 118,72,611|-
- (c) Adding (a) and (b) a total reduction of Rs. 2,10,44,109|-

These reductions follow substantial reductions in the number of pumping stations and pump capacity and of tank farms."

3.59. In this connection, the Committee on Public Undertakings have further noted the following observations from the Internal Audit Report:

Receipt of Government sanction:

- "On 31st July, 1963, Government of India, Ministry of Mines and Fuel in their letter No. 31.12.63 ONG dated 31.7.1963 conveyed the approval of the President to the I. R. L. entering into a contract with Messrs Saipem for the completion of the following works relating to H.B.K. pipelines:
 - (a) Construction of the mainline, the submerged river crossings the rail bridge crossings and minor canal and road crossings.
 - (b) The industrial civil works and the electrical and mechanical erection work of the pump station; and
 - (c) The complete works of the tank farms at a total cost of Rs. 11,33,34.892 including foreign exchange component of Rs. 5,29,83,415. It was indicated in the sanction of the Haldia-Barauni Pipeline will start in Nov-

ember 1963 and will be completed by 31st December, 1964 while the construction of the Barauni-Kanpur pipeline will commence by end of September, 1964 and be completed by end of June, 1965.

No mention was, however, made regarding approval of the estimated project cost of Rs. 26.42 crores."

3.60. The Committee on Public Undertakings find that this observation of the Internal Auditors is based on the Government of India, Ministry of Mines and Fuel letter No. 31|12|63|ONG dated 31.7.1963 addressed to the Managing Director which was submitted to the Committee.

3.61. The Committee find that Government entrusted the preparation of Preliminary Project Report at a cost of 40.5 million Italian Lira to Snam Progetti for Pipelines between Barauni-Calcutta and Barauni-Delhi. The Preliminary Project Report was to cover inter alia detailed estimates of likely cost of the project, analysis of the estimated annual cost of operation and transportation per tonne per mile, total tank movements and calculation on its economic feasibility. On 15th November, 1961, Snam Progetti were informed that they would have to go into the question of desirability of having pipeline for the prospective movement of petroleum products throughout Barauni-Calcutta and off-takes at various points between Calcutta and Asansol and beyond Kanpur, present data and proposals, on the basis of which the economic justification of the Calcutta-Barauni Pipeline would be viewed and appropriate decisions taken. The Committee understand that Snam Progetti sent an offer on the 20th November, 1961, for preparation of the Executive Project Report (that is, report containing detailed technical specifications, workings (drawing, etc.,) of the pipeline Barauni-Delhi and Barauni-Asansol-Calcutta. The Board of Directors decided at a meeting held on 12th December, 1961, that if the Executive Project Report was taken up only after a decision was taken on the Preliminary Project Report, one working season would be lost and as it was intended to make every effort to complete the work as early as possible, it would be desirable to have the work on the Preliminary Project Report and Executive Project Report carried out simultaneously. The Board approved the proposal to have the Executive Project Report also to be prepared simultaneously, with the proviso that Snam Progetti give a rebate out of the agreed fees if they were asked within 30 days of the receipt of the Preliminary Project Report that the work for the Barauni-Calcutta line be discontinued. Government approved the proposal on 15th January, 1962 and Snam Progetti were informed of the acceptance of the offer on 16th January, 1962, that they could prepare the Executive Report simultaneously with the Preliminary Project Report.

- 3.62. While the Committee can understand Snam Progetti being entrusted with the work of preparation of Preliminary Project Report, they are puzzled by the acceptance of Indian Refineries Limited Government of the offer of Snam Progetti to prepare the Executive Project Report, without first taking a firm decision on the feasibility of the pipelines and their alignments having regard to the economics of operaion and other relevant factors. The Committee cannot appreciate the plea that it was done in the interest of saving one working season for the execution of the Project was taken up in actual fact only in March, 1964, that is after more than 18 months of commissioning Snam Progetti for the preparation of the Executive Project Report. The plea, therefore, is entirely untenable and unacceptable to the Committee and they deprecate the illusion of urgency which was created for telescoping the two distinct stages of preparing a Preliminary Project Report and Detailed Project Report to facilitate the I. R. L. Government to take rational decisions.
- 3.63. The Committee also find that the Government consulted the Indian Institute of Petroleum, Dehra Dun, and other Indian experts, about the general alignments and terminal points for the pipeline, only in 1962 and decided in 1962 that the pipeline should be laid only between Haldia-Barauni and Barauni-Kanpur. The Committee feel compelled to observe that had Government taken the elementary precuation of settling the terminal points and general alignment of the pipeline in consultation with the Indian Institute of Petroleum, Dehra Dun, economists and other experts in the field, they would have saved both money and time by indicating clearly the requirements to the foreign company. The Committee would like Government to take remedial measures to ensure that such costly lapses which affect the very basis of planning and have grave financial and economic implications, do not recur.
- 3.64. The Committee have already commented in Chapter II on the manner in which the Managing Director had inducted Bechtels Corporation as Design Engineers and overall supervisors for Gauhati-Siliguri pipeline project. The Committee find that the Managing Director of Indian Refineries Ltd. was also primarily responsible for bringing them into Haldia-Barauni-Kanpur pipeline project. The Managing Director in his letter of 5th April, 1963 to Government had stated inter-alia that "Bechtel Corporation have stated that modifications and simplifications in the ENI, design for the project can be made, without sacrificing safety and technical considerations so as to yield substantial economies in project cost... Even if eventually, it is decided not to proceed with the construction of the system through Bechtel, it may be worthwhile to engage the services of this firm to advise us on the changes that may be introduced 1155(Aii)LS-4.

in the ENI design. We had envisaged earlier that if the ENI build the pipelines, Bechtel's services might be engaged to supervise the construction."

3.65. The Managing Director had further stated in his letter of 6th July, 1963 that "as certain aspects of design and specifications in the scheme of the project drawn up by SNAM-Progetti appeared to be of a somewhat doubtful nature and as certain economies in total project cost estimate appeared probable, the design and specification should be reviewed in discussion with SNAM-Progetti, and for this purpose the services of Bechtel Corporation of the USA whose employment for the Management of construction was in view should be utilised....."

As regards the fees to be paid to Bechtel the Managing Director addressed the Ministry of Mines & Metals vide his letter No. S-187|P&P dated 16-9-63. Relevent extracts from this letter are reproduced below:

- "In the last few months, we have had prolonged discussions with the Bechtel Corporation about the cost of their services. To start with, Bechtel had given the following figures:
 - (i) costs of construction supervision and other responsibilities in India, on a reimbursable cost basis, estimated at a total of about Rs. 60 lakhs.
 - (ii) costs of services to be performed outside India (e.g. in the U.S.A., Italy and Japan), also on a reimbursable cost basis, estimated at \$1.55 million.
- (iii) a fixed fee for all services rendered (in India and abroad) of \$1.25 million, India Refineries Ltd., to be free to pay all or part of it in India, but in that event to bear the Indian Tax liability.

As a result of our many discussions agreement has been reached between IRL and Bechtel on the following basis:

- (1) Two contracts will be executed, one with Bechtel Asian Corporation Ltd., for all services to be rendered in India and the other with the Bechtel International Corpn. for services to be rendered outside India.
- (2) The Contract with Bechtel Asian Corporation will be in the sum of:
 - (a) Rs. 41.65 lakhs as a ceiling for reimbursable costs.
 - (b) Rs. 4.76 lakhs as a fee (net of Indian taxes) for services rendered in India.
 - (c) Rs. 4.16 lakhs as a provision for contingencies.

This makes a total of Rs. 50.58 lakhs as a ceiling.

- (3) The contract with Bechtel International Corporation will include:
 - (a) a sum of \$518,980 as a ceiling for reimbursable costs,
 - (b) a fee of \$900,000.

This makes a total of \$1,418,980 or Rs. 67.54 lakhs.

(4) Payment in Indian rupees under (2) are to be made monthly and those in foreign exchange under (3) will be made in 8 equal quarterly instalments (the first of them 30 days after the signing of the contract) and a final instalment after the work is concluded.

The grand total of the two contracts comes to Rs. 118.12 lakhs. Of this, Rs. 70.81 lakhs is in the nature of a ceiling of expenditure and we have reasonable expectations that some savings will accrue.

On a total project costs estimate of Rs. 24.5 crores the cost of these contracts is about 4.8 per cent. We consider this to be reasonable. The percentage on the Gauhati-Siliguri arrangement with Bechtel, as approved by Government was about 7; this was also the figure for the BOC (PL) services rendered to the Oil India Crude Oil Pipeline. It is, of course, correct that Bechtel services in the present case are not as expensive as the functions involved in the other two instances. Bechtel are not responsible for the preparation of detailed working drawings (though they are rendering assistance to ENI); this is an ENI function, for which we have a separate contract in the value of about Rs. 43 lakhs. Including that amount, the cost of design, engineering, construction supervision and project management comes to about 6.5 per cent of the total project cost."

The Ministry IOC have further stated that:-

- (d) "For the services to be performed outside India the fees had to be paid to Bechtel and these payments were not to attract Indian Income-Tax.
- (e) Only in respect of the contract with Bechtel Asian Corporation for Gauhati-Siliguri project an amount of Rs. 22.48 lakhs by way of income tax liability was borne by I.O.C. The question of shifting the income tax liability from Bechtel to the Corporation does not arise as in their offer of March, 1962, Bechtel had stated that their quotation was exclusive of applicable Indian taxes but inclusive of applicable taxes elsewhere and this contract with them had also a stipulation to this effect."

- 3.66. The Committee are not able to appreciate why it was necessary to bring Bechtels on to the scene when they had already commissioned Snam Projecti both for the preliminary Project Report and the Executive Project Report.
- 3.67. As regards the plea that it was found possible to effect a saving of nearly Rs. 3 crores by associating Bechtels in finalising the design and specifications of IRL., the Committee would like to quote the considered view of the Director incharge of Indian Oil Corporation who has gone on record on 13th June, 1967 to the following effect:
 - "The advice given by Bechtels appears to have been based on false premises because an economy brought about by reducing capacity and by eliminating various facilitiesis not a real economy, but an illusory one."
- 3.86. As regards the reasonableness of the amount of about Rs. 87 lakhs (comprising Rs. 51.19 lakhs fees and the balance reimbursable costs) which has been paid to Bechtels for acting as design monitors and project managers, the Committee would like to recall the following extraordinary provisions which they find incorporated in the agreement with Bechtels.

"The H.B.K. project covers a span of 22 months commencing from 1st September, 1963 to 30th June 1965 and Bechtels responsibilities hereunder are limited to performance of its service during such period. 96 per cent of the lump sum fee shall be payable in eight equal instalments, the first payable within 30 days after the signing of this contract and subsequent instalments quarterly thereafter. The remaining 4 per cent of the said fee shall be payable upon acceptance of the H.B.K. project for start up and operation, but in no event shall payment of said final 4 per cent deferred beyond 30 days after payment of the eighth and last quarterly instalments."

- 3.69. It is evident from the above that the agreement with Bechtels for payment is not related to the progress of the work, instead it was made time-bound, with the result that Bechtels managed to clear the scene after drawing more than a crore of rupees as fees and charges while the project was still in midstream as it was completed only in August, 1966 and commissioned on 26th September, 1966.
- 3.70. It would be pertinent in this connection to recall that while agreement with Bechtels as design monitors and project managers was concluded only in March April, 1964, the Indian Refineries Ltd. had started making payments to them as early as December 1963 without waiting for Government's approval to the agreement on the plea "work done, payment made". The Committee would have very

much appreciated if the hypothesis had been applied by Government to ensure that payment was only made after the work was completed. The Committee cannot help the conclusion that the Indian Refineries Ltd. showed more concern for Bechtels interests than for the project and in fact so arranged the events that Bechtels became a reality as design monitors and project managers even before the approval of Government had been taken thereto.

- 3.71. The Committee are also not convinced that the Pipeline Division of I.O.C. who looked after the crucial phase of completion and commissioning of the pipeline project after Bechtels cleared off the scene on 30th June, 1965 could not be trusted with the responsibility of project managers and design managers from the very inception.
- 3.72. The Committee have dealt at length with the role of Bechtels in advising Indian Refineries Ltd. to stick to the alignment of the pipelines through coal-fields in Chapter VII from which it would be seen that Bechtels shifted their ground in crucial matters of alignment more than once.
- 3.73. Later in this Chapter the Committee have pointed out how the actual throughput capacity of Haldia-Barauni pipeline for pumping crude oil has been found to be even less than 1.5 million tonnes, as compared to Government's intention of building a pipeline with 3 million tonnes capacity to match the plans for expansion of Barauni to 3 million tonnes by 1966. It is also on record that certain portions of the pipelines were found to have corroded necessitating replacement at the cost of Snam (Estimated Rs. 15 lakhs) and I.O.C. about (4 lakhs).
- 3.74. The above instances are indicative of the failure of Bechtels to discharge faithfully their responsibilities as design monitors and Project Managers.
- 3.75. The Committee are convinced that the favoured treatment meted out to Bechtels and the unusual provisions in the Agreement made with them could not have been possible without the knowledge of the Undertaking and the Government both of whom should be held to account for the serious lapses to safeguard public interest.
- 3.76. The Committee find that the Managing Director of Indian Refineries Ltd., in his letter of 5th April, 1963, had informed Government inter-alia that: "The 9 firms addressed, including ENI—there are two each from USA, UK and France and one each from Italy, West Germany and Japan—have all expressed their keen interest in the work and have also stated that they expect to be able to offer credit for the foreign exchange cost involved."

3.77. The Committee are, therefore, greatly surprised to find that the Managing Director in a subsequent letter of 6th July, 1963, addressed to the Secretary, Ministry of Mines & Metals, stated inter-"The execution of the project may be settled by negotiation with the concerned ENI company, an earlier decision to invite tenders from a number of selected companies being given up. mainly because of the probable difficulty of finding the foreign exchange involved, and also because of the likely delay in execution." The Committee are not able to appreciate how the difficulty of foreign exchange could be made an alibi for not calling for global tenders when it is on record that out of the 9 firms including ENI addressed by Indian Refineries Ltd. two each from the USA, UK and France and one each from West Germany and Japan, had all expressed their keen interest in the work and also indicated that foreign exchange credit for the cost involved could be offered. It would also be recalled that the ENI credit itself contained a clause that global tenders by advertisement could be invited. The Committee are baffled with the manner in which the Managing Director reversed the earlier indication of going in for global tenders in his letter of 5th April, 1963 to Government by making all manner of assumptions in his latter letter of 6th July, 1963, of foregin exchange difficulties got accentuated during the brief period of three months to such an extent that even calling of global tenders linked with accommodation for foreign exchange component could be arbiterarily ruled out. If Government had made full use of the enabling provision in the ENI credit, they could have induced ENI group of firms to improve their terms, as they already had their machinery. equipment and men in India for execution of the pipeline project about this time between Gauhati and Siliguri. The global tender would have had the additional benefit of giving the Government an opportunity to test the offer of ENI against technological developments in the field all over the World and it is quite possible that the shortcomings, particularly in the capacity and alignment which came to mar the Project at a later date would have been avoided. The Committee would like Government to fully investigate the circumstances under which IRL and Government allowed themselves to be persuaded to hand over the construction contract to Snam-Saipem exclusively without putting it to sure and practical test of global tenders.

3.78. The Committee had desired to know from the Government and IOC that detailed facts about the shortfall in the capacity of Haldia-Barauni pipeline as compared to the intended and designed capacity. Government/IOC have supplied notes/reports of Director-in-charge (Pipelines) IOC. (Appendix V), Chairman, IOC (Appendix VI), Sub-Committee of Directors of IOC (Appendix VII), on the subject, together with the decisions of the Board of Directors, IOC, thereon.

- 3.79. A copy of the minutes of disent by one of the Directors of IOC and a detailed note prepared by the Managing Director (R&P) thereon and Board's decision on this aspect, have also been communicated. The Government have also supplied a copy of the Report of the Internal Audit Officer of IOC on the subject as it figured in the note of dissent by a Director of IOC as well as in the note prepared by the Managing Director (R&P) on it.
- 3.80. Before dealing with the reasons for shortfall and responsibility therefor, the Committee would like to recall the facts as set out in paras 2 and 3 of the note dated 18th May, 1967 on the subject by the Director-in-charge (Pipelines), IOC:
 - "A Committee of six engineers in the Pipelines Division was recently asked to examine these specifications in the light of the hydraulic gradient of the Haldia-Barauni pipeline, the specification of the pipe and the maximum pressure, which can be built up by the pump installed. It was found that even with all the pumps at Haldia, Burdwan and Asansol working 24 hours a day for 335 days a year, it is not possible to deliver more than 1,774,800 metric tons of Kuwait type of crude to Barauni. If the crude is lighter (like Agha Jari), the quantity will be even smaller. However, it may be pointed out that it is not usual that all the pumps will work all the time and according to SNAM's own design concepts, as followed in the pumping stations at Gauhati, Barauni and Mughal Sarai, one pump at least is always kept as a stand-by and the station is assumed to work 8000 hours per year. Therefore, under normal operating conditions, even with 335 x 24 hours pumping. when provision for stand-by pumps is kept as would be necessary at Haldia and Asansol, the quantity of crude that can be delivered at Barauni will be less than even 14 million tones per year."
 - "This discovery of the shortfall of line capacity means that SNAM Progetti has failed in more than one document forming part of their contractual obligations to make a correct statement of what the pipeline capacity is. Even Bechtel who was closely associated on our behalf in the examination of the design and engineering failed to notice this anomaly."
- 3.81. The Committee find that while most of the issues have been identified, the conclusions reached cannot command unquestioned acceptance, as, in the first place, these were inquired into either by Chairman, IOC, or a Committee of the Directors of IOC who cannot, in the nature of things, be expected to probe, without reservations, into the action of the then Managing Director of Indian Refineries Ltd., as he was occupying at the time of inquiry by IOC the

strategic position of Secretary of the Ministry of Petroleum and Chemicals, and under whose administrative control IOC fell.

- 3.82. Moreover, the Sub-Committee of four Directors of IOC (one of whom was later replaced on his transfer by another Director) who made inquiries into the matter included some high-ranking officers of IOC two of whom were earlier directly connected with the matter at the relevant time as Joint Secretary, etc., in the administrative Ministry of Mines & Fuel.
- 3.83. Further, some of the conclusions reached naturally are far from conclusive and appear more like a possible hypothesis to save the trouble of a detailed and searching inquiry.
- 3.84. For example, on the important question of effect of amendment made in July, 1964, to the original agreement concluded with Snam in July, 1963, the Chairman, IOC, in his Report dated 25th January, 1968 has inter alia observed:
 - "The question, therefore, is whether the reduction in prices as indicated above is commensurate with the reduce erection work included in the amendment. This is a matter on which it is extremely difficult to pass any judgment at this point of time. The decision at that time was apparently guided by the categorical advice given by Bechtel in writing to the effect that they had made a thorough review of the actual erection cost and considered the price finally agreed as reasonable. It has to be appreciated that Bechtels were appointed as the IRL's Manager Agent to deal with certain aspects of the design of the pipeline system prepared by Snam Progetti with a view to effecting economy in project cost and to supervise the construction jobs of the pipeline and as such the Management had to reply on their judgment. In case, however, Board desire to go into this matter further, it will have to be a very exhaustive exercise, to be undertaken by the senior engineers and accounts."*
- 3.85. The Sub-Committee of Directors, while discussing in their Report dated 25th January, 1968 the deficiency noticed and measures required for bringing up the capacity of the pipeline to 2 million tonnes have *Inter alia* observed:
 - "The deficiency can be made good and the transport of 2 million tonnes of Light Iranian crude oil ensured by the following measures, under normal operating conditions and normal safety factor:
 - (i) Establishment of two new pumping stations at locations

^{*}Un larliving done by the Committee,

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- between Haldia and Barabadar on one side, and between Asansol and Barauni on the other;
- (ii) Provision of standby mainline engine and pumps at Haldia and Burdwan;
- (iii) Certain readjustments in the location of pumping capacity as between Haldia and Asansol.

fully, but prima facie it can be stated that this will be in excess of S 200,000 mentioned by Bechtel. All pumping units will have to be imported."*

3.86. The Committee are constrained to say that while issues are posed, the problem is not faced squarely as evidenced in the first case from the observation "it will have to be a very exhaustive exercise to be undertaken by the senior engineers and accountants", and in the second case in respect of the cost of modification for reaching 2 million tones pipeline capacity—that it would have "to be estimated carefully, but prima facie it may be stated that this will be in excess of \$ 200,000 mentioned by Bechtel. All pumping units will have to be imported."

Loss of documents pertaining to Agreement with Snam

3.87. The Board of Directors of IOC considered in detail the report of the Sub-Committee of the Directors on the loss of papers and documents pertaining to agreement with Snam and have gone on record at their meeting held on 26th March 1969 to the following effect:—

"The members of the Board, however, expressed serious concern on the question of non-availability of records. They were particularly perturbed to note the findings of the Committee as contained in paragraph 17 of its report to the effect that it seemed that due care had not been taken in scrutinising, editing and assembling the contractual documents. It was revealed that the file which should have indicated the movement of the contractual papers, was not avoidable. The Board, therefore, decided that the Managing Director (R&P) may conduct further enquiries as to the loss of the file and also fix responsibility, if possible. The Managing Director (R&P Div.) was requested to report his findings to the Board at its next meeting."

3.88. The Board Of Directors at their meeting had also desired that the Managing Director (R&P) should conduct further enquiries as to the loss of the file and also fix responsibility, if possible,

^{*}Underlining done by the Committee.

and report to the Board. Accordingly, the matter was further gone into in detail by the Managing Director (R&P) and the results of the investigations are contained in his report dated 30th May, 1969. Some relevent extracts from his report are reproduced below:

- "The then Officer-in-charge of the IRL's Secretariat was therefore consulted. According to his recollection, there were no such file (s) papers. The finalisation of contractual matters was mostly done through discussions negotiations across the table. No. record was kept of those discussions at various stages. The final comparing of the draft contract documents was also dealt with in a similar fashion, understandably to save time. This view is based on the appreciation of circumstances obtaining then as understood from the following:
 - In January 1963 the Govt. of India in the Ministry of Mines and Fuel, on a reappraisal of the oil position on account of the Emergency had taken the following decisions:
 - (a) The construction work at the Barauni Refinery should be intensified and speeded up in order to bring it into production at the earliest possible moment.
 - (b) The Gauhati and Barauni Refineries, as at present planned, should be expanded to achieve actual throughputs of 1.25 and 3 million tonnes per annum respectively by 1965-66. In the first instance, they should include the utilisation of the excess built-in capacities available and later such de-bottlenecking measures as may be found necessary should be adopted in order to achieve the expanded throughputs.
 - (c) An oil pipeline from Haldia Calcutta to Barauni be Constructed for transport of crude oil to feed the Refinery, should this at any time be found necessary or to move products.
 - (d) IRL should proceed expeditiously with the construction of the Gauhati-Siliguri Products Pipeline Project as already sanctioned by the Government.

The early completion of H.B.K. Pipeline Project for strategic reasons had become the most important objective before the Government and the Indian Refineries Limited, and the project matters had naturally to be handled in the most expeditious manner."

3.89. The Committee take a very serious view of the fact that the important records of IRL, particularly the Enclosure 18 of Part II—'Job Description', etc.—and papers indicating the stages of processing of contract documents at the various levels of management, are not

available and are reported to be missing. The loss of such vital doments cannot be treated with complacency. What amazes the Committee the most is that "no record was kept of those discussions at various stages" which led to the "finalisation of contractual matters". All this is sought to be justified on the ground that the work was handled on a "war footing". The Committee are unable to accept this plea, as they consider it the first and foremost duty of those who are handling important negotiations involving crores of rupees maintain faithfully contemporaneous records of the negotiations so that these can be suitably drawn upon for settling details of the agreement and for informing the Board of Management Government of the nuances of the various clauses of agreement and how maximum advantage has been secured for the Public Undertaking and every care exercised to safeguard public interest. The Committee cannot resist the impression that the negotiations were not carried out with diligence or care; otherwise how else can the defective nature of agreements with foreign companies be explained.

- 3.90. Moreover, the procedure of dealing with such matters on a war footing has given neither results in the matter of expeditious completion of the pipeline (it was delayed in commissioning by more than 18 months), nor achieved the objective underlying its construction in as much as the capacity established is far below the 3 million tonnes capacity of Barauni refinery.
- 3.91. The Committee would like Government to take very serious notice of this lapse on the part of those who were entrusted with the negotiations and take suitable action against them.
- 3.92. The Committee would also like Government to issue standing instructions in consultation with the Ministry of Finance and the Comptroller & Auditor-General of India on the manner in which contemporaneous records of such negotiations should be kept for future reference. As copy of these instructions may also be furnished to the Committee for information.

Casual Attitude of General Manager Managing Director

3.93. The Sub-Committee of Directors of IOC which looked into the internal administrative lapses in the matter of occurrence of corrosion and shortfall in the Haldia-Barauni pipeline section have inter alia stated:

"The Sub-Committee came across a letter written by Bechtel on 26th September, 1963 to IRL on the subject of location of the Asansol pump station and would like to reproduce below the same as it touches on the capacity of Haldia-Baraumi line for crude oil movement.

"Subject:—Location of the Asansol pump station HBK pipeline project.

In order to combine the pump station with a delivery point for distribution of products at Asansol, Snam India Branch have proposed that the pump station be located on the outskirts of Asansol, which is 24 miles north of the calculated ideal hydraulic location. Our Milan Office has informed us that the selection of this location would result in no significant reduction in crude oil throughput, and would still allow the transport of 1,705,000 metric tonnes of kerosene equivalent per year which is greater than the estimated required capacity. The selection of this location would, however, cause a decrease of 195,000 metric tonnes per year in the actual maximum capacity obtainable from the presently proposed facilities of 1,900,000 metric tonnes per year. It would also result in a decrease of 330,000 metric tonnes per year (kerosene equivalent) from the 2,850,000 metric tonnes per year maximum capacity which could be obtained from the system by the addition of additional pump stations.

It would appear reasonable to us to accept the combined pump station distribution point at the convenient location adjacent to Asansol in view of the fact that the somewhat lower throughput figures resulting from this are in any case considerably greater than anticipated needs, but please let us know your decision in this matter.

Yours truly, Sd.|- H. M. McCamish, Project Manager.

Sd|-. M. Gopal Menon, GM 29-3-63.

Sd|- P. R. Nayak, MD 29-3-63.

The mention in this letter of 1.9 metric tonnes of crude oil per year (as against 2 million tonnes envisaged till then) is rather intriguing. The circumstances in which a lower figure was not objected to and a still lower figure was endorsed in the context of combined pump station distribution point near Asansol are not quite discernible at this belated stage."

3.94. The Committee too are greatly "intrigued" how a very important communication from Bechtels which clearly mentioned the design capacity of the pipeline as 1.9 million tonnes per year did not make the then General Manager Managing Director of IRL to sit up and take a firm and unequivocal stand on this attrition of the capacity of the pipeline. The Committee are amazed that the reduction of the throughput capacity of the pipeline could have been dealt with in such a casual and perfunctory manner. The Committee

consider that the matter calls for thorough investigation for fixing responsibility on all those officials who were lax and casual in discharging their responsibilities.

Defective Agreement with Snams

3.95. The Sub-Committee of Directors of IOC in their report dated 25th January, 1968, have also observed:

"The primary design was done by Snam Progetti of the ENI group by an agreement arrived at through the exchange of letters in November, 1967. This document also does not provide for any penalty for any lapses by Snam Progetti for arbitration." (Para 10 iv of the Report).

3.96. The Committee need hardly point out that it is not without significance that the date of sanction of Government letter to Indian Refineries Ltd. to enter the construction contract and the actual date of signing of the contract by the IRL with SNAM SAIPEM is the same viz. the 31st July, 1963. The Committee are not able to appreciate the great haste with which such an important contract involving over Rs. 11 crores was concluded without fully safeguarding Government's interests.

Effect of July, 1964 Amendment on Cost of Civil Works

3.97. There is yet another aspect which has been hinted at in the Chairman's note dated 25th January, 1968 relating to the effect of amendment of July, 1964 on the original agreement of July, 1963 in respect of the cost of civil works which were excluded from the responsibility of Snam and taken over by IOC. The Chairman observed inter alia in this note:

"However, in order to reach a firm conclusion whether the exclusion of civil industrial work in pumping stations from Snam's responsibility worked out to the disadvantage of the IOC needs a very exhaustive comparison of the items and extent of work contemplated in the original contract and the work actually executed by the IOC under the supervision of Snam. This comparison could best be made only with the detailed working drawings of all civil engineering works at pumping stations, if they were at all available at that time. Therefore, here again the considerrations advanced in the preceding paragraph equally apply in this case. It has, however, to be kept in view that all contracts for these jobs were approved by IOC (IRL) before acceptance."

3.98. It has also been stated by IOC|Government in a written note to the Committee that:

"The representatives of Snam were invited for a discussion on

the question of making up the shortfall in the 2 M. Tonnes capacity. The agreement arrived at with them in regard to the shortfall in design capacity was placed by the Sub-Committee before the Board at its meeting held in August, 1968."

Full details of the agreement have not been given to the Committee.

- 3.99. However, the Committee find an incidental reference to it in Para 18 of the report of the Sub-Committee of Directors of IOC dated 10-2-1969, which went into the question of internal administrative lapses in the matter of shortfall in design capacity of HBK pipeline section and occurrence of corrosion. Para 18 of the Report of the Sub-Committee of Directors of IOC reads as follows:—
 - "Lastly, so far as Snam are concerned, their liability in the matter of design capacity of the line has been the subject matter of a series of discussions with them. As a result, they have already made good the deficiency in the design capacity in full by affording a credit to IOC of Rs. 14.62 lakhs plus US dollars 1,75,200 the estimated cost of bringing the capacity to 2 million tonnes of crude oil per year. No further action is, therefore, warranted against them."
- 3.100. The reported agreement between IOC and Snam needs careful acrutiny of Government to make sure that full damages have been recovered from Snam for the proved deficiency in the capacity as compared to the commissioned capacity.

Legal Responsibility of Snam and Bechtels

- 3.101. The Committee have been informed in a note by IOC|Government that "the opinion of Shri A. A. Peerbhoy, Bar At Law and former Director, IOC's Board, on the exact nature and extent of responsibility of M|s. Snam and Bechtel in regard to shortfall in the design capacity was obtained."
- 3.102. The Committee, however, have not been furnished the full text of the legal opinion of Shri A. A. Peerbhoy as to the nature and extent of responsibility of the contractors on the relevant issues. The Committee would like Government to obtain the legal opinion at the highest level so that the best construction can be put upon it and no effort is spared to bring home the responsibility for this failure to Messrs Snam and Bechtel.

Dealing with Bechtel

3.103. The Committee have in the earlier Chapter commented on the induction of Becktels into the Gauhati-Siliguri pipeline project at the instance of the then Managing Director of IRL. It is also on record that the initiative for bringing Bechtels into the HBK pipeline was also taken by the then Managing Director of the IRL. The dealings of Bechtel and the quality of service rendered by them have been the subject of comment by the Sub-Committee of Directors of the IOC in their Report dated 25th January, 1968, and by the Chairman, IOC, in his Note dated 25th January, 1968. Some of the observations made in the afore-mentioned Report/Note are reproduced below:

"The fact remains that Bechtels were introduced to ENI as the spokesman of IRL in matters of design. However, in the contracts with Bechtel for the consultancy-management services for this pipeline, there is no provision for any penalty in ease of any default on their part. There is, however, provision for arbitration in London under the London Chamber of Commerce. Furthermore, Bechtels appear to have covered themselves in the matter of all supplementary contract documents advising IRL in writing of the action they were taking."

(Para 10 (iii) of the Report of the Sub-Committee of Directors)

"ENI maintain that with the appointment of Bechtel to review and monitor designs the final responsibility is no longer with them. Bechtel, however, states that the primary responsibility for engineering design is that of Snam Progetti even though they may have suggested certain modifications."

"In so far as the IRL is concerned, complete reliance was placed on Bechtel in the matter of design and other technical matters as they were the advisers, consultants and Project Managers. Bechtel claimed that at every step IRL's approval was obtained."

(Para 10(i) of the Report of the Sub-Committee of Directors)

3.104. The Chairman, IOC, in his noted dated 25th January, 1968, has remarked:

"As regards the Bechtel's responsibilities and powers as defined in the Amendment, it is a matter of fact. The question whether these powers were necessary or liberal has

to be viewed in the context of the IRL's organisation and capacity at that time to deal with a Project of this complexity and magnitude and Bechtel's performance in the case of Gauhati-Siliguri Pipeline contract. It is indeed difficult to judge this question at this point of time."

(Para 12 of the Chairman's Note dated 25-1-1968)

3.105. It would be pertinent to recall the conclusion of the Board of Directors of IOC after a lengthy discussion about the dealings of Bechtels. The minute of the Board's meeting held on the 26th March, 1969, inter alia records:

"Looking into the dealings and records of M/s. Bechtel, the Board decided that the Corporation will not have any dealings in future with the party."

3.106. The Committee need hardly point out that the Resolution of the Board of Directors of IOC is conclusive on the subject and underlines the need for a thorough investigation by Government to determine the manner and the reasons for which Ms. Bechtels were brought on to the scene, first for Gauhati-Siliguri pipeline project and later for HBK project and paid over Rs. 1.5 crores (comprising Rs. 75.46 as fees and the balance as reimburseable cost) with hardly any commensurate benefit to the Project. In fact, but for their inept technical advice at crucial stages the history of the project of HBK pipeline may well have been different. The Committee would like Government to pursue the matter to its logical conclusion and take up with all those concerned with the introduction of this party to the Pipeline projects and the undue favours which were shown to them at every stage as evidenced by the unusual provisions of the agreements. The Committee cannot help pointing out that the then Managing Director, IRL, who was signing the agreements on behalf of IRL showed more concern for the interests of the Bechtels than for the public money he was entrusted with.

Failure to inform the Board Government

3.107. The Chairman of IOC in his note dated 25-1-1968 has clearly pointed out:

"In so far as the remission of this matter to the Board is concerned, it seems that no reference has been made to the Board ever since it authorised the Managing Director to approach the Government for award of the contract to Snam at its meeting held on the 5th July, 1963."

The Board have also gone on record to the effect, at the meeting held on 3rd February, 1968, that:—

"Out of the report and the discussions thereon, it emerged that the Board had been by-passed in the matter. The Board was very emphatic that the matters of such importance should necessarily be reported to the Board at the earliest possible opportunity. The Board also wanted to place on record that in future all such important matters which entail in itself any project of capital nature involving its performance, its capacity, design or of financial implications, should be brought before the Board for its notice and appropriate action. The Board's decision in the above matter also applies to any significant amendments which are of the above nature to any existing contracts or project."

3.108. The above extracts from the Resolution of the Board of Directors of IOC would conclusively prove that the then Managing Director was acting on his own in his dealings with Snams as well as Bechtels in vital matters concerning the capacity of the pipeline; by-passing thus the Board of Directors. He also failed to obtain prior specific approval either of the Board of Directors or Government to the deviations which adversely affected the capacity of the Project without any commensurate saving in expenditure. The Committee are puzzled how the Board of Directors/Ministry allowed the then Managing Director to act in this manner to the detriment of public interest. The Committee would like Government to fully investigate the matter and fix responsibility.

Note of Dissent by Director of IOC

3.109. Reference has been made earlier to the note of dissent dated 6th August, 1969 by a Director of IOC. The Committee are informed that a detailed note giving comments of the Managing Director (R&P) IOC on the aforementioned note of dissent was circulated to the Board of Directors on 28th August, 1969. The matter came up for consideration at the meeting of the Board of Directors of IOC in February 1970 and the following Resolution was passed by the Board:

"Shri Roy Choudhry did not so far circulate any further note but indicated that he had already taken up the points in his minutes of dissent with the Ministry. The Chairman stated and the Board agreed that the Board was the proper forum for a Director to discuss such matters. After a lengthy discussion it was agreed to file this item...."

3.110. The Committee note that Government are already seized of the subjects mentioned in the note of dissent of the Director. In particular, the Committee would like to draw attention to the following observations made in the note of dissent by the Director:

"The Internal Audit Report throws further light on the subject and records the effect of the Amendment of (July 1964) on the main subject.

1155 (Aii) LS-5.

- It also makes an important observation in the concluding part of the report that "Sanction of the Government does not appear to exist for the execution of the HBK project at a cost of approximately Rs. 26.42 crores. Sanction only exists for entrusting the work to Snam-Saipam at a cost of Rs. 11.33 crores."
- 3.111. The Committee have noted with grave concern the observations of the Internal Audit Officer that there does not appear to exist any sanction of Government for the execution of the Haldia-Barauni-Kanpur projects over which an expenditure of over Rs. 26 crores has already been incurred. The Committee would like to be informed of the factual position. If the position as stated in the Report of the Internal Audit Officer is correct, the Committee expect Government to take action against all those who are responsible for this lapse.
- 3.112. The Committee are not able to appreciate how this important Audit Report dealing with several matters of vital importance to IOC could be allowed to remain without detailed investigation and report both to the Board of IOC and Government. The Committee need hardly stress that the various other issues raised in the Audit Report should be thoroughly examined in consultation with the Comptroller and Auditor General and the responsibility for the loss suffered by the Undertaking Government fixed and deterrent action taken against all those who have shown laxity in the discharge of their responsibilities.

KOYALI-AHMEDABAD PRODUCTS PIPELINE

This pipeline is a part of the Gujarat Pipelines owned by ONGC and is on lease with I.O.C. w.e.f. 1st April, 1966.

4.2. The main features of the pipeline are given hereunder:

Main	Features	
27200111	(i) Construction Contractors .	SNAM-SAIPEM subsidiary of State owned Italian Company E.N.I.
	(ii) Design Engineers & over all supervisors	SNAM-PROGETTI
	(iii) Date of commencement of Construction	1-1-1965
	(iv) Actual date of completion ·	3-2-1966
	(v) Length & inner diameter of pipeline	114 Km.—8" dia.
	(vi) Actual installed capacity ·	7,00,000 metric tonnes per year
	(vii) Capital cost · · ·	Rs. 271.86 lakhs.

Working of the Pipeline

4.3. Since the date of its commissioning viz. 1st April 1966, a total quantity of 13.84 lakhs metric tonnes of petroleum products upto 1968-69 have been transported from the Koyali Refinery and products are moved to Sabarmati for distribution in the meter gauge areas. The product-wise break up as well as the number of the working days are given below:

		1966-67 (M.T.)	1967-68 (M.T.)		1968-69 (M . T .)
Motor Spirit Superior Kerosene H.S.D	•	63,406 117,893 102,137	90,499 187,016 111,254	A rarbs	139,973 227,153 183,596
TOTAL · ·	•	283,436	388,769	ATF. Naphtha	92,674 68,518
Number of days worked	•	175	219	327	711,914

4.4. The percentage of utilisation was 41 per cent in 1966-67, 55.5 per cent in 1967-68 and 102 per cent in 1968-69.

4.5. The financial results of the working of the pipeline are given below:

Income	1966-67	1967-68	1968-69
	(Rs. in lakhs)		
Freight recovery from Marketing	Divi-		
sion · · · · ·	30.4	39.05	66.49
Miscellancous · · · ·	• 0.07	7 0.11	0.11
	30. 52	39.16	66.60
Operating expenses including dep	recia-		
tion	• 21.46	21.61	24.35
Net Profit · · ·	9.06	17.55	42.25

4.6. The pipeline is expected to show the following profits during the current and the next four years*:—

								(Rs. in lakhs)		
1968-69	•	•	•	•	•	•	•	25.79		
1969-70	•	•	•	•	•		•	33.60		
1970-71	•	•	•	•	•	•	•	32.40		
1971-72	•	•	•	•	•			36.92		
1972-73		•			•	•	•	37-45		

^{4.7.} The pipeline was built by Oil and Natural Gas Commission. The construction contractors were M|s. SNAM-SAIPEM, and Design Engineers and overall supervisors were SNAM-PROGETTI.

4.8. The completion schedule as originally contemplated was as under:—

Starting	Completion date				
1-7-1964	31-12-1964				

^{*}At the time of factual verification, the Ministry stated :-

[&]quot;The Pipeline is expected to show the following profits/losses during the following
Two years:—
(+) (—) 1969-70 . (—)25.79 lakhs (Provisional)

^{1970-71 (+) 40·22} lakhs.

In the actual execution, the work was started on 16th January 1965, the line was tested and kept ready for commissioning on 3rd February, 1966 and actually commissioned on 1st April, 1966.

- 4.9. On 8th August, 1964, the Government of India decided to transfer the Koyali-Ahmedabad Product Pipeline to IOC after construction by ONGC on cost price. ONGC handed over the pipeline to IOC on 1st April, 1966. The formalities like the execution of transfer deeds etc. were not however, completed. In December, 1966, IOC took up the question of formal transfer of this pipeline to IOC. The Government of India issued a directive under sub-section 3 of Section 14 of Oil and Natural Gas Commission Act directing ONGC to transfer the pipeline to IOC from 1st April, 1968. The Government of India also advised IOC and ONGC that the possession and use of pipeline by IOC from 1st April 1966 to 31st March, 1968, may be regularised by entering into a lease deed by IOC with ONGC.
- 4.10. It has, however, not been possible to effect the formal transfer. Certain differences between I.O.C. and O.N.G.C. relating to the value of transfer, determination of lease charges for the period during which the pipeline has to be treated as on lease with IOC remain unresolved and the matter is under consideration of the Government.*
- 4.11. In the absence of transfer of ownership to IOC and mutual agreement on lease charges, IOC has been providing a liability for rent (lease charges) in its books of accountants on a provisional basis. The rent shown as payable to ONGC is a deductable expenditure in the computation of profits and gains of business as per the precisions of Indian Income Tax Act.
- 4.12. During evidence the Committee were informed that the case had been pending for decision in the Ministry since 1967.
- 4.13. The Committee regret that although the defacto transfer of Koyali-Ahmedabad Pipeline has taken place the question of dejure transfer of the Koyali-Ahmedabad Pipeline has not been settled since 1967 in spite of the fact that both IOC and ONGC are under the administrative control of the same Ministry. Such prolonged indecision and delay in the Ministry, in the opinion of the Committee, are not indicative of expeditious and business-like approach, which should distinguish a Ministry administering Public Undertakings.

^{*}At the time of factual verification the Ministry stated:

ESTIMATES

The Table below gives the original Project Estimates and final Project Estimates in respect of the three Pipelines:—

Gauhati-Siliguri Pipeline

					Rs. in lakt
Original Es	timates ·	•	•	•	. 591.20
First Revisi	on 28-1-63	•	•	•	661.52
Second Re	vision 15-2-	·66.	•	•	775.38
Final Estim	ates August,	1966	•	•	· 775.38
Haldia-Barauni Original Est		eline	•	•	· 2642
First Revisi	on July' 65	•	•	•	· 2741.89
Second Rev	ision Aug,' 6	6 .	•	S	3083.42
*Final Estir	natess ·	•	•	Under	preparation.
Koyali Ahmedabad					
Final Estim	ates ·	•	•	•	· 271.86*
	nates ·			Under	preparation.

5.2. The Ministry have funished the following Note on the reasons for increase in the Estimates from Rs. 591.20 lakhs to Rs. 775.38 lakhs in respect of Gauhati Siliguri pipeline:

"The Government approved the project cost of Rs. 591.20 lakhs for the Gauhati-Siliguri Pipeline Project on 4.10.62. Subsequently, the Board of Directors, in their meeting held on 28th January, 1963 approved the project cost estimate of Rs. 661.52 lakhs. In his letter

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^{*}Subject to variation on finalisation of certain adjustments in capital amount.

dated 22nd December, 1962, to the Secretary to the Government of India, the Managing Director stated that:

"the increase of about Rs. 62 lakhs over the estimates sanctioned by Government is due mainly to the following reasons:

- (a) Extra cost on Rourkela pipe; the original estimates of ex-mill cost was taken as Rs. 823 per tonne, but the present assumed cost is Rs. 1300 per tonne. This alone would increase the cost by about Rs. 60 lakhs.
- (b) As a result of the likely inclusion of light Diesel Oil in the products to be moved, it has become necessary to have one intermediate pump station, besides the main one at Gauhati. In any case, it has been considered desirable to make provision in the project for reverse pumping from Siliguri to Gauhati to provide for any emergency in Assam. The second pump station referred to will, therefore, in the first instance, be set up at Siliguri. The extra cost on this pump station is about Rs. 10 lakhs."

"ENI have stated that their present offer is open only upto 12th January, 1963, the date on which their credit insurance arrangements in Italy expire—and they require that the contact be concluded with them by that date. In that event the work will start in March, 1963 and be completed by August, 1964. SNAM have explained that, as things are, it is impossible to complete the work by March, 1964, as originally enviaged except at an increased cost of nearly Rs. 85 lakhs over the present terms. This increase is not considered worthwhile."

"As the Government is aware, this line is an urgent necessity and is essential for the proper functioning of the Gauhati Refinery. We, therefore, recommend that the SNAM offer for construction, as explained in this letter, may be accepted and Government's approval conveyed to us by the 5th January, 1963 at the latest:"

The contract with SNAM will be as follows:

(Rs. in lakhs)

			Total	Indian	Foreign
Construction contract .	•	•	281.73	166.84	114.89
Supply of material contract	•	•	38.07	3.05	35.02
			319.80	169.89	149.91

Contingencies 5%	•	•	•	•	15 99	8.49	7 50
Grand	Тот	AL		•	335.79	178.38	157. 41

"The sanction requested is to a contract of the total value of Rs. 335.79 lakhs with a foreign exchange component of Rs. 157.41 lakhs, but the initial payments to SNAM of 5 per cent on the foreign exchange component will be based on the cost exclusive of contingencies, i.e., Rs. 149.91 lakhs. It may be noted that on the construction works only, the foreign exchange component comes to about 40.4 per cent the corresponding figure in the OIL Contract is reported to be about 58 per cent. The reduction in the present case is due to the existence in India of a good deal of Italian personnel and equipment and certain other factors."

- 5.3. Accordingly, Government sanction was issued on January 21, 1963.
- 5.4 The project cost of the Gauhati-Siliguri Pipeline was discussed again in the board meeting of IOC (RD) on 31.1.66. The revised project cost estimate was Rs. 775.38 lakhs. It appears that after having secured Government sanction to the part relating to the main line construction work under the contract with ENI-SNAM on 21st January, 1963, the Board considered appropriate to go upto the Government for sanction to the revised estimate only on the completion of the work. This is borne out by such stipulation occurring in the agenda note circulated for the meeting of the Board of Directors on 21.1.66 and also by the letter written by the Financial Controller to Government on 15th February, 1966 by which he sought Government's approval to the revised cost estimate of the above pipeline for a total sum of Rs. 775.38 lakhs. Government examined the revised project cost estimate of Rs. 775.38 lakhs for the Gauhati-Siliguri Pipeline and after having been satisfied, the above revised project cost estimate was approved on 2nd February, 1967.
 - 5.5. The table below gives the project cost estimates of the Gauhati-Siliguri Pipeline Project as it was sanctioned on 4.10.1962 by

Government, 28.1.63 by the Board of Directors and 2.2.1967 by Government."

				(Rs. in lakhs)			
	Particulars		Govt. sanction of 4-10-62	First Revised Estimates approved by the Board, 28-1-63	Final Estimates		
ı.	Right of way · ·	•	10.00	5 00	16.35		
2.	Pipeline Material · ·	•	185.00	252.39	261.50		
3.	Pipeline Installation ·	•	325.00	328.43	348.32		
4.	Engineering Management	Fee	21.27	2 4.27	24.27		
5.	Engineering Management	Ex-					
_	penses · · ·		16.93	16.98	16.63		
6.	Expenses of Indian State facilities	f and	<u>.</u>	3.0 0	39.31		
7.	Contingencies · ·		30.00	31.50	31.50		
•	Total · ·	•	588.20	661.52	737.88		
8.	Interest on capital loan	•	•••	••	37.50		
	Grand Total •	•	588.20	661.52	775 38		

The Committee find that the Ministry of Finance had raised the following queries while examining the estimates of this pipeline:—

- (i) Reasons for increase in the cost of pipeline material when pipe had actually gone down;
- (ii) Reasons for low provision in the first revised estimate under the head "Expenses of Indian staff and facilities."
- (iii) Tax liability reimbursible to SNAM; and
- (iv) Effect of final estimate on the economics of the Pipeline."
- 5.7. The Ministry have in reply stated:

"Reasons for increase in the cost of pipeline material

The cost of the pipeline material according to the first revised estimate was Rs. 252.39 lakhs and according to the final estimate, it

is Rs. 261.50 lakhs. The break-up of these two estimates is as follows:—

							(Rs. in lakhs)		
							First Revise Estimate	d Final Estimate	
Main line Pipe							117.50	157.24	
Primer & enamel							15.97	26.41	
Casing Price							4.10	2.29	
Other materials							29.82	52.49	
Cement & Steel		•	•	•		•	5.00	0.38	
	То	TAL	•	•	•	•	252 39.	249 51	

It will be seen from the above that the cost of the main line pipe had been reduced by about Rs. 20 lakhs on accout of price reduction of Rs. 125|- per ton and the quantity of pipe consumed was 12,000 tons. It may also be added that the figure of Rs. 261.50 lakhs shown in the final estimate includes Rs. 12 lakhs on account of a part of income tax reimbursible to SNAM.

Reasons for low provisions in the first revised estimate under the head Expenses of Indian Staff and facilities

The construction of the Gauhati-Siliguri Products Pipeline commenced after the first revised estimates were approved by the Board in January 1963. It appears that the Board did not have a clear idea of the number of personnel required at that stage and an ad hoc provision of Rs. 3 lakhs only was provided under this head. It may also be noted that the total of Rs. 39.31 lakhs (final estimate) includes items such as aircraft charter-Rs. 2.59 lakhs, erection insurance-Rs. 3.18 lakhs, cost of project report-Rs. 1 lakh and head office overheads Rs. 3 lakhs, which were apparently not envisaged at the time of preparing the first revised estimate in January 1963. Of the total of Rs. 39.31 lakes, the item relating to salaries and allowances of the staff and travel expenses comes to only Rs. 11.55 lakhs. It, therefore, appears that the low provision was due to lack of experience of pipeline operations this being the first line built by I.O.C. in this connection, attention is invited to the fact that the construction spread over two seasons instead of one season as originally estimated and increase in the staff requirements and poor Communications in the refiion through which pipeline passes.

Tax liability reimbursible to SNAM

The tax liability reimbursible to SNAM is about Rs. 26 lakhs. This has been included under three heads as follows:—

						Rs 26 leiths
(iii) Contingencies	•	•	•	•	•	Rs. 9 lakhs
(ii) Pipeline installation	ì	•	•	•	•	Rs. 5 lakhs
(i) Pipeline material						Rs. 12 lakhs

It will, therefore, be seen that provision has already been made in the final estimates for reimbursing Rs. 26 lakhs to SNAM on account of income tax.

Effect of final estimate on the economics of the pipeline

It will be seen that the transportation earnings during 1965-66 from Gauhati-Siliguri Pipeline amounted to Rs. 106.88 lakhs on a throughput of 3.66 lakhs tonne which works out to an income of Rs. 29.16 per tonne as against the operating cost of Rs. 22.97 per tonne, leaving a profit of Rs. 6.19 per tonne. On an equity share capital of Rs. 350 lakhs apportioned to this pipeline, return on equity at 6 per cent will come to Rs. 5.73 per tonne. It will, therefore, be seen that the return on this pipeline even now is morethan 6 per cent. If LDO is also pumped through the pipeline as is likely to happen very shortly, the earnings of the pipeline would increase further."

- 5.8. During the course of evidence of the Ministry of Petroleum and Chemicals and Mines and Metals, the Special Secretary of the Ministry informed the Committee that the sanction of Government to the final estimates was given on the 2nd February, 1967 after the Board's resolution was sought on the 31st January, 1966. During this interim period of one year IOC continued to incur the expenditure. In a written reply to a question as to how I.O.C. incurred expenditure beyond 10 per cent without obtaining the sanction of the Ministry. The Ministry have stated as follows:
 - "It has not been possible to trace the exact reasons why I.O.C. continued the completion of the project at the enhanced cost without getting interim sanction for this."
- 5.9. In respect of Haldia-Barauni-pipeline, it has been stated that the final estimates are under preparation. The second revised estimates prepared in August, 1966 show a rise by 15 per cent approximately.
- 5.10. The Committee find that the Estimates of the Gauhati-Siliguri Pipeline have escalated to the extent of 25 per cent during the course of 3 revisions. Whereas in the case of Haldia-Barauni-Kanpur Pipeline the estimates have escalated to the extent of 15 per cent in the course of two revisions. The final estimates of Haldia-Barauni Pipeline are still to be prepared.
- 5.11. The present system of control on public undertakings envisages a three tier system of Financial Control:—
 - (a) Control of Board of Directors,
 - (b) Control of Government,
 - (c) Control of Parliament.
- 5.12. The Committee are concerned to find that the whole system of three tier financial control has not been properly applied i controlling the finances of this Undertaking. They find that the

Project estimates of G.S. Pipeline for Rs. 591.20 lakhs were sanctioned by Government on 4-10-1962. After this sanction, the Undertaking went on spending money on its own far in excess of the sanctioned estimate of Rs. 591.20 lakhs and submitted to Government only in January, 1966 the final estimates of the Project as Rs. 775.38 lakhs after the completion of the Project. The Committee find that this excess expenditure of Rs. 184.18 lakhs for the completion of the Project was done by the Undertaking without any proper approval of the Government, although according to the prescribed financial procedure and rules not more than 10 per cent of the sanctioned amounts, an Undertaking could incur without the Government's sanction. To a question as to how the Government permitted this unauthorised expenditure beyond 10 per cent of the sanctioned estimates by the Undertaking, the Ministry in a written reply have stated as follows:—

"It has not been possible to trace the exact reasons why IOC continued the completion of the Project at the enhanced cost without getting interim sanction for this."

5.13. The Committee find that the Board revised the estimates of the Project for the first time on 28-1-1963 as Rs. 661.52 lakhs. The Committee fail to understand why these revised estimates were not referred to the Ministry and also why the Ministry's representative on the Board did not take note of it and informed the Government of this unusual escalation of cost.

5.14. The Committee understand that the Indian Refinieries Ltd. had a Financial Division. They are, therefore, unable to appreciate how the Financial Controller could allow the expenditure to be incurred without proper sanction for revised estimates of the Board/ Government. The casual and leisurely manner in which the Indian Refineries Ltd. have approached the question of revision of the estimates and its expost facto regularisation by Board Government are indicative of the fact that effective control and direction being exercised. It is for this reason that the undertakings have come to play with the tax-payer's money without paying adequate attention to the prescribed procedure of obtaining Government's prior approval to the revised estimates. The Committee would like in this connection to draw attention to Paras 1.7 and 1.9 of Fiftieth Report of the Public Accounts Committee Fourth Sabha) on New Services and New Instrument of Service, and stress that effective action should be taken by the Government to implement the recommendations and take prior approval of Parliament in case of substantial revision. The Committee also expect that while examining the question of according approval to revised estimates. Government would seriously consider its effects on the economics of the project. The Committee feel that where the economics of the projects are adversely affected as a result of revised estimate of expenditure, the matter should be specifically brought to the notice of Parliament without avoidable delay.

- 5.15. What amazes the Committee most is that the Government did not bother to examine the type of control that they had on the Undertaking and allowed complete freedom to the Undertaking which were not permitted even by the delegation of powers.
- 5.16. The Committee recommend that the circumstances under which the Undertaking was allowed to spend money beyond 10 per cent of the sanctioned estimates without the approval of the Government should be investigated and the persons responsible both in the Undertakings and the Ministry should be proceeded against.
- 5.17. The Committee strongly recommend that in future the prescribed principles of financial control should be adhered to by all Undertakings including the I.O.C.
- 5.18. The Committee regret that in no year the Demands for Grants of the Ministry provided for the expenditure and for full six years Parliament was unaware of what was happening in the financial administration of the undertaking. Taking strong exception to by passing of the Parliament's financial control, the Committee recommend that in future all cases of Project Estimates Revised Estimates should be given effect to only after Parliament has approved of the total Capital Expenditure on the entire project or the revision of the project estimates as the case may be.

VI

DELAY IN CONSTRUCTION AND COMMISSIONING

A. Construction

The table given below shows the target date for completion of construction, the actual date of completion and the time by which target date for completion of construction exceeded in the construction of each pipeline:—

S. Pipeline No.	Target date of completion construction	Date of actual completion of construction	Time which target date for completion of construction was exceeded)
1. Gauhati-Shiliguri	31-8-1963	24-10-1964	I month as
2. Baruni-Kanpur	30-6-1965	17-8-1966	131 months.
3. Barauni-Haldia	. 30-4-1565	31-10-1966	1 month
4. Koyail-Ahmedabad	. 31-12-1561	3-2-1966	13 months

Delay in construction

6.2. The reasons for delays have been stated as follows:

(i) GAUHATI SILIKURI PIPELINE

It has been stated that the construction work was basically completed by August, 1964 and the pump station was ready for start-up. However, the pump station could not be started until 15th October, 1964, due to the supply of a motor, which was in itself sound and a starter which though sound was not coordinated to operate the particular motor and had to be changed. First test-run was conducted on the 15th October, 1964 and on 24th October, 1964, the pumping of Motor Spirit commenced at Gauhati Pump Station.

The Ministry have stated "thus, the small delay was in the nature of an unfortunate lack of coordination between the Design Engineers and the Construction Contractors."

(ii) BARAUNI-HALDIA PIPELINE

1. Acquisition difficulties:

- (a) Land: There were delays in selecting the sites for pump stations and delivery points and shifting of originally selected sites at some stations so as to suit the requirements of the Marketing Division.
- (b) Right-of Way: On several occasions, in connection with the acquisition of the right-way various types of obstacles and difficulties like the non-availability of required area, opposition by farmers, etc. were encountered. At times the original alignment had to be changed and the drawings revised to meet the requirements of the situation.
- (c) Stoppages of work: Construction work had to be stopped for over 3 months in various stages of construction due to obstruction by land owners, non-availability of permission and permits for laying the Pipeline in the Durgapur Industrial Area, for crossing the land under the jurisdiction of Indian Air Force near Faridapur etc.
- (d) Haldia-Pump Stations: The decision regarding the location of pipeline facilities at Haldia could not be taken for a long time. The delay in this regard occurred because of the non-availability of clearance from Calcutta Port Commissioners, who in turn, depended upon their own alignment for the railway marshalling yard and other facilities in view of the development of Haldia as a major port and industrial complex.

2. Civil Works at Pump Stations:

The contracts for civil work at pump stations could be awarded only on 24th December, 1964, after fixing the exact locations. The contractor for civil works at Haldia, Asansol and Burdwan stations faild to execute the job and therefore, the contract was terminated in April, 1965. The work was reawarded to other contractors. The contractor for Burdwan also failed and the work was reawarded in February, 1966.

3. Railway permits for railbridge crossings

In the Haldia-Barauni-Kanpur Pipeline system, a number of railbridge crossings, some of which on very big rivers like Ganga and Sone were involved. Several technical difficulties were encountered in deciding the preliminary and final constructional dedesigns of railbridge crossings. Almost every design had to be revised several times to meet the requirements of the Railways. These types of designs were new to the Railways and they found it difficult to evaluate the details of the designs with their existing engineering staff. The processes of scrutiny and the procedures for approval of the designs thus became cumbersome and time consuming. The

drawings had to pass through the offices of Chief Inspector of Explosives, Additional Commissioner of Railway Safety and Chief Engineer of Railway concerned etc. In actual practice, the issue of permits by the Railways for railbridge crossings took 4 to 9 months from the date of submission of the drawings to them. The belated approval of the drawings led to delay in procurement of indigenous materials for the construction of railbridge crossings.

4. Monsoon shutdowns

In Haldia-Barauni section, particularly in the Bengal region the monsoon season is longer and the extent of rains is quite heavy. During four to five months of monsoon the construction work remained virtually suspended. The actual construction span of Barauni-Haldia section (March, 64 to October, 66) involved two monsoon seasons, accounting for the stoppage of work for about 10 months.

(iii) BARAUNI-KANPUR

1. Acquisition difficulties

- (a) Land: There was delay in selecting sites for pump stations and delivery ponts and shifting of originally selected site at some station so as to suit the requirement of the Marketing Division. Particularly regarding Kanpur terminal site, great difficulties were experienced when the Nagar Mahapalika of Kanpur (owners of the land) raised certain objections to the site allocation. Similarly for other staions sites at Patna, Mughalsarai and Allahabad great difficulties were experienced by Marketing Division.
- (b) Right of way: On several occasions in connection with the acquisition of the right of way difficulties a like non-availability of required area, opposition by farmers etc. were encountered.
- (c) Stoppage of work: Construction work had to be stopped near Fatehpur in U.P. during October November 64 due to certain alignment problems and for waiting for cutting of crops by farmers.

 2. Civil works at Pump Stations

The contracts for civil work at pump stations could be awarded only in December, 1964 after fixing the exact location of the pump stations and terminals and after due processing of the various offers received from the indigenous contractors. The contractors for cicil works at Barauni and Patna failed to carry out the work in time. The work had to be got done through SNAM SAIPEM.

3. Railway Permits for Rail Bridge Crossings

There are five major rail-bridge crossings in Barauni-Kanpur section alongwith which the pipeline has been laid. It took time

to decide the preliminary and final constructional designs of rail bridge crossings.

Apart from the above, other factors like late deliveries of owner-furnished materials viz. cement and coal tar enamel and primer to the contractor, Monsoon shut-down and non-procurement of vehicles in good time for supervision works because of late receipt of permits from Governments etc. also contributed to the delays in the completion of the Project.

6.3. In the reply to a query it has been stated: "There is nothing in record to indicate that these details were brought to the notice of the Government specially for resolution at Government level. These are details of day-to-day operations, with which the company is usually concerned."

B. Commissioning

6.4. The table given below shows the date of completion of construction of each pipeline and the date on which it was commissioned:—

S. No.	Pipeline	Target date of commissioning	Date of com- pletion of con truction	Date of com- missioning	
1. Gauhati-	Siliguri	June, 1963	24-10-1964	Oct. 1964	
2. Koyali-A	hmedabad	N.A.	3-2-1966	1-4-1966	
3. Barau i-	Kanpur	30-6-1 9 65	17-8-1 966	29-9-1966	
4. Barauni-	Halidia	30-4-1265	31-10-1566	23-9-1967	

- 6.5. While there has been a time lag of about one two months between the time of completion of construction and the date of commissioning in the case of Koyali-Ahmedabad and Barauni-Kanpur pipeline, the time lag in the case of Barauni-Haldia pipeline was about 11 months.
- 6.6. Thus it is seen that there was long delay in Actual completion of construction and commissioning of Ha'dia-Barauni-Kanpur pipelines.
- 6.7. During the course of evidence of the Ministry of Petroleum and Chemicals and Mines and Metals, the Committee pointed out that there was too much delay in the actual completion of the pipeline as compared to target dates and wanted to know the machinery that existed in the Ministry to watch the progress of the projects. The witness stated that the machinery that existed in the Ministry to watch the progress of the projects was of two kinds—

regular kind of activity and ad hoc kind of activity. The regular kind of activity was that a Progress Review meeting was conducted by the Secretary of the Ministry where all officers concerned were present. The second was the monthly progress reports from the Undertaking.

- 6.80. There was another ad hoc type of machinery where series of consultations were held whenever a particular problem was referred.
- 6.9. The Committee are surprised to learn from the Ministry that the various reasons that caused the delay in the construction of the pipelines were not specifically brought to the notice of Government for resolving at Government level. To them, it appears, that the "emergency" and "speed" stated to be involved in the projects was only confined to the entrusting of works to the foreign contractors without inviting Global Tenders. Afterwards, both the Undertaking and the Ministry hardly took any effective measures to expedite the completion of the project. The Committee expect the Ministry to take initiative in matters involving clearance by Government Ministry in the interest of timely execution of vital project.
- 6.10. The Committee are convinced that the Ministry do not make any effective use of the reports from the Undertakings nor do they have technically qualified personnel to scrutinise them. They are of the view that the existing machinery in the Ministries is not capable of effective supervision of Public Undertakings. They recommend that the Government should appoint a Committee consisting of Management experts Secretaries of Ministries controlling major Undertakings to evolve a proper machinery for their respective Ministries capable of exercising effective control on their Undertakings.
- 6.11. This Committee of Experts should also advise as to how the existing procedure of control in the Ministries could be further streamlined to enable them to have a grip on:—
 - 1. Progress of construction of project from time to time;
 - 2. Financial matters with specific reference to the progress of actual expenditure vis-a-vis the target and according to the sanctioned estimates;
 - 3. The information received from the projects from time to time and to ensure that the materials are scrutinised, digested and co-related promptly and put up to the Secretary Minister without any loss of time to enable them to know the true picture at any given time so that in the event of any weakness being detected prompt action is initiated by the Ministry;
 - 4. The administrative ministries should develop a central control agency on the pattern existing at the head quarters of

Railway and Defence Ministries to deal with their respective departmental undertakings and also in existence at the head quarters of giant international enterprises after suitable adoption and modifications 30 that the ministries could have not only complete grip over the progress and functioning of Public Undertakings but are also furnished the information and data after proper screening and sifting.

- 5. Study of important areas in the Undertakings and technique including PERT SYSTEM to locate the critical areas in every Undertaking.
- 6.12. The Committee recommend that the proper machinery should be evolved to provide an effective leadership to the Undertaking through the medium of technically qualified cell. Unless this is achieved the Committee is convinced that the Ministries will not be able to discharge their responsibilities to the Undertakings.

LAYING OF PIPELINE THROUGH COAL BEARING AREAS

The Haldia-Barauni-Kanpur pipeline passes through coal bearing areas under Police Stations Solanpur. Kulti. Asansol. Ranigani Jamuria and Ondal in Burdwan district in the vicinity of Asansol. The right of way was to be acquired under the Petroleum Pipelines (Acquisition of Right of User in Land) Act. 1962. Under section 3(1) of the Act, notifications were issued for the purpose inviting objections. On September, 17, 1963 the competent authority for West Bengal reported that the Mining Adviser to the Government of West Bengal had objected to the laying of pipelines within the coallfield area in Police Stations Solanpur, Kulti, Asansol, Raniganj, Jamuria and Ondal on the groun that after depillaring in the working mines the land over the coalfields will subside and cause damage to the pipeline and that there was a danger of fire spreading over the whole coalfield area. He further reported that the Mining Adviser, West Bengal, had recommended diverting the route of the pipeline away from the coalfields. The Government of India were apprised of this position. Discussions were held with Snam Ltd., Indian Branch, as well as with the Coal Mining Adviser to Ministry of Mines and Fuel. On the 14th October, 1963, the Coal Mining Adviser to the Ministry of Mines and Fuel wrote to express his agreement with the opinion given by the Mining Adviser to the Government of West Bengal, and suggested changing the route of the pipeline if possible and if it is decided to carry the pipeline over the coal field area, a proper survey will have to be conducted to determine the actual position of coal below the route of the pipe-On the 15th October, 1963, a meeting was held in the Ministry of Mines and Fuel which was attended among others by representatives of Snam and Bechtel. Both Snam and Bechtel stated at this meeting that there should be no difficulty about constructing the pipeline over the coal mines.

7.2. On the 24th October, 1963, Bechtels wrote to say that according to information received from their representatives in Milan, the design of the project was likely to be held up because of lack of information decision on the part of Indian Refineries Ltd. in respect of the route of the pipeline. This matter was discussed by the Managing Director Indian Refineries Ltd. with the representatives of Snam and Bechtel on the 19th November, 1963 and again on the 28th November, 1963 it was confirmed on behalf of Indian Refineries Ltd. that there will not be any change in the alignment of Haldia-Barauni Section of the pipeline, nor will there be any branch line to Budge-Budge.

- 7.3. Subsequently Snam wrote on the 3rd December, 1963, to say that the question of avoiding the coal mines area from Ondal to Solanpur was rejected because of the following reasons:—
 - (i) the town of Asansol will be completely out of the route of the pipeline;
 - (ii) the length of the pipeline will be slightly increased;
 - (iii) valuable time will be required for the survey of the new alignment and a new design;
 - (iv) the hydraulic calculation of the line would have to be revised and probably lead to making the equipment already ordered useless; and
 - (v) the above factors would lead to delay and increase in the cost of the project.
- 7.4. Snam concluded that the selected alignment was completely safe for the mines as well as for the pipeline. In a letter dated 20th December, 1963, Bechtels also reiterated that "the crossing of the coal mining area presents no technical difficulties to the products pipeline construction or operation". Bechtel added: "We can make this statement without reservation, based upon our knowledge of pipeline engineering and our previous experience with pipelines under similar conditions." Bechtel stated categorically that from their experience of construction of pipelines in coal mining area in the USA, France and Germany, no difficulty has been experienced, and no special steps need be taken by the owners of the coal mines because of the presence of the pipeline and that the coal mine operators may proceed to mine below the pipeline as they normally would and so no reservation of areas will be required.
- 7.5. These views were brought to the notice of the Coal Mining Adviser to the Department of Mines and Metals (previously Mines and Fuel). He wrote to say that as the Chief Inspector of Mines, Dhanbad, was responsible for the safety of mines, consulting him was essential. Subsequently, a discussion took place on 21st December, 1963, with the (i) Chief Inspector of Mines, Dhanbad, (ii) Adviser to the Planning Commission, and (iii) Coal Mining Adviser to the Department of Mines and Metals with the participation of Snam and Bechtel, after which the Coal Mining Adviser wrote to say that it would be very unwise to lay the pipeline where the coal mines are being worked below and at places at shallow depth. In reply to this letter it was stated on behalf of Indian Refineries Ltd. that according to the experts (namely, Snam and Bechtel) there would be no danger to the pipeline if it was laid in the coal mines and if any protective measures were necessary for the pipeline at certain specified points, they would be undertaken by the pipeline authorities. At the same time, the Ministry of Petroleum Chemicals (formerly Mines and Fuel) was requested to obtain the necessary clearance from the coal mining experts.

- 7.6. On the 22nd October, 1964, the Chief Inspector of Mines, Dhanbad, the statutory authority under the Indian Mines Act for safety in Coal mines, had stated in a letter to the ministry of Petroleum and Chemicals that it would be necessary to provide adequate width on either side and below the pipeline in the coal seams as a measure of protection. On the 21st December, 1964, he wrote to Messrs. Lodna Colliery, one of the coal companies affected, that restrictions on the working will have to be imposed if the pipeline is permitted to pass over coal bearing areas.
- 7.7. Acquisition of right-of-way for the pipeline in the coal mining areas was suspended from September, 1963 to April, 1964. January, 1964, the construction team was still near the starting point at the South end, i.e., near Haldia in Midnapur District, and actual construction started on 8th March, 1964. However, an additional construction team started from south of Burdwan (approximately 100 kh. from the coal mining area) and began to work its way upwards towards Asansol and Barauni from 16th March, 1964. On this basis the land was required in the Asansol area sometime in April, 1964. Accordingly, the Indian Refineries Ltd. management kept on requesting the Ministry of Petroleum and Chemicals to issue instructions to the coal mining experts of Government for removing their objections so that notification for acquiring right of way over the coalfields could be issued. On the 8th April, 1964, the Ministry of Petroleum and Chemicals issued a letter addressed to the Government of West Bengal (Appendix VIII) in which it was stated that there need be no apprehension regarding the safety of coal mines as a result of laying the petroleum pipelines. It was added: "However, if any safety or protective measures are required for the safety of the pipeline, the same will be adequately provided for at the cost of the pipeline authority." After the issue of this letter the notifications for acquisition of the right of way in the Police Stations Jamuria, Raniganj, Ondal, Asansol, Kulti, Salanpur, etc., were issu-However, the construction team could complete laying only upto Ondal by the 18th May, 1964, when construction activities were suspended owing to the monsoon. By the middle of February, 1965, the pipeline was laid over the whole of the coalfields area.
- 7.8. The portion of the Haldia-Barauni pipeline laid in the coal field area which is between Ondal and Salanpur about 45 kms., one third of which lies over lease hold areas and the rest passes over abandoned coal fields and unleased coal bearing areas. Several coal companies like Lodna Collieries, Bengal Coal Co., Andrew Yule Co., Madhavpur Coal Co. Private Ltd. and National Coal Development Corporation had interests in the area.
- 7.9. At the end of January, 1965, M|s. Lodna Collieries served a notice demanding compensation of Rs. 49 lakhs for alleged loss of 28 lakh tonnes of coal locked up under the pipeline and stated that the notifications issued under the Petroleum Pipelines (Acquisition

of Right of Users in Land) Act, 1962 were ultra vires of Article 14 of the Constitution. At the beginning of February, 1965 M|s. Lodna Collieries obtained a rule under Article 226 of the Constitution from the Calcutta High Court to show cause, why a writ of Mandamus should not be issued directing the cancellation of the notifications issued under the Petroleum Pipelines (Acquisition of Right of User in land) Act, 1962. A similar rule was obtained at a later stage on behalf of Bengal Coal Co. which claimed a compensation of Rs. 213.68 lakhs for alleged loss of about 122 lakhs tonnes of coal.

- 7.10. In May, 1966, the petition for writ of Mandamus filed by Bengal Coal Co., was dismissed by the High Court as the party could not produce any evidence to show that they had been restrained in any way from the extraction of the coal under the pipeline.
- 7.11. In respect of Lodna Colliery, the Calcutta High Court gave its judgement on 25th August, 1967, on the writ petition, and the Court ordered that the compensation claims for the Right of User in Land in the coal field areas should be heard denove by the Competent Authority under the Petroleum Pipelines (ARUL) Act, 1962, as the Lodna Colliery could produce letter dated 21st December, 1964 from the Chief Inspector of Mines (now Director General Mines Safety) Dhanbad in which the latter had declared his intention to apply restriction on coal mining under the pipeline. The Competent Authority who heard the case directed the Lodna Collieries to arrange for the inspection of the documents by the Solicitors of the IOC showing their mining rights etc. In the area concerned and to supply full particulars as to how the claimant had arrived at the estimate of 28 lakhs tonnes of high grade coal which had been alleged to been blocked on account of the laying of the Pipeline and for which a compensation of Rs. 49 lakhs had been demanded. The Lodna Collieries did not produce any documents in support of their claim.
- 7.12. In the judgement delivered by the Calcutta High Court on 25th August, 1967, mentioned above it was ordered that the Competent Authority should commence the rehearing proceedings within the first week of February, 1968, and complete the same within 4 months from the date of hearing. The first hearing took place on rebruary, 1968 and, therefore, as per orders of the Court the whole proceedings should have been completed by 7th June, 1968. As the petitioners did not produce any document in support of their claim the Competent Authority could not complete its proceedings by the stipulated period and, therefore, Solicitors on behalf of IOC filed a petition in the High Court praying that an order be issued to the Competent Authority asking him to dismiss the claim of M|s. Lodna Colliery or to direct the Competent Authority to decide and determine the said case within a reasonable time. The petition which was admitted is stated to be still pending in the High Court.

- 7.13. In addition to the claim of Lodna Colliery mentioned above compensation claims in respect of three more collieries (viz, Sibpur Coal Co. Rs. 80.50 lakhs, New Bribhum Coal Co. Rs. 211.75 lakhs; and Bengal Coal Co. Rs. 224 lakhs) are stated to be pending for hearing in the Dist. Judge's Court at Burdwan. These claimants could not so far file necessary evidence and documents in the court in support of their claim and, therefore, the cases have not come up for hearing so far. So far as Bengal Coal Co. is concerned their earlier writ petition in the Calcutta High Court was dismissed by the Court as the party could not produce any evidence to show that they had been restrained in any way from the extraction of the coal under the pipeline. The other two collieries have also not so far produced any evidence to show that they had been restrained from extraction of the coal under the pipeline.
- 7.14. In February, 1965 Bechtel's representatives in Delhi had written to his principals in San Francisco asking for advice on the problem of building pipelines across coalfields. The San Francisco office replied on the 8th February, 1965 that in such matters it would be necessary to obtain the advice of a mining consultant engineer for recommendation on the nature restrictions to be imposed on the mines near the pipeline.
- 7.15. In June, 1965 Bechtels wrote to Indian Refineries Ltd. that Shri C. J. J. Raju, a mining consultant engineer, may be engaged for the above purpose. Shri Raju who was appointed to further study the problems of the HBK Pipeline routed through the Raniganj coal fields, was a consultant to the Government of Orissa Mining Corporation and he was recommended to Bechtel by a Technical Engineer from AID New Delhi and this recommendation was also supported by a former consultant to AID in India who was then posted in Washington.
- 7.16. At the beginning of August, 1965, the Ministry of Petroleum and Chemicals wrote to Indian refineries Ltd. recommending the engagement of the Mining Expert suggested by Betchel. Shri C. J. J. Raju was accordingly retained to give his opinion on the problem. After studying the problem in consultation with various authorities and after a detailed tour of the areas, Shri Raju submitted a report on the 18th November, 1965 in which he stated inter alia that "it would be a desirable step to divert the pipeline or lay a new pipeline over nearby areas free from coal deposits. In the meantime it may be possible to keep up the pumping of oil through the present pipeline with the advice and guidance of the Chief Inspector of Mines."
- 7.17. Shri Raju's report was discussed in the inter-ministerial meetings attended by the representatives of the Ministries of Petroleum and Chemicals, Mines and Metals, Coal Controller, Chief Inspector of Mines, Planning Commission and I.O.C. Taking all the

factors into consideration, it was felt that the best way would be to plan for restricted diversion of the pipeline within the next two or three years which could fit in with the diversion over the complete coal field area should such a course be found necessary at a later date, and the pipeline permitted to be in operation till then with proper safeguards.

7.18. Following that decision, a survey and design team was stationed at Asansol under a senior engineer of the Pipelines Division. The Survey Report was received on the 2nd November, 1966 and it was found that it would be necessary to build a diversion of 93 Kms. in order to avoid coalfields spread over 75 Kms. of the present pipeline. Construction of this diversion was estimated to cost about 195 lakhs. The matter was placed before the Board of Directors on the 28th December, 1966 who sanctioned the same. Since it involved a capital expenditure in excess of Rs. 50 lakhs, it was necessary to obtain the approval of the Government of India under article 116(4) of the Articles of Association of the Corporation. Sanction of the Government of India was received on the 12th May, 1967.

Investigation Committee

- 7.19. An Investigation Committee consisting of the representatives of the Director-General, Mines Safety, National Coal Development Corporation, Government of West Bengal and IOC was constituted in May, 1968 to conduct actual ground study of the coal mining areas through which the pipelines passes and to examine and report on the following points in particular and on other possible related matters.
 - (i) The Portions, if any, likely to be affected taking into consideration possible subsidence fire-hazard, coal workings etc., and the extent thereof;
 - (ii) The nature and extent of restrictions which may have to be imposed under various Acts and Regulations on Mining Coal in the actual coal working areas;
 - (i.i) To prescribe ways and means to reduce loss of coal by modification of mining and that of Pipelines maintenance practices.
- 7.20. The report of the Committee was received on 16th September, 1968.
- 7.21. The Investigation Committee in this report stated that "Considering all aspects of the problem the Committee has come to the conclusion that laying of the pipeline in the present alignment through the coal field area has not been a happy choice. In its wake

it has brought up a number of problems which have to be faced by India Oil Corporation throughout the life of the pipeline at a heavy recurring cost. It will have to maintain a constant vigilance over the pipeline with a special squad sufficiently equipped with men and materials for the purpose. Even then Indian Oil Corporation would not at any time be free from constant anxiety regarding their pipeline and the fear of affecting the mines. However, in view of the fact that laying of the pipeline is a "fait accompli" and it is in commission the Committee has recommended certain preventative and palliative measures in general considering that the pipeline is of national importance, the Committee only hoped that the mine managements will give a little more enlightended consideration while extracting coal in the close vicinity of the pipeline."

- 7.22. The Investigation Committee also recommended that "a portion of pipeline over a length of approximately 12,4000 ft. should be diverted." (Findings of the Investigation Committee are at Appendix IX).
- 7.23. In reply to a question as to why it was decided to lay the pipeline through coal bearing areas when it was objected to by the Chief Inspector of Mines and Mining Adviser of West Bengal Government, the Corporation has stated as follow:
 - "The Mining Adviser to the Government of West Bengal in his letter No. 3158-Mines, dated 18th September, 1963 addressed to the competent Authority had objected to the laying of pipelines thro' coal bearing area on the folloning grounds:
 - (i) Laying of the pipeline would permanently block a huge quantity of coal and the cost of coal which would be a loss to the nation would come to about Rs. 350 crores out of which Rs. 20 crores would be the loss to the State Government by way of royalty.
 - (ii) The conditions of some of the old workings of collieries were not known and the same might cause subsidence. Any subsidence in the pipeline area was bound to affect the pipeline itself. If the pipeline, due to subsidence, bends and cracks and if the petroleum products flowed into any working mine through any surface cracks, the mine would be lost as it would be difficult to pump out petroleum from the working mine and if the petroleum product found its way into any fire area, present or future, the situation would be beyond control and the resultant fire would further affect the pipeline.

(iii) In spite of the best efforts by the Mines Inspectorate and other Organisations, there might be subsidence in the mines adjacent to the pipeline and the subsidence could affect the pipeline itself. Depillaring in the adjacent area might cause fire and the Raniganj coal was very liable to spontaneous combustion. fire might grdually eat up the coal barrier under the pipeline. This barrier would invariably be punctured at many places for effecting entry into the coal bearing land on either side of the pipeline and the fire. which might develop into the depillared area, would aggravate the situation as it would pass through the connecting roadways through the barrier. Moreover coal was burnt in open stack extensively in the coal field for manufacture of soft coke and it might be difficult to control such open stock fire. Any fire on the surface or under ground would be a potential source of danger to the pipeline itself".

7.24. The Corporation has stated that the Chief Inspector of Mines advised the following objection in his letter of 22nd October, 1964:—

"From a scrutiny of the plan that had been forwarded by the Coal Mining Adviser it was seen that the pipeline will pass over mines where a number of seams have been developed. The depth of the cover below the pipeline near the outcrops of the seams is negligible. In fact the pipeline cuts across and outcrops of several coal seams. The extraction of seams in these seams by caving method is bound to result in subsidence of surface which will depend on the thickness of the seams. As the cover will, in some places be as small as 30/40 ft. the subsidence in such cases may be as much as 2/3 metres in a seam 4/5 metres thick. This subsidence will increase if two or more seams are extracted beneath the proposed pipeline. The subsidence caused by the extraction of one thick seam will be sufficient to cause a serious damage to the pipeline as the ground supporting the pipeline will sink almost vertically leaving no support for it.

7.25. It may not be enough to provide, as proposed, a minimum width of 10 ft. or 5 ft. on either side of pipeline under which there would be no extraction of coal. The extent upto which such support for the protection of the pipe will be necessary would depend upon the thickness and depth of the same underneath."

- 7.25. Again the Chief Inspector of Mines in his letter dated 15th January, 1965 to the Ministry of Petroleum and Chemicals disagreed with the opinion of the expert of the Indian Refineries Ltd., and brought out the following points:
 - "As I have already indicated in my letter No. 5638 I-G, dated 22nd October, 1964, I cannot agree with the opinion of the expert of the Refinerics Ltd., that there should be no mining restrictions on coal mining operations below the oil pipeline at depths of 100 ft. and more. I do not know the basis of this opinion. So far as experience in this country goes there will be a considerable subsidence if a thick seam is extracted by caving system. The extent of subsidence would of course depend on the depth of the cover and the thickness of the seam as also on the method of extraction. Thick seam when extracted at a depth of say 400 to 500 ft. even "would cause considerable subsidence on the surface and there have been cases in coal fields where subsidence at such depths has exceeded 3 to 4 metres in depth. I am therefore not prepared to accept that depillaring at depths greater than 100 ft. would not cause any damage to the pipeline. In my opinion it would be necessary to leave at least 25 feet solid coal on either side of the pipeline if damage to the pipeline is to be prevented while a thick seam is extracted with caving system in vicinity of the pipeline. More support may however, be necessary if there are any faults or dykes traversing the ground near the pipeline. If extraction of coal is done in conjunction with hydraulic sand stowing the depth beyond which no such restriction may be laid would depend upon the thickness of the seams extracted and depth of cover."
 - I may add that the subsidence may not only course damage to the pipeline but would also result in oil leaking into the underground workings through the broken ground. This could be a source of danger as the oil may cause fire and explosion which in turn are likely to cause loss of life. I would also like to point out that with the pipeline laid over the coal bearing area huge quantity of coal be locked up because this department would not permit depillaring underneath the pipeline without laying down the restrictions regarding leaving of solid support for the pipeline as indicated above."
- 7.27. The Committee enquired when the Mining Adviser to the Government of West Bengal had objected and had stated that 'it would be very unwise to lay the pipeline where the coal-mines were being worked', why was it decided to lay the pipeline through that area. The Ministry have in reply thereto stated:

- "So far as the objection raised by the Mining Adviser to the Government of West Bengal is concerned the matter was considered at length at a meeting held on 15th October, 1963 by the Government of India, Ministry of Mines and Fuel in consultation with the experts of Snam Progetti of Italy, who designed the pipeline system and the Bechtel Corporation of U.S.A., who were IOC's managers and technical consultants for the pipeline. Both Snam-Progetti and Bachtel, with their worldwide experience of laying pipelines, including those over coal bearing areas, were firmly of the view that:
 - (i) There was no danger to the pipeline in coal bearing areas where the first working has been done and the coal was standing on pillars, even though such subsidence might occur on depillaring operations. The pipeline would be able to adjust itself to the subsidence that normally occured in such areas. There was also no danger of leakage arising on this account and causing any danger to the coal fields.
 - (ii) So far as the pipeline was concerned, it was not necessary to provide any protection by way of keeping some coal bearing areas unworked.
 - (iii) No special steps were necessary by the owners of coal mines merely because the pipeline passes thro' the area, and there was, therefore, no question of any compensation.
 - (iv) Altering the alignment will involve new design and possibly new equipment, leaving Asansol completely out, a proportionate increase in the length of the line and substantial delays in the completion of the work."
- 7.28. "There was again another meeting on 21st December, 1963 between the Coal Mining Adviser, Ministry of Steel Mines & Heavy Engineering, Chief Inspector of Mines, representatives of Bechtel Corporation and of the Ministry of Petroleum & Chemicals, and the General Manager (Pipelines) of IOC. At this meeting, the Bechtel representative again reiterated their views and added that where the overburden was more than 100 ft. there should not be any restriction for any sort of mining.
- 7.29. Taking all the factors into account the Ministry of Petroleum & Chemicals with the concurrence of the Department of Mines & Metals addressed the West Bengal Government in their letter dated 8-4-1964 answering the objections raised by the Mining Adviser to the Government of West Bengal."

- 7.30. During the course of evidence the Committee drew attention of the representative of the Ministry to their letter No. 21|62|63-ONG, dated the 8th April, 1964 to the Government of West Bengal Commerce & Industries Development, Calcutta (Annexure VIII) regarding laying of pipelines through Raniganj Coal fields, which was issued with the concurrence of the Department of Mines & Metals, Ministry of Steel, Mines and Heavy Engineering and enquired whether the Indian Mining expert agreed to the laying of pipelines through coal fields before the above letter was issued. It was stated that the Ministry of Mines & Metal got the approval of the Mining Adviser to the issue of that letter.
- 7.31. The Committee pointed out that whenever the Indian experts of the Ministry of Mines and Metals and the West Bengal Government were consulted, they were all of the view that it was not safe to lay pipelines over the coal belt area. Inspite of that. why the Ministry thought it fit to accept the advice of I.O.C's expert -M|s. Bechtel, that the pipeline would be safely put over the coal bearing areas. The Special Secretary to the Ministry, stated that in order to get the perspective as to how that thing came to be, it might be useful to consider the period prior to 8th April, 1964, as a separate chronological entity from the period after 8th April, 1964. being that particular clearance of the Ministry was The reason issued on that day i.e. the 8th April, 1964, when a firm decision had been taken and acted on. He stated that it was true that prior to 8th April, 1964, there were cautionary elements in the advice Indian Mining Experts of the Government of India and the West Bengal. But against that advice, they had the advice not only from Betchel, but from Snam also which was in favour of laying the pipeline in the coal bearing area. Several discussions between Indian Experts and Bechtels were arranged. These differences of opinions came to a point where Government had to take a decision. The advice given on the letter of the 8th April, 1964 by Coal Mining Adviser reproduced below revealed the circumstances:—
 - "I had separate discussions with Shri Kashyap and he mentioned to me that the pipeline project was very important and required to be completed without any delay in national interest. As reported in note (42) above, GM (PP) was unable now to alter the alignment as suggested by me earlier i.e. along the railway line or the G.T. Road, since laying of pipeline as per the present alignment is a must, it was agreed that the Indian Refineries Ltd. may undertake to provide necessary protective works for safety of the pipeline in the coal mines as per rules and regulations relating to the working of the coal mines.

- In view of the circumstances explained above, and provision for necessary safety measures, I feel we can now concur to the issue of the letter to the Government of West Bengal."
- 7.32. The Committee drew the attention of the Special Secretary of the Ministry to the fact that as the Coal Mining Adviser was subordinate to the Ministry and as it was stated "Since laying of pipeline as per the present alignment is a must. . . . "The Coal Mining Adviser had to accept the decision of the Ministry. The Coal Mining Adviser, by adding the line in his note that "as per the present alignment is a must . . .", in fact was not a party to that decision. The Special Secretary of the Ministry replied as follows:—
 - "My own assessment of the position is this. We had practically no experience in this country about taking such a pipeline over such an area. It was our first job. Our Mining experts also had no experience of that in regard to this country. Their acknowledge on the subject was academic and, to some extent, based on any observation they may have made outside the country. We got categorical advice from the persons who claim to have laid pipelines in various countries of the world in other somewhat similar terrain.
 - I think, the process that worked was that the Ministry thought the advice was of a more practical content, possibly, because we are also conservative by temperament and so on, and, therefore, they were thinking on those lines. I think, some such psychological or emotional process took place. While these things went on at a particular time, our experts thought, taking the administrative Ministry's position into consideration together with the guarantee by the Ministry that they would provide any protective works that were necessary, about these things and decided to let them go ahead. I think something of that kind happened.
 - There is a little bit of retrospective history to suggest that perhaps, though it might have been wiser to avoid this hazard altogether, to some extent, the decision taken was not unwise because we have run that line for almost two years and, as far as the breaches and leakages and all that in that line go, that has proved incorrect. In fact, considering this case I am told there are cases where sometimes breaches and leakages have occurred, without damage.

- 7.33. In regard to the other points of actual mining operations have been done under these very specific areas, that of course has not been put to test. But a part of the fears have ben put to test and have been found so far, over two years, not well-founded though two years experience may not be adequate. But it is something, I think some kind of psychological thinking as described determined the position. Then, there were also other factors like the survey of the area, particular alignment fixed and so on."
- 7.34. Regarding the Ministry's note, the Special Secretary informed the Committee that there was a note of the time which reads as follows:—
 - "The question of carrying petroleum pipelines over coal fields was discussed in detail, in the room of Shri S. N. Sahgal, C.M.A., today Shri M. Gopal Menon, B.M. (PP) and Shri B. Subba Rao, Under Secretary, were also present.
 - GM (PP) pointed out that it was not possible under the present circumstances, to change the alignment of the Haldia-Barauni pipeline so as to take it along side railway lines or the national highway. This would not only mean extra expenditure on account of the increased mileage resulting from the detour, but also the pipeline project would get delayed by about a year. The Cabinet had given the top most priority to this pipeline and had desired that it should be taken up on an emergency basis. Therefore, the original pipeline alignment over the coal fields could not be changed. The only alternative was, therefore, to meet the objections of the coal mining authorities for so laying the pipelines.
 - C.M.A. pointed out that in view of these circumstances, there was no alternative but to take the pipeline on the coal field although he was personally not in favour of such a step. CMA pointed out that in certain areas, where the over-burden was extremely thin, safety measures such as stoving etc. may have to be taken. In some areas coal may have to be reserved in order to avoid a danger to the pipeline.
 - After detailed discussions, it was agreed that in case any protective works became necessary in the coal mines for the safety of the pipeline then such safety measures will be adequately provided for in accordance with the various rules and regulations relating to the working of coal mines. This was agreed to by the GM (PP).

- A draft letter to the West Bengal Government was then prepared and the concurrence of both CMA and GM (PP) was taken. This draft is placed in the file below. Department of Mines and Metals may now kindly accord concurrence to the issue of the said letter."
- 7.35. The Committee regret to note that the entire question of laying the pipeline through the coal bearing area has not been dealt with care and caution it deserved. They note that Technical opinions had been throughout against the laying of pipeline through the coal bearing area. The Mining Adviser to West Bengal Government (on 17-9-63) followed by Chief Mining Adviser to the Ministry of Mines and Fuel (on 14-10-63) and Chief Inspector of Mines, Dhanbad (on 21-12-63) had emphatically repeatedly objected to the laying of this pipeline through the coal bearing areas. The foreign technical advisers of the Corporation viz.Snam-Progetti Bechtel however, held contrary views and categorically stated that no technical difficulty or risk was involved to the pipeline or to the coal bearing areas and insisted that the pipeline should be laid as suggested by them. Ignoring the warning of the Indian experts, I.R.L. accepted the advice of their foreign technical advisers and wrote as follows in their letter of January, 1964:—
 - "There will be no danger to the pipeline if it is laid in the coal mines and if any protective measures are necessary for the pipeline at certain specified points, they would be undertaken by the pipeline authorities and at the same time requested the Ministry to obtain necessary clearance from the Coal Mining experts."
- 7.36. The Committee is surprised to find that Bechtels, the consultants of IRL in their letter, dated the 20-12-1963 confirming that the crossing of coal Mining areas presents no technical difficulties to the products pipeline stated categorically that from their experience of construction of pipeline in coal mining areas in the U.S.A., France and Germany no difficulty has been experienced. While accepting the advice, the Committee find that Bechtel did not point out any specific instance of a place or area in a foreign country where the pipeline has been laid through the coal fields.
- 7.37. The Committee find that while the question of laying pipeline through coal bearing areas was being discussed in November-December, 1963 in consultation with the Coal Mining Adviser to the Government of India, the Managing Director, Indian Refineries Limited is on record as having stated at a meeting with representatives of Bechtels and Snam regarding the location of Ruderani Terminal that "there will not be any change in the alignment of the Haldia-Barauni Section of the Pipeline." This would suggest that the issue had been foreclosed at administrative level of Indian Refineries even while the discussions were going on with the Mining experts of the Government.

- 7.37. After the completion of project again in February, Bechtels representative in Delhi wrote to their principals in San Francisco Office asking for advice on the problem of laying pipelines across coalfields. The San Francisco office replied on the 8th February, 1965 that in such matters "it would be necessary to obtain the advice of a mining consultant engineer and they recommended that Shri C.J.J. Raju be consulted". The Committee find that Shri Raju in his report has inter alia observed that during his visit to Jharia coalfields, he found that "the safety pillars left below the township and public roadways are liable to be destroyed due to the fires in the neighbouring goafs and that cracks extended to the surface above the safety pillars were emitting smoke. Mr. Hoaffert of Bechtels on his note on the visit to the coalfields on 8th April. 1965 noticed fire on the surface". In the opinion of Shri Raju "this hazard of the pipeline being exposed to hot smoke due to fire, etc., the cracks cannot be ruled out. This aspect of the problem did not seem to have been given the necessary consideration by Engineering while planning the layout of the pipeline. Even when the question of advisability of laying the pipeline was questioned, both Bechtels (consultants to IOC) and Snam (Design Contractors) did not seem to have studied it in all its aspects and given the necessary advice at that stage in which case the difficult problem could have been avoided". Shri Raju in his report also stated "that it would be a desirable step to divert the pipeline or lay a new pipeline over nearby areas free from coal deposits".
- 7.39. The Committee further find that neither Indian Refineries Limited nor Government had consulted the Geological Survey of India or asked them to prepare the section showing the outlay of coal seems along the pipeline till Shri Raju specifically asked for the map which was prepared for the first time at his instance. Shri Raju in his report has mentioned that a number of collieries over which the pipeline passes viz Sripur, Satram, Madhavpur etc. have gassy fires and that in some of these collieries, particularly old ones, where working has been discontinued, fires may start any time.
- 7.40. Shri Raju's report was discussed at a Inter-Ministry meeting on 8-2-1966 and a decision was taken to "plan for a restricted diversion of the pipeline over the worked leased held areas within the next two or three years and the pipeline permitted to be in operation till then with proper safegards".
- 7.41. It was ultimately decided by the IRL Board Government on the Report of a Survey and Design team set up for the purpose to a diversion of 96 kms, to avoid the coalfields at a cost of Rs. 195 lakhs, which was sanctioned by the Government of India on 12-5-1967.

- 7.42. The Committee feel that it is indeed unfortunate that the Government disregarded the opinion of the Indian Mining Experts and completely relied upon the advice of the foreign experts for laying the pipeline through the coal-fields. As the events have proved, the views of the Indian experts have ultimately prevailed.
- 7.43. The other point that the Committee have noted with regret is that IRL made a commitment of providing necessary protective measures in the coalfield area without examining and knowing the financial implications for such a commitment and even without knowing fully what those protective measures would be. Curiously enough, the protective measures were to cost Rs. 18 crores as against the laying of new pipelines which was to cost Rs. 2 crores. The Committee are extremely surprised to find that the IRL|Government had never applied its mind to the economies of the protective measures vis-a-vis the expenses of laying new pipelines which is unpardonable. What surprises the Committee most is that IRL|Government before making their commitment amounting to Rs. 18 crores for protective measures never deemed it necessary to seek the prior approval of the Finance Ministry which was obligatory.
- 7.44. The Committee find that Government consulted the Burma Oil Company (Pipelines Division) in London in 1967 taking into account the fact that BOC Pipelines Division were working as consultants to Oil India in Naharkatiya Barauni crude pipenines. The Committee feel that the expert advice should have been sought at an earlier date so that their recommendations about the use of regulated mining practice, adoption of hydraulic and stowing etc. could be brought to the notice of the mining experts and mining concerns for consideration and allay their fears. The Committee are also of the view that the Investigation Committee which was appointed in May, 1968 should have been appointed in 1963 when the Mining Advisers to the West Bengal Government and the Advisers to the Government of India had objected to the laying of pipelines through the coal bearing areas in no uncertain terms and if that was done all these lapses would not have occurred.
- 7.45. The Committee regret that the indifference of IRL Government went to the extent of ignoring to ask for a third set of independent opinion before accepting the defective advice. The Committee is convinced that such gross indifference dereliction of duty of the officials of Government IRL being inexcuseable, impartial inquiry followed by severe punishment of guilty officials for the lapses is called for.
- 7.46. The main contention of the IRL in not agreeing to consider the proposal for diversion of alignment of the pipeline through the coal-bearing area in 1963 and 1964 was that a decision to realign the pipeline would result in considerable delay. The Committee desired to know the estimate of the delay that would have been caused, but no precise reply was forth-coming from Government.

- 7.47. The Committee would like to point out in this connection the following two salient facts:—
 - The first contract for construction work was signed with Snam on 31st July, 1963. The first objection of the West Bengal Government Mining Adviser to the West Bengal Government to the proposed alignment of the pipeline through coal-bearing areas was raised on 18-9-1963. The actual construction was started only in October, 1964.
- 7.48. It is also pertinent to recall that the Executive Project Report in the form of "drawings and specifications" came in piece-meal from 1963 till 1966 when the Project was completed.
- 7.49. Another reason put forward by IRL for not considering realignment of the pipeline is that it would have involved payment of damages to the contractors for down time for keeping their machines and men idle on the job. No estimate of the down time payment has been given to the Committee but judged from actual rate of down time payment made to the contractor for nonavailability of land etc., the Committee feel that its quantum would have been far less than the cost that would have been incurred for realigning the pipeline at that stage to avoid the coal-bearing area. The least that the Committee could expect from IRL Government was that they should have carried out a most careful appraisal of the various alternatives such as cost of realignment and payment of down time vis-a-vis the grave hazard of pushing the pipeline through the coal mining area against the advice of mining experts of Government. The Committee have pointed out elsewhere in the Report how the existing alignment of pipeline through the coal-bearing area is alleged to have resulted in locking up of coal reserves to the tune of Rs. 350 crores and carried an implied commitment to the tune of Rs. 18 crores on stowing works to minimise the hazard of fire in the area surrounding the pipeline.
- 7.50. It is, therefore, evident that in actual fact there was a time lag of over one year in the signing of the agreement and its execution which could have been used with prudence to go into all aspects of realignment and taken a decision in the over-all interest of the Project.
- 7.51. Another fact which comes prominently to notice in this case is that complete reliance was placed by the Public Undertakings Government on foreign companies for the preliminary Project Report, executive Project Report, engineering details, project execution, design monitoring and management supervision without exercising their right to over-see and scrutinise their actions to ensure that they were in the best interest of the country. The abject reliance on foreign companies went to the extent of rejecting outright the expert advice of Government's own Mining engineers.

7.52. The Committee would like the Public Undertakings Government to learn the lesson from this costly lapse that the responsibility for over-seeing the work of foreign collaborators should in no circumstances be compromised and that vigilance should be exercised at every stage to hold the foreign collaborators responsible for discharging their obligations under the contract faithfully. Government should also take care to make adequate provision in the agreements to safeguard their right to recover money for damages suffered or short-falls in capacity as compared to the designed capacity contracted and paid for.

VIII

CENTRAL VIGILANCE COMMISSIONER

The circumstances in which a portion of the Haldia-Barauni pipeline was laid in Bengal coal fields area was entrusted by the Government of India to the Central Vigilance Commissioner for investigation on 30-6-1967.

- 8.2. During the course of evidence of the Ministry of Petroleum and Chemicals and Mines and Metals (Department of Petroleum and Chemicals) the Committee enquired as to why did the Ministry refer the case about laying of Haldia-Barauni pipeline through coal bearing areas to the Central Vigilance Commission and what were the terms of reference?
- 8.3. Following were stated to be the terms of reference of the Rau Committee:
 - "To enquire into and report on the circumstances underlying provicional selection of the pipeline alignment between Ondal and Salampur, the objections raised thereto, the considerations given to the objections by IRL and the Government of India, the decision of the Government in April, 1964 to confirm the alignment, the further course of events leading upto the laying of the pipeline in late 1964 and early 1965 and the eventual decision to realign the route.
 - Without effecting the generality of the foregoing scope, the enquiry shall deal with the following matters in particular:
 - (i) Can the pipeline Engineers, Snam Progetti be assumed to have exercised due diligence and given adequate regard to Indian laws and regulations in proposing the alignment of the pipeline between Ondal and Salampur?
 - (ii) On the receipt of the West Bengal Government's objections, were the different aspects of the matter considered with proper care and in full consultations with the several authorities concerned? If not, what deficiencies have arisen or defaults been committed, and who if any one, should be held responsible therefor?

- (iii) What view must be held about the expert advice given by Bechtel and Snam Progetti on the objections to the proposed alignment? Should or can either or both of them be held in any way responsible legally or otherwise for the loss now being caused to I.O.C. and should any further action be taken about any such liability?
- (iv) On the clearance of the alignment by the Government of India in April 1964, did IRD IOC address itself properly to a determination of the safeguards to be provided on the proposed alignment and the costs likely to be incurred? Has there been any delay, or omission in this matter, and if so, who is responsible for it?
- (v) With the receipt of many representations from mine owners and in the light of the further discussions with the coal mining authorities in the second half of 1964, should or could IRL|IOC have decided to abandon the alignment and adopt an alternative one, having regard also to the known delay in the completion of the Barauni Refinery and the need to operate the pipeline? In not taking such a course, did the Company act in an improper or hasty or reckless manner?
- (vi) Was the Board of Directors of IRL|IOC kept informed of the developments in this matter and was the Board approval obtained to the steps taken from time to time? To what extent, if any, have there been improper omissions in seeking necessary approvals and sanctions? Who should be held responsible for any such omissions?
- (vii) Should any of the officials concerned with this matter in the Ministry of the Government of India and the IRL| IOC be held to have been prima facie careless or negligent in the discharge of their responsibilities? Should any action be taken against any of them. If so, what?
- (viii) Any other related matters."
- 8.4. In response to the Committee's query as to why did the Ministry think it fit to refer the matter of laying the Haldia-Barauni pipelines to Vigilance Commission, the Special Secretary of the Ministry informed the Committee that Government had decided to divert the pipelines away from the coal fields at a cost of approximately Rs. 2 crores, and for that they had to go to the Ministry of Finance. The then Finance Minister (Shri Morarji Desai) when saw the whole case, said in his note reproduced below that he was not quite satisfied with regard to the sequence of events in that case and advised that an enquiry may be made into it:
 - "I agree, in the circumstances, that diversion is inevitable and this may be approved.

- This appears to be a very bad case and has led to a wasteful expenditure of nearly Rs. 2 crores. This seems to be due almost entirely to the negligence and to the number of errors committed by those concerned. In particular, I note that, while the Chief Mining Inspector was consulted at the beginning and he had objected to the laying of the pipeline through the coal field and this objection had been repeated by other technical officers like the Chief Mining Adviser to the Government of West Bengal and the Coal Mining Adviser to the Government of India also, all this advice was disregarded.
- Further, a commitment appears to have been made in the Ministry's letter to the West Bengal Government that we would undertake protective and safety measures and pay for the same, without any calculation or idea of the costs involved in such measures. It was only much later on that it was reported that these measures might cost as much as Rs. 18 crores. This commitment was made without any intimation or consultation with the Ministry of Finance.
- It is not clear how this matter was dealt directly between the pipelines Division and the Ministry. The Boards of IRL and the IOC, who were primarily concerned with the matter, do not seem to have been consulted in any way after the first objections from the West Bengal Government were received in September, 1963.
- All these matters need an immediate "Enquiry" with a view to fixing responsibility on the officials concerned at all levels, both in the Pipelines Division and in the Ministry. I would like the Minister for Petroleum & Chemicals to consider instituting such an "Enquiry" straightaway, and I shall be glad to be kept informed of the results of the same.
- I would also like the matter to be pursued further as to the extent to which we can hold our technical consultants M|s. Bechtels etc. responsible for the wrong advice they had given to us and for the recovery of damages from them."
- 8.5. On an enquiry the Special Secretary informed the Committee that Shri Rau, the Vigilance Commissioner, was entrusted with this inquiry on 30.6.67 with the approval of the Minister for Petroleum and Chemicals and the Prime Minister. On the 19th June, 1967, the then Minister for Petroleum and Chemicals addressed the Prime Minister regarding appointment of Shri Rau.

- 8.6. The Special Secretary of the Ministry stated in evidence as follows:—
 - "Then Mr. Nayak wrote this note on 26.6.1967:—
 - "Shri Rau has agreed to carry out the Enquiry but wishes it be entrusted to him as C.V.C. I see no objection to this. Secondly, he says that since he must attend to the Enquiry in addition to his other work, it may take 3 to 4 months before he can submit his Report. This also seems acceptable. Finally as regards the terms of reference, with which he generally agrees, he wanted that a clause may be added to deal with "Any other related matters."
- 8.7. On the 26th June, 1967, Mr. Nayak reported to the Minister, the result of his discussions he had with Shri Rau for entrusting the enquiry into H.B.K. pipeline to him. On the 30th June, 1967, Mr. Nayak addressed to Mr. Rau as follows:—
 - Following our discussion and your agreement, I am writing to communicate to you formally the Government of India's decision to entrust to you as Central Vigilance Commissioner an enquiry into the circumstances in which a portion of the Haldia-Barauni Pipeline was laid it now seems wrongly in the Bengal Coal field area".
- 8.8. The Committee were also informed that Shri Rau, Chief Vigilance Commissioner retired "on the 23rd August, 1968" and again after retirement he was appointed to carry on that investigation "in his individual capacity".
- 8.9. The Committee enquired as to who re-appointed Shri Rau after retirement. In a written reply, the Ministry informed the Committee that "Shri N. S. Rau's agreement to complete the inquiry, in his personal capacity, into certain matters connected with the laying of the Haldia-Barauni Pipeline through the coalfields of West Bengal even after having laid down his office as Chief Vigilance Commissioner on 23rd August, 1968 was examined by the then Secretary in consultation with the then Minister."

The Committee has taken note of the reply given by Minister to S. Q. No. 6829 on 20.4.1970 in Lok Sabha on this subject, which is as follows:—

"(d) Minister's written Order on the date on which extension was granted is not available in our records. Subsequently, however, the then Minister of Petroleum & Chemicals, has given in writing that the extension to Shri Rau was granted after taking his prior approval."

8.10. The Committee asked the Special Secretary of the Ministry to read out the letter asking Shri Rau to continue the investigation on retirement in his personal capacity. The Special Secretary read out the following letter, dated the 20th August, 1968 from the then Secretary. Shri Navak to Shri Rau:—

"Dear Shri Rau:

The inquiry into certain matters connected with the laying of Haldia-Barauni pipeline through the coal-fields in West Bengal was entrusted to you last year in your capacity as the Central Vigilance Commissioner. We understand that while the inquiry is nearly complete and that it may take only a few weeks more for you to furnish your report, you are due to lay down your present office on the 23rd August, 1968. You have orally offered to continue and complete the work thereafter in an honorary capacity. I write to say that Government thankfully accepts your offer. Any secretarial or other assistance that you may need from Government hereafter will be readily made available."

8.11. The Special Secretary also read out the letter dated 21|22 August, 1968 from Shri Rau in reply to the letter of the Secretary of the Ministry.

"Dear Shri Nayak:

When I had the pleasure of meeting you today, I mentioned to you that I had received your letter of yesterday and that I would like to mention one or two things which would bring what is stated in the letter in conformity with what I had in mind. It is stated in that letter that I had orally offered to continue to work. What I had indicated in the course of my earlier talk we had was that since I had not been able to complete my work though it had progressed substantially, I should be glad to complete the work in my individual capacity even after I laid down my office as Central Vigilance Commissioner if Govt. wanted me to do so. It would, therefore, be appropriate to say that I agree to the Government's request that I should continue and complete the work.

As regards the stage of the inquiry, it is stated in the letter that you understand that the inquiry is nearly complete and that it would take only a few weeks more to furnish the report. I would like to say that a substantial part of the inquiry has been completed and I also think that the remaining part of the inquiry should not take a long

time. It would, in the very nature of things, be very difficult to say what time it will take, though, of course, I would like to complete the work as early as possible. In this connection, I may also reiterate that after I lay down my office on the 23rd instant, I would not be able to take up the work for about a month since I have to attend to some things which need immediate attention and which I had planned to attend to on the basis that I will have no commitments after I laid down my present office. You agreed that the clarifications mentioned above were in order."

On 23rd August, 1968 Shri P. R. Nayak, Secretary, Ministry of Petroleum & Chemicals wrote to Shri N. S. Rau as follows:—

- "I have received your D.O. letter No. 58|CVC|R|68 dated the 21|22 August, 1968 and write to confirm that I am in agreement with the position as explained by you."
- 8.12. At the time of evidence (3.9.69) on enquiry from the Committee, the Joint Secretary of the Ministry stated:
 - "I have been in direct contact with Mr. Justice Rau. I met him during the Budget Session of 1969. Thereafter, he had been to Bangalore because he was not well. He came back around the day the last session of Parliament was to commence, i.e. 20th July. I contacted him again. I contacted him on last Sunday again, i.e. on the 31st August. There is one point which I am unable to say, because he has not disclosed to me, as to what has been delaying it. But I think it is this as he indicated to me has made certain inquiries from one of the two foreign experts. With them, I suppose, some point has been hanging fire for sometime. His latest indication to me was that, in about a month's time, he should be able to submit the report."
- 8.13. In a written reply to a query it was stated that it was not considered necessary by the Ministry of Petroleum and Chemicals to consult the Ministry of Home Affairs on the initial appointment of Shri N. S. Rau, to enquire into matters relating to the HBK pipeline. Approval of the Prime Minister had already been obtained on his original appointment. It was added "The report to be submitted by Shri N. S. Rau would have the same force as any other report submitted under either the Commissions of Inquiry Act or by Departmental Inquiring Officer or under Arbitration Act."

8.14. In reply to a question in Lok Sabha on 20th April, 1970 it has been stated that following expenditure has been incurred on the Commission of Inquiry upto 28th February, 1970:—

		.,	· ·			
					R	ı .
*Travelling expenses .			•	•	33,750	95
Board and lodging expenses			•	•	11,778.9	1
Telephone charges .			•	•	1,589 · 4	15
Miscellaneous expenses.	•	•	•		248 · 1	2
Honorarium to his former I	PS	•		•	4,500.0	00
Staff car (expenses on petro	ol alo	ne)			5,337.0	0
	T					_
		OTAL	•	•	57,204 · 4	5

"In addition, it is also proposed to grant an honorarium of R= 7,500 to Prof. K. V. Subrahmanyam of Osmania University for assisting Shri Rau on technical matters."

It has also been stated that no expenditure was incurred on the Commission of Inqury pror to the retrement of Shri N. S. Rao.

8.15. The Committee find that when the proposal for diverting the Pipeline from the coal bearing areas for about a total length of about 93 kms, at a total cost of Rs. 195 lakhs was sent to the Ministry of Finance for their approval and concurrence, the then Deputy Prime Minister and the Finance Minister, while approving the scheme of diversion on 6th May, 1967 remarked that "this appears to be a very bad case and had led to a wasteful expenditure of nearly Rs. 2 crores and suggested an enquiry in the matter" with a view to fixing responsibility on the officials concerned at all levels both in the Pipelines Division and in the Ministry". As a result the matter was referred to the Chief Vigilance Commissioner Shri N. S. Rau on 30th June, 1967, for investigation. The appointment was approved by the Prime Minister. Although it was expected that the report would be submitted in 3 or 4 months time the report was actually submitted as late as on 16th April, 1970. Shri Rau retired as CVC on 23rd August, 1968, before submitting the report on HBK Pipeline. Before his retirement, however, the Secretary of the Ministry had discussions with him and he was requested to continue the investigation in his personal capacity even after his retirement as Vigilance Commissioner (the letter dated 20th August, 1968 from Shri Nayak to Shri Rau and the letter dated 21/22nd August, 1968 from Shri Rau to Shri Nayak reproduced at (Paras 8.10 and 8.11 of this report may be referred.)

8.16. The Committee made enquiries as to how Shri Rau was asked to carry on the investigation in his personal capacity on his

^{*}At the time of factual verification, the Ministry stated that before the retirement of Shri Ran. Rs. 2809:04 were incurred by the I. O. C. by way of T.A. and incidental incidental of Shri Rau and staff.

retirement as Vigilance Commissioner and at what level the decision was taken. The Ministry have given a written note that the question of Shri Rau's continuing to do the investigation was examined by the then Secretary in consultation with the then Minister and after prior approval of the Minister, Shri Rao was advised to continue the investigation.

The Committee have taken note of the reply given by the Minister in the Lok Sabha on 20th April, 1970 in which it has been stated:

"Minister's written order on the date on which extension was granted is not available in our records. Subsequently however, the then Minister of Petroleum and Chemicals, has given in writing that the extension to Shri Rau was granted after taking his prior approval."

The Government has given no explanation as to why the work was not allowed to be done by Shri Rau's successor as CVC. The Committee are surprised that such an important appointment was made by the Secretary by taking only verbal orders of the Minister and only subsequently the written orders of the Minister were obtained. It is a fit case to be enquired into as to on what dates the subsequent orders were obtained because the Committee have noted that the Ministry failed to produce this paper before the Committee at the time of evidence when they wanted the Ministry to produce any written evidence available with them. The Committee were told that the relevant file was with the CVC and hence they could not produce it.

8.17. The Committee are distressed with the manner in which the then Secretary to the Ministry of Petroleum and Chemicals was allowed to play on his own a crucial role in meeting and persuading Shri Rau three days before his retirement to continue the investigation in his personal capacity even after retirement. It is pertinent to recall that one of the subjects of enquiry was whether "any of the officials concerned with this matter in the Ministry of the Government of India and the IRL/IOC" was "prima facie callous or negligent in the discharge of their responsibilities" and what action if any, should be taken against them. As already pointed out earlier, the post of Managing Director of Indian Refineries Ltd. at the relevant time pertaining to the enquiry was occupied by none other than the person who was then heading the Ministry of Petroleum and Chemicals as Secretary. In the circumstances, it would have evidently been more appropriate if the entire question of referring the issues raised by the then Deputy Prime Minister and Finance Minister for investigation had been entrusted by Government to the Cabinet Secretariat and necessary action taken in the matter by the Cabinet Secretary in consultation with the Minister concerned and the Prime Minister whose approval had originally been

taken to entrust the enquiry to the Central Vigilance Commission. The Committee cannot resist the feeling that in persuading Shri Rau to continue with the enquiry even after retirement in his personal capacity in circumstances which are not free from doubt cannot be expected to settle the matter conclusively. The Committee feel compelled to record their fear that the whole investigation has got vitiated in the circumstances and the objective underlying it has been defeated.

- 8.18. The Committee feel that the work of the investigation ought to have been done by the CVC and not by Shri Rau in his individual capacity. The Committee have also noted with great regret that this enquiry has been allowed to be dragged on for a number of years. Although it was stated to the Committee that the work was being done in an honorary capacity the Committee find that the enquiry has already cost the exchequer an amount of Rs. 57,000 upto 28th February 1970+Rs. 7,500 to be paid as honorarium to a Professor of Osmania University. The Committee fail to understand that when the investigation was being done by the CVC how it was withdrawn with the retirement of Shri Rau from the post of CVC. The Government has not given explanation as to why the work was not allowed to be done by Shri Rau's successor as CVC.
- 8.19. The Committee also made enquiries as to what would be the status and force of the report submitted by Mr. Rau in his personal capacity. The Secretary in his written note has stated that "the Report would have the same force as any other report submitted under either the Commissions of Enquiry Act or by Departmental Inquiring Officer or under Arbitration Act." The Committee do not agree with this view of the Ministry. In the view of the Committee the report submitted by Shri Rau in his personal capacity would not carry convictions nor will command the respect which a report of this nature could do when submitted by CYC. In view of the fact that Shri Rau's re-appointment was made in a very suspicious manner, the Committee further feel that a report Submitted by Shri Rau in his personal capacity, is not worth considering. The Committee would, however, also suggest that enough information and evidence are available on the basis of which the Government should proceed departmentally as the rules may permit under the Conduct Rules to take suitable action in the matter.

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IX

CONCLUSION

The Committee have commented in Chapters II and III in detail on the induction of Bechtels in the Pipeline Projects on unfounded grounds which have led to several complications. They are rather intrigued by the manner in which Bechtels were first introduced into the Pipeline Project by the then Managing Director of IRL on three grounds, viz. that they worked in the area in 1955, that they would prepare the Project Report in about 4 to 6 weeks, and finally that they might be able to persuade the World Bank or other agencies in the USA in the question of financing the foreign exchange component of the Project. None of these considerations can hold the ground as Bechtels had worked in the area 6 years earlier from the time in question; they completed the Report not in 4 to 6 weeks but in 11 weeks and in actual fact, the Corporation Government decided not to call for global tenders, and, therefore, the question of taking the assistance of Bechtels for persuading the world Bank for financing the foreign exchange component of the Project did not arise. The Committee cannot but take note of the grave failure of the IRL Government to nip the mischief in the bud.

- 9.2. The Committee are even more puzzled by the decision of IRL|Government to appoint Bechtels as design engineers and overall supervisers for Gauhati-Siliguri pipeline and pay Bechtels as much as Rs. 51.26 lakhs in rupees and 2.86 lakhs of Dollars (Rs. 13.63 lakhs), including an income-tax liability to the tune of Rs. 22.48 lakhs. The Committee have also showed how the payment made to Bechtels for their services works out to 10.81 per cent of the cost of project as compared to 7 per cent which are reported to have been paid for Naharkatiya-Barauni pipeline which was executed about the same time.
- 9.3. The Committee find that the Managing Director of IRL was also primarily responsible for bringing Bechtels into Haldia-Barauni-Kanpur pipeline project on the ground that Bechtel Corporation could bring about "modifications and simplications in the ENI design for the Project without sacrificing safety and technical consideration so as to yield sufficient economies in Project cost." Bechtels thus got induced into the HBK pipeline project as design monitors and project managers at a colossal charge of about 87 lakhs. Bechtels managed to clear off the scene by 30th June, 1965, by contriving an agreement which made payments to them time bound without relating it to the actual progres of work. The result

was that Bechtels vanished from the scene nearly a year before the completion and commissioning of the Project. They also managed to get payments with retrospective effect on the ground that "the work done—payment made," but the same hypothesis was not stretched by Government to ensure that payment was made to Bechtels only after the work was completed. The Committee cannot help the conclusion that the IRL showed more concern for Bechtels' interests than for the Project.

- 9.4. Bechtels played a crucial role in the discussions at Milan in July, 1963, which lead to the conclusion of faulty agreement with Snams for construction of the pipeline with capacity of even less than 2 million tonnes against the intended capacity of 3 million tonnes.
- 9.5. It is also on record how Bechtels changed their stand about alignment of the pipeline through the coal-field area after the pipeline had actually been laid. The Committee see no reason why Bechtels could not have referred the matter earlier say in 1963 instead of 1965 to the San Francisco office when the Indian mining consultants were unanimously of the view that the pipeline should not be laid in the coal bearing area, and why they could not suggest examination of the coal fields by an Indian expert earlier than 1965. The net result is that besides the hazards to which the pipeline has been unnecessarily exposed by laying it in the coal area, it would cost nearly Rs. 2 crores to re-align the pipeline to avoid the coal fields.
- 9.6. As regards the claim that the introduction of Bechtels would result in economy, the Committee would like to recall the considered views of the Director-in-charge (Pipelines), IOC, that the economy achieved was more illusory than real, as the facilities and capacity were considerably reduced without commensurate reduction in cost.
- 9.7 The dealings of Bechtels were critically reviewed by the Board of Directors of IOC at their meeting held on 26th March 1969, and they recorded inter alia—
 - "Looking into the dealings and records of M s Bechtels, the Board decided that the Corporation will not have any dealings in future with the party."
- 9.8. The Committee need hardly point out that the Resolution of the Board of Directors of IOC is conclusive on the subject and underlines the need for a thorough investigations by Government to determine the manner and the reasons for which M|s Bechtels were brought on to the scene, first for Gauhati-Siliguri pipeline project and later for HBK project and paid over Rs. 1.5 crores with hardly any commensurate benefit to the Project. In fact, but for

their inept technical advice at crucial stages the history of the project of HBK pipeline may well have been different. The Committee would like Government to pursue the matter to its logical conclusion and take up with all those concerned with the introduction of this party to the Pipeline projects and the undue favours which were shown to them at every stages evidenced by the unusual provisions of the agreements. The Committee cannot help pointing out that the then Managing Director, IRL, who was signing the agreement on behalf of IRL showed more concern for the interests of the Bechtels than for the public money he was entrusted with.

Non-Calling of Global Tenders

9.9 The Committee have not been able to appreciate why Indian Refineries Ltd. Government did not call for global tenders for execution of Gauhati-Siliguri Pipeline and Haldia-Barauni-Kanpur Pipeline, especially when the ENI credit, which was ultimately availed of for the project, cantained a specific provision to the effect that IRL could advertise and invite global tenders". It is on record that there were as many as 8 other foreign companies of international standing, two each from USA, UK. and France and one each from West Germany and Japan, who were evincing keen interest in execution of the project and were also willing to extend credit terms to meet the foreign exchange component of the project on terms and conditions which were not less favourable than ENI credit.

9.10. While the Committee appreciate that SNAM-SAIPEM had the experience and knowledge of Indian conditions, it would not have been unreasonable to expect that SNAM-SAIPEM would have offered even more competitive rates to gain the new contract in the face of keen competition by firms of national or international standing, who were openly evincing keen interest in the work. The Committee need hardly point out that ENI group of companies had already their machinery, equipment and men in the country for execution of the Naharkatya-Barauni crude pipeline and it was obviously in their interest to gain further pipeline contracts. The floating of global tenders would have had the additional merit of making the companies compete amongest themselves to construct a pipeline in keeping with the latest technological developments and experience over the world. It is also not illogical to believe that the details of these quotations would have enabled IBL Government to make a comparative study and decide about the optimum design and pumping capacity for ensuring for achieving the prescribed throughput. The importance of this aspect cannot be overstressed for it has been found that Haldia-Barauni Pipeline, which is of strategic importance, has been found to be of 1.5 million tonnes capacity only as compared to the original intention of having a 3million ton capacity pipeline.

- 9.11. The Committee are of the considered view that had global tenders been invited, nothing would have been lost, while there is every reason to believe that IRL would have considerably gained by inducing the firms to give most competitive offers in respect of cost, design and accommodation for foreign exchange component of the project.
- 9.12. Another aspect, which intrigues the Committee, is the reversal in the stand of the Managing Director that the contract should be given on exclusive basis to SNAM, when only a few weeks earlier he is on record to the effect that global tenders should be floated. The Committee would like Government to fully investigate the circumstances under which the Indian Refineries Ltd. and Government allowed themselves to be persuaded to hand over the construction contract to SNAM-SAIPEM exclusively without putting it to sure and paractical test of global tenders.
- 9.13. Another aspect which has greatly worried the Committee is the halting and somewhat contradictory manner in which Government IOC have approached the probe into the affairs of the pipelines inspite of the fact that the matter has been agitated on the floor of the House through questions, including a Short Notice Question on 1st April, 1970. It is on record that the then Deputy Prime Minister and Finance Minister had given orders as early as May, 1967 that a thorough investigation should be held into the wasteful expenditure which would be incurred on the project and that responsibility should be fixed on the officials concerned at all levels in the Pipeline Division and in the Ministry. It is pertinent to recall how the appointment of the Central Vigilance Commissioner to hold the inquiry, the terms of his reference and finally entrusting Shri Rau even after his retirement as Chief Vigilance Commissioner with the task of inquiry, was allowed to be handled by an officer whose conduct, while holding carlier the appointment of Managing Director of Indian Refineries Ltd., was in question. It would evidently have been more appropriate if the entire puestion of referring the issues raised by the then Deputy Prime Minister and Finance Minister for investigation had been entrusted by Government the Cabinet Secretariat and necessary action taken in the matter by the Cabinet Secretary in consultation with the Minister concerned and the Prime Minister's approval had been taken to entrust the inquiry to the Central Vigilance Commissioner. If these elementary precautions had been taken, the Committee would not have been compelled to record their fear that the whole investigation done so far has got vitiated in the circumstances and the objective underlying it has been defeated.
- 9.14. Similarly, in the case of inquiries held by the IOC regarding shortfall in the capacity of the pipeline as compared to the intended capacity or design capacity, the matter has been investigated by

a Sub-committee of the Directors of IOC, which had on it a number of officials who had earlier been connected actively with the Department of Mines and Fuel at relevant time.

The Committee have also pointed out how issues have been posed but the problem has not been faced squarely.

- 9.15. The Committee also take a very serious view of the fact that the important records of IRL, particularly Enclosure 18 of Part II—'Job Description' etc.—and papers indicating the stages of processing of contract documents at the various levels of management are not available and are reported to be missing. The loss of such vital documents cannot be treated with complacency. What amazes the Committee most it that "no record was kept of these discussions at various stages" which led to the "finalisation of contractual matters". The Committee cannot accept the plea of dealing with such important matters on "war footing", as it has neither given results in the matter of expeditious completion of Haldia-Barauni-Kanpur Pipeline (it was delayed in commissioning by more than 18 months), nor achieved the objective underlying its construction in as much as the capacity established is far below the 3 million tonnes capacity of Barauni refinery.
- 9.16. The Committee have also pointed out the casual manner in which an important communication from Bechtels which clearly mentioned the design capacity of Haldia-Barauni-Pipeline as 1.9 million tonnes per year did not take the then General Manager Managing Director of IRL take a firm and unequivocal stand on this attrition of the capacity of the pipeline.
- 9.17. It is also a matter for concern how an agreement with Snams for Haldia-Barauni-Kanpur project was executed on 31st July, 1963, the very day on which sanction of the Government for it was received. The expetition in dealing with the matter would have been commendable but for the fact that the agreement suffers from many defects, including absence of any provision for penalty for any lapses by Snam-Saipem.
- 9.18. It is also on record that the amendment effected in July, 1964 to the original agreement of July, 1963 of I.R.L. with Snams had in all probability resulted in increasing the liability of IOC for civil works without any commensurate benefit.
- 9.19. It is also on record that the Managing Director was acting on his own in his dealings with Snams as well as Bechtels in vital matters concerning the capacity of the pipeline, hypassing thus the authority both of the Board of Directors and Government. The Board of IOC have also gone on record to the effect, at the meeting held on 3rd February, 1968, that: "Out of the report and the discussions thereon, it emerged that the Board had been bypassed in the matter. The Board was very emphatic that the matters of such importance should necessarily be reported to the Board at the earliest

possible opportunity. The Board also wanted to place on record that in future all such important matters which entail in itself any project of capital nature involving its performance, its capacity, design or of financial implications, should be brought before the Board for its notice and appropriate action. The Board's decision in the above matter also applies to any significant amendments which are of the above nature to any existing contracts or project."

- 9.20. The Committee feel that in the interest of ensuring that the high officers entrusted with the responsibility of managing public undertakings and of carrying out delicate negotiations with foreign companies discharge their responsibilities diligently, honestly and in the best public interest, the above-mentioned lapses should be investigated fully without fear and favour and all those found at fault awarded deterrent punishment.
- The Committee find that estimates of the Gauhati-Siliguri pipeline have escalated to the extent of 25 per cent during the course of three revisions, whereas in the case of Haldia-Barauni-Kanpur pipeline, the estimates have escalated to the extent of 15 per cent in course of two revisions. The final estimates of Haldia-Barauni pipeline are still to be prepared. Such frequent escalations of estimates deserve, in the opinion of the Committee, the prior approval of the appropriate authority. The Committee, therefore, deprecate such unauthorised revision of estimates and commend that appropriate authorities should have been consulted and their concurrence obtained before going ahead in excess of their estimates. Revision of estimates is frequent in a large number of Undertakings. Committee notice that the present system of control on Public Undertakings envisages a three tier system of financial control viz., (a) control of the Board of Directors; (b) Control of the Government; and (c) control of Parliament. As regards (a), the Committee find that the Public Undertakings can spend up to 10 per cent of the sanctioned amount estimates without the approval of Government. In regard to (b) for expenditure beyond sanctioned amount exceeding 10 per cent, the Government approval becomes unavoidable. As regards (c), the Parliament approval has to be taken on the entire scheme followed by approval of the every year. The Committee strongly recommend that all Undertakings in future should obey the prescribed financial control at the stages indicated at (a), (b) and (c) above. The Committee further recommend that all cases of Project estimates Revised estimates should be given effect to only after Parliament has approved of the total capital expenditure on the entire Project or the revision of the project, as the case may be. Demand for grants of concerned Ministries should make specific provisions regarding the capital outlay to be made for the entire period of construction of the Project initially and annual approval of the Parliament should be taken of the amount sanctioned by l'arliament on principle at the project stage.

- 9.22. Another matter, which has greatly exercised the mind of the Committee, is lack of record of negotiations carried out by the Managing Director of the Indian Refinerics Ltd. with the foreign companies leading to the conclusion of the agreement. The Committee have urged that Government should issue standing instructions in consultation with Ministry of Finance and the Comptroller and Auditor-General of India about the manner in which the contemporaneous record of such negotiations should be kept for future reference and use of the Board of Management Government to enable them to appreciate nuances of the various clauses of an agreement and satisfy themselves that maximum advantage has been secured for the public undertaking and every care has been exercised to safeguard the public interest.
- 9.23. Yet another aspect which has greatly worried the Committee is the abject abdiction of the right by the Management to oversee the design with particular reference to such vital matters as capacity and alignment to foreign companies. This dependence of the advice of foreign companies went to the extent of rejecting out of hand the expert advice of Indian engineers with the result that costly blunders were committed.
- 9.24. The Committee are distressed to find, after a careful examination of all the papers and other evidence on record that there have been serious lapses and dereliction of duty by the then Officers of IRL and the Ministry in the discharge of their responsibilities in executing the Pipeline Project. The Committee have pointed out several instances where the Managing Director exceeded the authority available to him; they have noted with regret that the Board of Management and the Ministry were not vigilant enough to check firmly and in time this excessive use of authority by him.
- 9.25. The Committee also feel compelled to record their feeling that instead of holding the Officers responsible for their lapses, there appears to have been a persistent effort to slur over their dereliction of duty and not to fix the repsonsibility though copious facts to substantiate such lapses have come on record. The Committee would, therefore, like Government to take immediate steps to bring to book the guilty officers on the basis of evidence that is already available. The least that could be done is to proceed departmentally without delay against the Officers concerned under the relevant Govt. Servants Conduct Rules. The Committee feel that Government, in the larger interests of the public sector, should not allow a feeling to go round that officers could commit such grave lapses and indulge in dereliction of duty with impunity and go unpunished.

New Delhi;

M. B. RAMA.

April 29, 1970

Chairman

Vaisakha 9, 1892 (S)

Committee on Public Undertakings.

APPENDIX I

(Vide Para 3.25)

Names of the parties who were keen to get the pipeline Contract together with short note on the capacity of each one of them, their experience, etc.

Following firms had expressed interest in tendering for execution of HBK Pipeline Project.

(i) William Bros. (ii) Buchtel Corporation	•			•	•	}U.S.A.
(iii) En cpose (iv) Societies' Parisiene	•	•	•	•		France
(v) Motherwell . (vi) Constn. John Brown	٠,		:	:	•	} U. K .
(vii) SN \M (viii) M nncsmann	•	•	•	•	•	} Italy West Germany

The information regarding the capacity and experience of these firms is given below:—

(i) William Brothers, USA.

M/s. William Brothers are one of the reputed pipeline construction companies of USA having their home office at Tulsa, Okalahoma. They have got many overseas offices. They have constructed pipelines in Oman, Libya and other parts of the world.

(ii) Bechtel Corporation

They have world-wide experience of planning, engineering and constructing petroleum refineries, preparing feasibility studies, designing the construction of cros-country pipelines. They undertake construction, supervision and engineering management of large scale projects.

(iii) Entrepose—France.

It is a French Company of repute, particularly engaged in the construction of petroleum pipelines, Gas Feeders, cable conduits, coal slurry transportation, aerial pipeline bridges, submerged river crossings, undersea pipelines, etc.

(iv) Societie's Parisienne

It is a subsidiary of the well-known company, Societie Francaise Des Petroles BP of France which are known as refiners, transporters and dealers in mineral oils of all kinds, with sales in France and its colonies and protectorates.

(v) Motherwell-U.K.

This company is mainly engaged in petroleum field in the Middle East. It undertakes construction of storage tanks, pressure vessels and Pipelines, etc. They have constructed 40" crude pipeline in Saudi Arabia, 16" line in Nigeria and at various other places.

(vi) Construction John Brown-U.K.

This is one of the leading pipeline firms of Britain. It undertakes complete designing, engineering consultancy, pipe laying welding supervision, etc. It has completed over 6400 KMs of pipelines the world over.

(vii) E.N.I.—Italy

E.N.I. is a national undertaking of the Government of Italy. One of its subsidiaries Snam undertakes pipeline design and construction work. It is one of the highly rated pipeline design and construction firms in the international market. It undertakes execution of all kinds of petroleum pipelines, Refineries, Petro-chemicals plants, vil drilling and thermo-electric power plants, etc. It has constructed Italian Gas Pipeline Net work, Oil Pipeline from Genoa to Lacchirella, etc. in Italy, Argentina, Brazil, Pakistan, Iran, Iraq and U.A.R. It also collaborated with Mannesmann of Germany in the construction of OIL's pipeline from Nahorkatiya to Barauni.

(viii) Mannesmann—West Germany.

It is one of the reputed construction firms of Germany having done work in many parts of the world. It undertakes complete work of designing, supplying and laying of pipelines, storage tanks tanker terminals, compressors and Gas Engines, etc. It has constructed Oil India's 14" crude pipeline from Naharkatiya to Barauni in collaboration with Snam of Italy.

APPENDIX II

(Vide para 3.43)

Note of Dissent from Shri Arun Roy Choudhary, Director

The question of examining internal administrative lapses in the matter of occurrence of shortfall in the pumping capacity of Haldia-Barauni Pipeline Section in the Haldia-Barauni-Kanpur Pipeline system and increasing the pumping capacity at least to two million tonnes per year was entrusted to a sub-Committee of Directors in the IOC Board's Resolutions dated 27th November, 1968 against Agenda Items No. P/33 and P/45 respectively. The report of the sub-Committee was considered briefly on 26th March, 1969 at Barauni.

In the findings of the sub-Committee of S/Shri N. N. Kashyap (Chairman), Major General Sardanand Singh (Managing Director, Refineries and Pipelines), M. V. Rajwade (Joint Secretary, Ministry of Petro-Chemicals) and R. S. Gupta (Joint Secretary, Ministry of Finance), it was inter alia mentioned that important records were missing and due care appeared not to have been taken in scrutinising, editing and assembling the contractual documents and that the papers indicating the stages of processing the contract documents by the various levels of management were not available. At this stage, a suggestion was made by S/Shri K. L. N. Prasad, Petachi and myself that the matter be referred to CBI for inquiry. The Board, however, agreed to the Chairman's suggestion that the Manager Director (Refineries) may look into the matter further and report his findings to the Board within a month.

On 7th May, 1969 at the Board meeting held in Delhi, while confirming the minutes of the meeting held on 26th March, 1969 when it was pointed out by me that the relevant minutes on the shortfall in the pumping capacity was not drawn up correctly and the detailed discussion on the report of the sub-committee was yet to be held, it was decided to discuss the item afresh. At the 46th meeting of the Board held on 4th June, 1969 the item was decided to be postponed for consideration in the next Board meeting. Eventually, on 2nd July, 1969 the item was taken up for discussion under Agenda Item No. P/23 when all the Directors were present.

Two aspects of the matter, viz., pumping capacity and loss of papers were discussed at length. During the discussion on pumping capacity, I felt it necessary to trace the background of a very complicated subject and quoted the relevant minute, under Agenda Item

No. P/45 of the Board meeting held on 3rd February, 1968 at Hyderabad.

For the purposes of record and reference it is reproduced below:

".....A very lengthy discussion took place on the sub-Committee's report. The report was supplemented by the verbal information provided to the Board by Chairman Shri M. V. Rajwade and Shri S. K. Guha. The Chairman pointed out that irrespective of our claim on M/s. Snam Ltd., the pumping capacity of the pipeline has to be brought to 2 million tonnes at the earliest possible opportunity. He also stated that M/s. Snam did not accept the liability for this work. The Board decided that the case may continue to be studied in all its aspects and suitable action taken for bringing the capacity to 2 million tonnes; the cost of which may be tried to be recovered from M/s. Snam to the extent possible depending on our case and circumstances."

While discussing this item on 2nd July, 1969, Chairman's attention was drawn to his own observations as recorded above, that the Board stood committed to raise the pumping capacity to at least 2 million tonnes at the earliest possible opportunity. It was also pointed out that the recovery of the sum of Rs. 14,62,000 and \$ 1,75,000 from M/s. Snam having been effected already to meet the estimated cost of raising the capacity to 2 million tonnes, there is no reason why an accepted Board decision should be held over.

The view expressed by MD(R&P) which was supported by the Chairman that with the Haldia Refinery coming up by 1972, the necessity of having a 3 M \mid T crude pumping capacity in the Haldia-Barauni Pipeline section as originally envisaged needed a fresh review is not acceptable to me for the following reasons:—

(a) the Emergency concept and strategic reasons which guided the Government of India's decision, as conveyed by Shri P. R. Nayak, the then Managing Director of the erstwhile Indian Refineries Limited to the Board of Directors of IRL at the meeting held on 28th January, 1963 will be seriously compromised and may become a security risk involving defence services, vital public utilities important industrial projects and general consumers. In the event of non-availability of crude oil from Assam oil fields, the Barauni Refinery may have to be closed down unless ininterrupted supply of imported crude through the Haldia-Barauni Pipeline is ensured.

(b) the question of augmenting the existing shortfall is supposed to be under examination by a committee as reported by the Managing Director (R&P) in paragraph 8 of the Agenda Item No. P/62 discussed in the IOC Board meeting held on 24th August, 1968. The Board's directive of 3rd February, 1963 on pumping capacity is quite clear. Government's view in this matter, as communicated by Chairman on 3rd February, 1968 is equally clear. This featured repeatedly in "action taken notes" of the Agenda papers. For ready reference it is reproduced below:

Item No. P/45 of 3rd February, 1968.

SUBJECT: Pumping capacity of Haldia-Barauni Pipelines and payment of outstanding claims of Snam.

Decision taken by the Board: (i) In regard to the capacity to be raised from 2 to 3 million tonnes a view was expressed that the Government had already desired the capacity to be 3 million tonnes and as such action for it lay with the Corporation. The Board, therefore, directed that the matter may be considered by the Pipeline Division and a note submitted to the Board as early as possible.

The course of action suggested by MD (R&P) viz., a fresh feasibility study is totally unacceptable to me. Reference of this subject to a so-called study group sometime in May 1968 was quite outside the terms of reference before the Sub-Committee of Directors inquiring into the question of shortfall. To the best of my knowledge this study group probably met only once, about a year ago. Even before the fruits of their exercise is made available to the Board, creation of yet another study group with a fresh deadline as envisaged on 2nd July, 1969 cannot be rationally explained. I do not wish to be a party to what appears to be a game of scuttle involving national security and a defence-oriented project.

So far as internal administrative lapses in the matter of shortfall in the pumping capacity is concerned, I beg to differ with the consensus of the Board that "no useful purpose will be served in pursuing the matter further". The argument advanced by MD(R&P) in the relevant agenda note that "the processing of Haldia-Barauni-Kanpur pipeline project was done on a war footing" and "the finalisation of contractual documents was mostly done through discussions negotiations across the table" is not acceptable to me.

Subsequent to the Board meeting held on 2nd July, 1969, I have come across a document titled "internal Audit Report on Snam's II-B-K contract" by L. S. Subramaniam, Internal Audit Officer in the Pipelines Section. Should this be a genuine document—and I see

no apparent reason to doubt its authenticity—the issue of pumping capacity, the induction of Snam's and Bechtels and views expressed by the Government from time to time on the H-B-K line capacity would emerge in a clearer perspective. This document refers to the existence of several files, particularly under the heading S-II Construction—Volumes 1 to 5 which form the basis of the internal audit report.

In paragraph 10 of this report, what appears to be the Union Cabinet decision on pipeline capacity, has been reproduced and this mentions 3 million tonnes per annum crude pumping capacity to feed the Barauni refinery "should this at any time be found necessary or to move products".

I deeply regret to have to record in this note of dissent a serious ommission in the Agenda note of Item P|20 discussed on 2nd July, 1969. In para 3 of this note the Government of India's decision on pumping capacity has been quoted. Sub-paragraph (c) of this note, I find, is silent on the 3 million tonnes capacity while the audit report has recorded it clearly. MD(R&P) may throw further light on this phenomenon.

During the Board meeting, on 2nd July, 1969, I had drawn the attention of the Chairman and the Board to the intimate link between the issue of shortfall in pumping capacity and the Amendment of the main contract on H-B-K- Pipeline in July 1964. The Board, after an exhaustive discussion on this subject on 3rd February, 1965 had recorded the following minutes.

"Reference Item No. Imp 16. The Chairman presented his report vide Item No. IMP 77 relating to amendment of main contract with Saipem in July 1964—HBK Pipeline. Out of the report and the discussions thereon, it emerged that the Board had been bypassed in the matter. The Board was very emphatic that the matter of such importance should necessarily be reported to the Board at the earliest possible opportunity. The Board also wanted to place on record that in future all such important matters which entail in itself any project of capital nature involving its performance, its capacity, design or of financial implications should be brought before the Board for its notice and appropriate action. The Board's decision in the above matter also applies to any significant amendments which are of the above nature to any existing contracts or projects."

The Internal Audit Report throws further light on the subject and records the effect of the Amendment of main contract. It also makes an important observation in the concluding part of the report that "sanction of the Government does not appear to exist for the (b) the question of augmenting the existing shortfall is supposed to be under examination by a committee as reported by the Managing Director (R&P) in paragraph 8 of the Agenda Item No. P/62 discussed in the IOC Board meeting held on 24th August, 1968. The Board's directive of 3rd February, 1963 on pumping capacity is quite clear. Government's view in this matter, as communicated by Chairman on 3rd February, 1968 is equally clear. This featured repeatedly in "action taken notes" of the Agenda papers. For ready reference it is reproduced below:

Item No. P/45 of 3rd February, 1968.

SUBJECT: Pumping capacity of Haldia-Barauni Pipelines and payment of outstanding claims of Snam.

Decision taken by the Board: (i) In regard to the capacity to be raised from 2 to 3 million tonnes a view was expressed that the Government had already desired the capacity to be 3 million tonnes and as such action for it lay with the Corporation. The Board, therefore, directed that the matter may be considered by the Pipeline Division and a note submitted to the Board as early as possible.

The course of action suggested by MD(R&P) viz., a fresh feasibility study is totally unacceptable to me. Reference of this subject to a so-called study group sometime in May 1968 was quite outside the terms of reference before the Sub-Committee of Directors inquiring into the question of shortfall. To the best of my knowledge this study group probably met only once, about a year ago. Even before the fruits of their exercise is made available to the Board, creation of yet another study group with a fresh deadline as envisaged on 2nd July, 1969 cannot be rationally explained. I do not wish to be a party to what appears to be a game of scuttle involving national security and a defence-oriented project.

So far as internal administrative lapses in the matter of shortfall in the pumping capacity is concerned, I beg to differ with the consensus of the Board that "no useful purpose will be served in pursuing the matter further". The argument advanced by MD(R&P) in the relevant agenda note that "the processing of Haldia-Barauni-Kanpur pipeline project was done on a war footing" and "the finalisation of contractual documents was mostly done through discussions negotiations across the table" is not acceptable to me.

Subsequent to the Board meeting held on 2nd July, 1969, I have come across a document titled "internal Audit Report on Snam's II-B-K contract" by L. S. Subramaniam, Internal Audit Officer in the Pipelines Section. Should this be a genuine document—and I see

no apparent reason to doubt its authenticity—the issue of pumping capacity, the induction of Snam's and Bechtels and views expressed by the Government from time to time on the H-B-K line capacity would emerge in a clearer perspective. This document refers to the existence of several files, particularly under the heading S-II Construction—Volumes 1 to 5 which form the basis of the internal audit report.

In paragraph 10 of this report, what appears to be the Union Cabinet decision on pipeline capacity, has been reproduced and this mentions 3 million tonnes per annum crude pumping capacity to feed the Barauni refinery "should this at any time be found necessary or to move products".

I deeply regret to have to record in this note of dissent a serious emmission in the Agenda note of Item P|20 discussed on 2nd July, 1969. In para 3 of this note the Government of India's decision on pumping capacity has been quoted. Sub-paragraph (c) of this note, I find, is silent on the 3 million tonnes capacity while the audit report has recorded it clearly. MD(R&P) may throw further light on this phenomenon.

During the Board meeting, on 2nd July, 1969, I had drawn the attention of the Chairman and the Board to the intimate link between the issue of shortfall in pumping capacity and the Amendment of the main contract on H-B-K- Pipeline in July 1964. The Board, after an exhaustive discussion on this subject on 3rd February, 1965 had recorded the following minutes.

"Reference Item No. Imp 16. The Chairman presented his report vide Item No. IMP 77 relating to amendment of main contract with Saipem in July 1964—HBK Pipeline. Out of the report and the discussions thereon, it emerged that the Board had been bypassed in the matter. The Board was very emphatic that the matter of such importance should necessarily be reported to the Board at the earliest possible opportunity. The Board also wanted to place on record that in future all such important matters which entail in itself any project of capital nature involving its performance, its capacity, design or of financial implications should be brought before the Board for its notice and appropriate action. The Board's decision in the above matter also applies to any significant amendments which are of the above nature to any existing contracts or projects."

The Internal Audit Report throws further light on the subject and records the effect of the Amendment of main contract. It also makes an important observation in the concluding part of the report that "sanction of the Government does not appear to exist for the (a) The emergency concept and strategic reasons which guided the Govt. of India's decision, as conveyed by Sri P.R. Nayak, the then MD, IRL to the Board of Directors of IRL at the meeting held on 8-1-63 will be seriously compromised and may become a security risk involving Defence services etc.

The Sub-Committee of the Directors which met on 13-5-68 in pursuance of the Board's resolution on Item P/45 of 3-2-68 had considered this question in all details and the views expressed by them were as under:

"On examining the above documents the Sub-Committee noted that it has all along been the intention that Haldia-Barauni Pipeline should have a capacity of 2 M.T. per year initially which should be capable of expansion of 3 MT. eventually when the expansion of the Barauni Refinery was completed. This position was fully known to the Govt. of India in the Ministeries of Mines & Fuel as well as This fact was also Finance. within the knowledge of the Board when at its meeting held on 15-3-63 it decided, inter-alia, that the capacity of the Halida-Barauni section should be upto 3 M.T. when required and felt that this requirement was mainly to cater for any possible emergency. Therefore in the views of the Sub-Committee, the decision to have an initial capacity of 2 M.T. calculated and deliberate action and was within the knowledge of the Govt. of India and the Board."

In view of what has been stated above and the Board's decision that the capacity of the pipeline will ultimately have to be raised to 3 MT. in due course, it will be clear that nothing is sought to be compromised.

(b) The question of augmenting the existing shortfall is supposed to be under examination by a Committee as reported by the MD (R&P) in para 8 of the Agenda Item No. P/62 discussed in the IOC Board meeting held 24-8-68. The Boards' decision of 3-2-08 on pumping capacity is quite clear. Govt's view in this matter as communicated by Chairman on 3-2-68 is equally clear. course of action suggested by MD(R&P) viz. a fresh feasibility study is totally unacceptable to me. Reference of this subject to a so-called study group sometime in May, 1968 was quite outside the terms of reference before the Sub-Committee of Directors inquiring into the question of shortfall. To the best of my knowledge this study group probably met only once about a year ago. Even before the fruit of their experience is made available to the Board, creation of yet another study group with dealing cannot be fresh rationally explained.

Atlits meeting held on 3-2-68 the Board had, inter-alia, directed that the Pipelines Divn. should consider the question of raising the capacity from 2 MT to 3 MT and submit a note on the subject to the Board as early as possible. The cost estimates prepared by the Pipeline Engineers and placed before the Sub-Committee of the Board on 13-5-68. The Committee noted that cost estimate made by the Pipeline Engineers to make up the deficiency for achieving a throughout of 2 MT per year would be of the order of Rs. 43 lakhs of which about Rs. 30 lakhs would be in foreign exchange. This estimate is based on providing a new pump station of 300HP, a stand-by pump at each of the three existing stations and the proposed new station and about 20% increase in the pumping capacity by carrying out certain modifications in the pumping stations". Also that "a further about Rs. 2 expenditure of Crores will be necessary if the throughput of the pipeline is to be stepped upto 3 MT per annum". With these estimated expenditures, the Subconsidered Committee question whether it was necessary to make up the deficiency in the existing throughput to 2 MT per year from 2 M T to 3 M T per year and desired that a detailed assessment of the various aspects be made by a study That such an assessgroup. particularly in the ment, context now, changed absolutely necessary before deciding upon investing fair ly large amounts (part of which

- (iii) So far as internal administrative lapses in the matter of shortfall in the pumping capacity is concerned, I beg to differ with the consensus of the Board that "no useful purpose will be served in pursuing the matter further." The argument advanced by MD (R&P) in the relevant agenda note that "the processing of Haldia-Barauni-Kanpur Project Pipeline was done on a war footing" finalisation of contractual documents was mostly done thro' discussions/negotiations across table" is not acceptable to me.
- (iv) In the Internal Audit Report of the IAO, Pipelines, the existence of several files particularly under the heading S-II Construction Vol. 1 to 5 has been mentioned.
- (v) In para 10 of the Internal Audit, Report, what appears to be the Union Cabinet decision on pipeline capacity has been reproduced and this mentions 3 MT per annum crude pumping capacity to feed the Barauni Refinery "should this at any time be

in foreign exchange) for augmenting the existing capacity is stating an obvious and prudent course of action.

It is true that the study group has met only once so far. It decided to collect requisite statistical information from various sources including Defence for its examination. The collection and compilation of information has taken quite a lot of time and certain particulars are still under collection. Unless all the material required for coming to firm conclusions is available it will not be useful to have further meetings. However, vigorous efforts are being made to have the examination of the matter expedited.

The conclusion that "no useful purpose will be served in pursuing the matter further" been arrived at after carefully considering in detail all the circumstances which one is in a position at this point of time to visualise intelligently. Not only the files referred to in the Internal Audit Officer's report but scores of other available files have already been looked into. No effort has been spared in the matter of locating and examining of relevant papers.

In the report of the sub-Committee (constituted by the Board at its meeting held on 27-11-1967 — Agenda Item P/33) submitted to the Board at its meeting held on 3-2-68 (Agenda Item No. P/45) it

found necessary or to move products." I deeply regret to have to record in this note of dissent a serious omission in the Agenda note against Item P/20 discussed on 2-7-69. In page 3 of this note the Govt. of India's decision on pumping capacity has been quoted. Sub-para (c) of this note, I find is silent on the 3 MT capacity while the audit report has recorded it clearly. MD(R&P) may throw further light on this phenomenon.

was recorded in the very second para of Annexure I Part I that on the 28th Jan. '63, the Board of the IRL was informed that on a reappraisal of the oil position on account of "Emergency" Government decided that have Barauni Refinery should be expanded to a capacity of 3 MT per year and that an oil pipeline from Haldia/Calcutta to Barauni should be constructed transport of crude oil to that Refinery. What the Internal Audit had reproduced is nothing but what has been mentioned by MD, IRL, in his note submitted for the Board meeting held on 28-1-63 the details of which will be found recorded in the Sub-Committee's report submitted to the Board on 3-2-68 (Agenda P/45) mentioned above.

While the agenda item P/45 of 3-2-68 dealt with in detail the Sub-Committees report, the agenda item P/20 discussed on 2-7-69 dealt with only the internal administrative lapses. In this agenda item reference has also been drawn to the Sub-Committee's report submitted to the Board vide agenda item P/45 of 3-2-68 mentioned above.

It will thus be seen that the suggestion that facts as they are available, have not been placed before the Board from time to time is unwarranted and regrettable.

(vi) During the Board's meeting on 2-7-69 I had drawn the attention of the Chairman and the Board to intimate link between the issue of shortfall in pumping capacity and the amendIt is true that the Internal Audit Report records the effect of the amendment to the main contract This is nothing but factual information given in ment of the main contract on HBK Pipeline in July, 1964 The Internal Audit Report throws further light on the subject and records the effect of the amendment of the main contract

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(vii) Internal Audit Report makes an important observation in the concluding part of the report that "Sanction of the Govt, of India does not appear to exist for the execution of the HBK Project at a cost of approx. Rs. 26.42 crores. Sanction only exists for entrusting the work to Snam-Saipem at a cost of Rs. 11.33 crores".

the report in chronological sequences. The Board has already discussed matters relating to amendment of the main contract at its meeting held on 3-2-1968 (Agenda item P 45 refers).

2

The execution of the Project had been the subject matter of number of discussions between IRL and Govt. and the final outcome was recorded in the letter dated 6-7-63 addressed to the Secretary to the Govt. of India, Min. of Mines & Fuel by the MD, IRL. In this letter Govt's approval was sought for the following:

- (i) IRL entering into a contract with Snam in the total value of Rs. 13,43,79,001 with a foreign exchange component of Rs. 6,21,54,973 to be financed from ENI credit. 5% of the foreign exchange component is to be paid on the signing of the contract.
- (ii) The estimated project cost of Rs. 26.42 crores.

On 24th July, 1963, IRL intimated the Govt. that further reductions to the tune of Rs. 2,10,44,109 in the contract amount with Snam had been secured.

On 31st July '63 the Govt. of India, Min. of Mines & Fuel conveyed the approval of the President to the IRL entering into a contract with Snam-Saipem for Rs. 11,33,34,892. It is true that the Govt. letter

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did not specifically mention approval to the total project cost. This may, at best be deemed to be a clerical omission and is of little consequence, considering that the execution of the Project at various stages has been reported to the Govt. and their approvals to the capital cost budgets had been taken year after year.

(viii) After careful consideration I feel obliged to reiterate my submission that:

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- (i) the whole issue of shortfall in the HBK Pipeline capacity, including the question of missing records be referred to the Central Bureau of Investigation of the Govt. of India without further delay.
- All matters connected with short fall in the design capacity and the non-availability of the records etc. have already been gone into in detail. The examination has been quite thorough and adequate and it is difficult to appreciate the nature and prupose of further probe and that too by the Central Bureau of Investigations.
- (ii) effective steps be taken forth with to augment the pumping capacity to 3 MT as originally envisaged by the Govt. of India.
- As already explained it will be prudent to embark on any such project after getting competent technical assessment of the various aspects of the matter. Further action in this regard will be initiated immediately after the report of the study group is available.

Before concluding, I would like to bring to the notice of the Board a rather unusual feature connected with the Internal Audit Report, a copy of which has been appended by Shri Roy Choudhary to his Note of Dissent. It is understood that only this particular Internal Audit Report given by the Internal Audit Officer on 1st August 1967 to the then Director-in-Charge (Pipelines Division) was cyclostyled under the orders of the latter and about 40 copies made. These were kept in the personal custody of the then Private Secretary to the Director-in-Charge and the disposal of these copies is

not known. No cyclostyled copy is available at present in the Pipelines office. This phenomenon appears to be extraordinary particularly when action, if any, on the report was required to be taken in the Pipelines office by not more than one or two officers. In fact, there is no evidence to show in office files that the Director-in-Charge even marked any point observation in the Internal Audit Report to any of his officers.

New Delhi; 28th August, 1969.

S|d SARDA NAND SINGH, Managing Director (R&P).

APPENDIX IV

(Vide para 3.43)

Report of the Internal Audit Officer

Haldia-Barauni-Kanpur Pipeline Contracts

1. Contract for Establishment of Petroleum Projects in India

On 29th August 1961 an agreement was entered into between Government of India and E.N.I. (Ente Nazionale Idrocarburi) of Italy for the establishment of Petroleum Projects.

2. Barauni-Delhi & Barauni-Calcutta Products Pipeline

In their letter dated 17th October 1961, the Ministry of Steel Mines and Fuel intimated the Managing Director of the India Refineries Ltd. that the project work pertaining to Barauni-Delhi and Barauni-Calcutta Products Pipeline will be looked after by the Indian Refineries Limited.

On 6th November, 1961 in a meeting held between Dr. C. Gaspirini of E.N.I. and I.R.'s representative, the total prospective movements through the Barauni-Calcutta pipelines and off takes at various points between Calcutta and Asansol and beyond Kanpur were discussed. I.R.L. was then asked whether any definite view on the desirability of this pipeline can be expressed by them. The Managing Director in his letter dated 15th December 1961, informed Dr. C. Gaspirini that Snam Progetti will go into this matter in detail and present data and proposals on the basis of which the economic justification of the Calcutta-Barauni pipeline can be viewed and appropriate decision taken.

3. Snam Progetti's Offer for Designing

On 26th September, 1961 Snam Progetti submitted their offer for the Project Report and the tender documents for the Oil Product transmission scheme in India. It was indicated in their letter that the project report will cover the following oil product transmission pipelines:

(1) Barauni-Delhi

(2) Barauni-Asansol-Calcutta-Budge-Budge (with the possibility also of the pipeline terminating at the proposed new subsidiary port at Haldia south of Calcutta).

The major aspects to be covered in the Project Report were indicated as under:

- (i) Route plotted on 1"—4 miles survey of India maps for each of the two proposed pipelines;
- (ii) Exposition of special engineering features in respect of any portion involving major river crossings or other difficult terrain;
- (iii) Examination and recheck of the year to year expected consumption demand for each of the products at each of the offtake points that are proposed, together with the assessment of storage capacity for the efficient operation of the pipeline at each such offtake points;
- (iv) Detailed examination of the economies determining the size of the pipelines & the initial number of pumping stations recommended including the number of pumping stations that will have latter to be added to increase the throughput of the pipelines to the maximum potential of the particular size of the pipe that is recommended:
- (v) General flow sheet required in connection with size and suitable location of the pumping stations;
- (vi) Indication of the power requirement at each of the pumping stations;
- (vii) Itemised breakdown of various engineering and construction materials that will be required for the eprojects;
- (viii) Detailed estimates of likely cost of the project covering in particular the main item as the line pipe;
- (ix) Breakdown of the detailed cost estimates into rupees costs and foreign exchange costs;
- (x) Detailed analysis of the estimated annual cost of operation in the initial stage and a subsequent stage including interest charge and depreciation;
- (xi) Detailed analysis of the estimated operating cost of transportation per ton mile between the offtake points recommended;

- (xii) As assessment in broad terms of the total wagon movement that will be obviated on account of the projected pipelines being laid to enable an estimate being made of investment cost on such alternative likely to be thus saved;
- (xiii) An assessment of the requirement of technical personnel indicating minimum qualification and experience that will be required for the operation of the pipeline on their completion.

The remuneration demanded by Snam Progetti for the services was Italian Lire 40500.000 of which 21,000.000 to be paid in India in the equivalent amount of Rupees.

4. Acceptance of Snam Progetti's Offer for Project Report

The offer of Snam Progetti for the preparation of detailed Project Report etc., indicated above was accepted by the Govt. of India, Ministry of Steel, Mines and Fuel in their letter No. 24(5)61-Oil(PL) dated 12-10-1961.

5. Executive Project Report

On 20th November, 1961 an offer for the Executive Project Report report containing detailed technical specifications, working, drawings etc.) of the Pipelines Barauni-Delhi & Barauni Asansol-Calcutta was submitted by Snam Progetti and the total fee for the services was indicated as 512000,000 Italian Lire. Ordinarily, preparation of the Executive Project Report would have been taken up only after a decision was taken on the preliminary Project Report as to which of the pipelines are actually to be constructed. It was, therefore, explained to the Board of Directors in their meeting held on 12-12-1961 by the Managing Director I.R.L. that if the Executive Project Report is taken up only after a decision is taken on the Preliminary Project Report the working season of 1962-63 would be lost and it was the intention of the I.R.L. to make every effort to complete the work by July August, 1963 and it was therefore considered desirable to have the work on the Preliminary Project Report and Executive Project Report carried out simultaneously. The Board's approval was also sought for advising the Government to accept the Snam Progetti's Offer. In the circumstances explained by the Managing Director I.R.L. the Board approved of Messrs. Snam Progetti's offer with a proviso that Snam Progetti will give a rebate out of the agreed fees if they are asked, with in 30 days of the receipt of the Preliminary Report that the work on the Barauni—Calcutta line be discontinued.

6. Approval of the Government for Preparation of Executive Project Report by Snam Progetti

After the approval of the Board was obtained, the full details of the case were explained to the Government by the Managing Director I.R.L. in his D.O. letter dated 20-12-61 addressed to the Deputy Secretary, Ministry of Mines & Fuel *inter-alia* indicating as under the breakdown of the fee asked for by Snam Progetti for the 'Executive Project' Report.

			(Rs. in 1	akhs)
		Foreign Exchange	Indian Rupees	Total
Barauni-Delhi Barauni-Calcutta	•	27·10	11.90	
В	Breakdown	figures		
Section and the section of the secti	una palauri Militerar - 1 minut-min unces i illa mi		(Rs. in	lakhs)
			Foreign Exchange	Indian Rupees
(1) Pipelines .			15.5	10.5
(2) Pumping Stations & Line St	or age Fac i	lities	7.8	0.2
(3) Civil Works			3.4	0.7
(4) General Expd.		•	0.4	0.2
	T	OTAL .	27.10	11.9

It was also indicated in this D.O. letter that the work will be completed within a period of about nine to eleven months from the date of acceptance of Snam Progetti's offer and Snam Progetti have agreed to give a rebate of 62 million Lire (Rs. 4.7 lakhs) if they are intimated within 30 days of the receipt of the Preliminary Project Report, to discontinue work on the Barauni-Calcutta line. The approval of the Government of India was also sought.

Approval of the Government of India for accepting the offer of Messrs. Snam Progetti for the preparation of the Executive Project Report simultaneously for both the pipelines (viz. Barauni-Delhi and Barauni-Calcutta) at a cost not exceeding 512,000,000 Italian

Lire was accorded in the Ministry of Steel Mines & Fuel letter No. 24(5)61-Oil (PL) dt. 11|15-1-1962. The sanction, inter alia, stipulated that if in May 1962 after a study of the detailed Project Report the Barauni-Calcutta line is found by the I.R.L. to be not financially justified, Messrs. Snam Progetti should be asked to stop the work within 30 days of the preliminary report and that Messrs. Snam would give a rebate of 62 million Italian Lire.

On 16th January 1962 Snam Progetti was informed of the acceplated that if in May 1962 after a study of the detailed Project Report Report simultaneously for both the pipelines *vide* IRL letter No. 5-C|247 dated 16-1-1962.

7. Proposal given in the Project Report

In the Project Report Snam Progetti suggested two products Pipelines, one 8" dia line for the movement of products from Barauni to Rudrani (70 miles from Calcutta) and the other for the movement of imported products from Calcutta (Budge-Budge) to Barauni, the second line being 8" dia from Budge-Budge to Asansol and 6" dia from Asansol to Barauni. In the note circulated by the Managing Director I.R.L. on the subject as Agenda Item 88 of the meeting held on 24th August, 1962, it was recommended that only one 8" dia line between Barauni and Calcutta would be adequate for the movement of the products in both directions. The Board agreed to this recommendation. The Board also agreed that Messrs. Snam Progetti may continue their work on the Barauni-Calcutta section of the pipeline.

On 25th August, 1962 Snam Progetti was informed that only one line between Barauni-Calcutta (Budge-Budge) would be adequate for the movement of products both ways instead of having two lines as suggested in their Project Report and their views in the matter were requested.

8. Modification in the original proposal

In the note submitted by the Managing Director as Agenda Item No. 112 for the meeting of the Board of Directors held on 20-10-1962 it was explained by him that the studies since made by the Indian Institute of Petroleum as regards the Barauni-Delhi line, have shown that the pipeline from Barauni westward should terminate at Kanpur instead of at Delhi and the ENI who were consulted in the matter have agreed with this modification. It was also indicated in the note that, as a result of this change, the E.N.I. have stated that the Barauni-Calcutta line should be of 10" dia instead of 8" dia and the Barauni-Kanpur line should be of 12" dia instead of 10" originally planned and the Barauni-Calcutta line will be capable to deal with a throughput of about 0.5 million tons per year and the Barauni-Kanpur line with a throughput of about 1.7 million tons per year. The cost of the pipeline as thus revised was estimated as Rs. 25

crores as against the original estimate of Rs. 27 crores. The Board took note of this information and authorised the Managing Director in its meeting held on 20-10-62 to negotiate with E.N.I. for the execution of the work subject to such further check as may be possible about pipe size etc. In the Board's meeting the Managing Director, I.R.L. stated that the provisional plans for the execution of the project as discussed with the E.N.I. would be as follows:—

Barauni-Kanpur Section—Start in Oct. 1963 & Complete in June, 1964.

Calcutta-Barauni Section—Start in Oct. 1963 & Complete in April, 1965.

This time schedule was, however, subject to availability of pipes in proper time.

The Managing Director I.R.L. also stated in the meeting that he had given further thought to the earlier decision to entrust the work pertaining to the construction of the Calcutta-Barauni-Kanpur lines to E.N.I. and he is of the view that it will be of advantage if the management of construction is carried out by the Bechtel Corporation who have already been entrusted with similar work on the Gauhati-Siliguri line subject to Bechtel agreeing to suitable terms of remuneration. The Board agreed to this proposal and authorised the Managing Director to negotiate in the matter and to obtain the approval of the Government of India.

9. Project kept in abeyance

In the meeting of the Board of Directors held on 29-11-62 the Managing Director stated that as a result of the emergency Government's intention was that the Barauni-Calcutta and Barauni-Kanpur pipelines projects may be kept in abeyance for some months and in the meantime all preparatory work such as designs, land acquisitions etc. may be completed so that in the event it is decided later to implement the project further delays are avoided.

On 20th December 1962, the Managing Director I.R.L. wrote to Dr. Gaspirini of E.N.I. requesting for the postponement of the deadline for entering into a contract under E.N.I.—Government of India from 31-1-63 to 31-1-64 owing to the emergency in India.

10. Reappraisal of the Oil Position on account of emergency

In the note submitted by the Managing Director I.R.L. as Agenda Item No. 139 for the Board's meeting held on 28-1-63 it was explained by him that the Government of India Ministry of Mines & Fuel on a re-appraisal of the oil position on account of the emergency had taken inter-alia the following decision:

"An oil pipeline from Haldia Calcutta to Barauni be constructed for transport of crude oil up to 3 million tonnes per

annum to feed the Refinery should this at any time be found necessary or to move products."

It was also explained by the Managing Director that this pipeline must be of a dual purpose line so as to serve the purpose of product movement also if necessary and it will be necessary to align the pipeline through Calcutta to Haldia and the full financial effect of the scheme will have to be worked out in detail after discussion with E.N.I. which were in progress.

11. Fees demanded by Snam

In their letter dated 8th February 1963 addressed to the Indian Refineries, Snam Ltd. India Branch indicated that as a result of the conversation they had with the I.R.L. it was decided that the new terminal of the Barauni-Calcutta pipeline would be at Haldia instead of at Calcutta (Budge-Budge) as planned before and this being the case a complete new survey of the section Rudrani-Haldia was necessary and complete re-elaboration of all the data already acquired for the old route would be necesseary and their fees would be 62,500,000 Italian Lire.

12. Details of the Proposed Pipeline System

In a note submitted by the Managing Director I.R.L. as Agenda Item No. 164 for the meeting of the Board of Directors held on 15th March, 1963 the following details of the proposed pipeline system were given.

- 1. The I.R.L. have recommended to the Government that it would be expedient from the point of view of execution of work and overall economies, if alongside the Barauni Haldia/Calcutta pipeline, the Barauni-Kanpur pipeline is also taken up for execution and Government appear to be in agreement with this view.
- 2. Details of the pipeline system:

(i) Total length of the pipeline

723 miles

(ii) Pipe size

12" dia.

(iii) Annual throughput:

Haldia-Barauni Section

Up to 3 million tonnes of crude oil when required. Ordinarily about 5,00,000 tonnes of products from Barauni to Calcutta and Calcutta to Barauni and westwards.

Barauni-Kanpur Section

Up to 1.7 million tonnes of products.

(iv) Estimated cost of the Project . . . Rs. 29 07 crores

Barauni-Kanpur line

	(Rs. in cros	Rs. in crores)		
Pipeline and Telecommunicati	on system	11.92		
Pumping stations		2.27		
Tank Farm		1.38		
	TOTAL	15.57		
(excludi	ng dormant interest)			
Baro	auni-Haldia Line			
	(Rs in ca	rores)		
Pipeline (excluding telecommin	nication system)	8.28		
Pumping stations .		3.28		
Tank Farm		1 · 64		
	Total .	13.20		
(exc	luding dormant inter e st) —			

- 3. It was mentioned in the note that it had earlier been thought that the construction of this pipeline should be done through a negotiated contract with E.N.I. However in view of the large estimate of cost of the project, the Managing Director was of the opinion that competitive tender should be invited from selected firms. In informal discussion, Government have agreed with this view.
- 4. The Government's decision to provide a pipeline from Haldia (instead of from Calcutta) to Barauni has necessitated a fresh survey of contours and alignment from Rudrani to Haldia. For doing this additional work ENI have asked for a payment of Rs. 1.98 lakhs in Indian Rupees.

The Board's approval was sought for the following: -

- (a) The estimate of Rs. 29.07 crores for the Calcutta/Haldia-Barauni-Kanpur Line (Government being addressed to sanction the estimate).
- (b) Payment of a sum of Rs. 1.98 lakhs to the E.N.I. or the additional work involved on the Rudrani-Haldia line.
- (c) The adoption of the tender procedure outlined in para 4 of the Managing Director's note.

The Board was also informed by the Managing Director that the construction of a 12" dia line from Haldia to Barauni as against an 8" dia line for the expected throughput of products will involve an increase in outlay of Rs. 6.27 crores and the I.R.L. have been given to understand that the Government are likely to give a subsidy to this extent.

The Board accorded its approval for the items brought out in the agenda note. In the minutes of the meeting of the Board the following was also recorded:

"On an enquiry from Sri Govindan Nair, Managing Director explained that the increase in the Haldia-Barauni line is on account of the large pipe size (12" as against 8" for the product line) another increased number of pumping stations (estimated to be 8 or 9) handle 3 million tonnes of crude oil per year. Since this requirement is mainly to cater for any possible urgency, the Board felt that it may be advisable to take afresh view specially as regards the number of pumping stations in the next few months.

13. Request for Government's approval

On 22nd March, 1963 approval of the Government of India was sought for the following:

- (i) the execution of both the projects at an estimated cost of Rs. 29.07 crores.
- (ii) Payment to Messrs. Snam of Rs. 2.79 lakhs in Italian Lire and Rs. 1.98 lakhs in Indian Rupees for the detailed survey and design work, i.e., the preparation of the Executive Project Report for the portion from Barauni to Haldia which is an extra work over and above the work Messrs. Snam have already carried out on the Barauni-Calcutta route. The payment of Rs. 2.79 lakhs in Italian Lire will be offset against the reduction of a similar amount which Messrs. Snam have agreed to give as a

result of curtailment of their work in view of the Barauni westward line now terminating at Kanpur instead of Delhi as previously envisaged; and

(iii) Subsidy to I.R.L. from Government to the extent of the difference in cost estimated at Rs. 6.27 crores between the 8" dia. product line between Calcutta-Barauni and a 12" dia. crude oil from Haldia-Calcutta-Barauni. The difference in the original estimate of Rs. 7.23 crores and the present estimate of Rs. 13.50 crores for the Barauni-Haldia line was explained as under:

(Barauni-Haldia Line— 12·75" O.D.)			
Original	Revised	Difference	
(in crores)	(in crores	(in crres)	
4.86	8.28	30.42	
1 · 45	3 · 58	2.13	
0.92	1 · 64	0.72	
7 · 28	13.20	6.27	
	Original (in crores) 4 · 86 1 · 45 0 · 92	Original Revised (in crores) (in crores) 4.86 8.28 1.45 3.58 0.92 1.64	

[The main increases are on account of the large size of the pipeline and the number of pumping stations (estimated at 8 as against 5 originally envisaged) and the large capacities in order to pump three million tonnes per year of crude oil].

14. Inter Ministerial Meeting

At the Inter-Ministerial meetings held on 26th March, 1963 and 10th April, 1963, Managing Director I.R.L. (Sri Nayak) was authorised to discuss with E.N.I. the possibility of reduction of cost and postponement of completion date for the pipelines. In the interministerial meeting held on 15th May, 1963, the Managing Director reviewed the discussion he had been having with E.N.I. representatives and he stated that E.N.I.'s original estimate of about Rs. 29 crores for the pipeline had been calculated on a comparatively low price for pipes. If the indigenous price of pipes was taken at about Rs. 1500/- per tone at site, the total project estimate would go up to Rs. 32.5 crores. On the other hand E.N.I. were proposing the following major modifications to their original designs which would result in a reduction of about Rs. 3.07 crores as under:

(i) Replacing the telemetering system by the Radio telephone system resulting in a reduction of Rs. 1.82 crores.

(ii) Substituting 8 permanent pumps for crude oil by 8 mobile mounted pumps for occasional transmission of crude oil. This effects reduction of Rs. 1.25 crores.

There would be no change in the number of permanent pumps to be installed for products transmission viz., 3 nos.

In the meeting it was stated by the Managing Director I.R.L. that E.N.I.'s latest proposal on the basis of radio telephone communication system and 8 mobile pumps was for splitting up the project on the following basis:—

- (a) E.N.I. were prepared to lay the pipes and supply technical services and equipment at a total cost of Rs. 10.54 crores (Foreign exchange component Rs. 6.62 crores).
- (b) Government's responsibility would be to enter into separate contracts for the following inservices/supplies:—
 - (i) procurement and supply of steel pipes. The Managing Director estimated that out of the 63000 tons required for the two pipelines, about 40,000 tons would have to be imported at a cost of Rs. 5.5 crores.
 - (ii) telecommunication equipment estimated to cost Rs. 110 lakhs (Foreign exchange component Rs. 88 lakhs).
- (iii) Pump stations construction—cost Rs. 40.50 lakhs.
- (iv) Tank farm construction—cost Rs. 2.76 crores (Foreign exchange component Rs. 14 lakhs).
- (v) Procurement of materials—cost Rs. 80 lakhs.
- (vi) Land acquisition—Rs. 65 lakhs.
- (vii) Designs, engineering, administration management etc.,
 —Rs. 130 lakhs.
- (viii) Customs (Rs. 1 crore) and income-tax liabilities devolving on the Proprietor of E.N.I.—Total cost Rs. 160 lakhs.

In all, therefore, the total cost of the project split up as indicated above would comes to Rs. 29.91 crores (Foreign Exchange component Rs. 13.6 crores).

The schedule of construction that E.N.I. had offered was as under:—

- (a) Completing the Haldia-Barauni pipeline and June 1964 installation of 8 mobile pump stations for transporting crude oil.
- (b) Completing construction of three permanent pump December '64 stations for products on the Haldia-Barauni pipe-
- (c) Completing of Barauni-Kanpur products pipeline June 1965

As regards the main pipeline contract, Sri Nayak stated in the meeting that several companies had offered to tender for the main work and in addition had expressed the possibilities of furnishing credit on the same terms and conditions as E.N.I. credit.

The following decisions were taken in the Ministerial meeting:-

- (a) I.R.L. will immediately go in for tenders for 40,000 tones of pipes on the basis of E.N.I.'s specifications. The tenders may be restricted to U.K., U.S.A., France, West Germany, Italy and Japan.
- (b) As soon as E.N.I. submitted the tender documents by about 7th June, 1963, I.R.L. will direct enquiries for the pipeline execution work and for the supply of technical services and equipment to the firms which had earlier expressed interest in tendering for the work, viz., Bechtel Corporation (USA), William Bros., Construction, John Brown and Motterwell of U.K., Ratrepos and Sociate Parisenne of France, Snam of Italy, Mannesman of West Germany.
- (c) I.R.L. will also take expert advice as to whether or not the mobile skid pumps proposed by E.N.I. would prove satisfactory and if necessary they will go in for supplementary tenders addressed to the same firms for alternative bids on the basis of permanent pump stations for the crude oil.
- (d) Finally, as soon as possible after the tenders for main work, I.R.L. will float tenders for the installation of telecommunication equipment and for construction of tank farm on the basis of E.N.I.'s designs. These tenders will also be addressed generally to the countries which will supply pipes.
- (e) All the tenders indicated at (a) to (d) above will specifically mention that tenders will be considered only on the condition of credit facilites being arranged for by the

tenderer for the services materials. The tenderer will, therefore, be asked to indicate the best credit terms that he can offer.

15. Agreement with Bechtel for certain technical services connected with H.B.K.

On 25th May, 1963, the Managing Director (Sri Nayak) in his letter No. S-11/Construction, dated 25th May, 1963 wrote to Mr. Dorman Vice-President of Bechtel Asian Corporation that subject to agreement on financial terms and the specific approval of the Government of India, Indian Refineries Limited have decided to enter into a contract with Bechtel for certain technical services connected with and the management of construction of the Haldia-Barauni-Kanpur pipeline. The technical services relate to certain aspects of the design of the pipeline system as already prepared by Snam Progetti and Bechtel's services were desired for consultation with Snam Progetti on the following matters:—

- (a) Pipe materials.
- (b) Pump Station.
- (c) Telecommunicating and telemetering.
- (d) Tank farm
- (e) Coating and wrapping.

It was also intimated by the Managing Director that it was their intention, subject to satisfactory agreement being reached as to cost, to execute this work through Saipem an E.N.I. Company on the basis of a negotiated contract and Bechtel's services will be required during these contract negotiations and eventually in supervising the construction work as Manager. In the concluding portion of the letter, the Managing Director, I.R.L. recorded as under:—

"We believe that a formal agreement with Bechtel can be settled within the next 60 days. Meanwhile I trust you will agree to have necessary further action taken as mentioned above. Expenditure that Bechtel will reasonably incur in the intervening period will be reimbursed in Rupees, if the proposed agreement between us does not go forward for any reason."

On 31st May, 1963, the Managing Director I.R.L. (Sri Nayak) vide his letter No. S-11 Const., dated 31st May, 1963 informed Mr. Fidora, General Manager, Snam Progetti as under:—

"...As I had mentioned to Dr. Gasparini and Mr. Mauro, when we had met on the 25th instant, we are considering the question of appointing Bechtel as Construction Manager for the Haldia-Barauni-Kanpur Project. A final

decision has not been taken, as this is dependent on agreement about terms, etc. Meanwhile, we have asked, Bechtel to make certain enquiries for us about the availability, price etc., of pipes from several countries in the world, we also wish to associate Bechtel in our negotiations with Saipem for the conclusion of a contract for the execution of the pipeline. Will you kindly convey this information to Snam and Saipem in Milan?

On 14th June, 1963 Bechtel Asian Corporation in their letter, dated 14th June, 1963 gave a proposal for consulting and management services for the Haldia-Barauni-Kanpur pipeline system which inter-alia included the following:—

- "...In the discharge of its responsibilities Bechtel will consult and advise I.R.L. concerning major decisions and activities of the project.....".
- "....Bechtel acting as representative of I.R.L. will supervise the preparation of the detailed engineering which will be performed in Italy by Progetti. Bachtel will perform those functions required of I.R.L. with respect to approval of drawings, specifications, schedules and other technical Bechtel will arrange to have Progetti prepare schedules, lists of drawings and specifications and perform all other planning required to assure that the engineering will be performed in an orderly and effective Programmes will be established with Progetti whereby materials and equipments to be furnished by Progetti or Saipem will be subjected to engineering review and check. For such materials and equipments the manufacturer's drawings and specifications will be subject to the acceptance of I.R.L. acting through its engineering consultant.....".
- "....Bechtel will act for I.R.L. in checking the drawings and specifications of vendors and in making certain such information is made available to Progetti as needed for development of the detailed design and to Saipem for the construction work."

16. Government's approval

On 4th June, 1963 sanction of the Government of India, Ministry of Mines and Fuel was accorded to the payment by I.R.L. of Rs. 1.98 lakhs in Indian Rupees to Messrs. Snam S.P.A. for the detailed survey and design work, i.e., the preparation of Executive Project Report for the portion from Rudrani to Haldia which is an extra work over and above the work. Messrs. Snam have already carried out on the Barauni-Calcutta routes. It was indicated in the sanction that the payment of Rs. 7.79 lakhs in Italian Lire for this work will be offset

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against the reduction of a similar amount which Messrs. Snam have agreed to give as a result of curtailment of their work in view of the Barauni westward line now terminating at Kanpur instead of Delhi as previously envisaged. No extra foreign exchange payment is therefore involved. In this sanction specific mention about the approval for execution of the project at a total cost of Rs. 29.07 crores was, however, not made.

17. Revised Estimate

As indicated in para 13 above, Government approval was, interalia, sought to the execution of the Project at an estimated cost of Rs. 29.07 crores. In a subsequent D.O. letter dated 23rd April, 1963 to the Secretary to the Government of India, Ministry of Mines and Fuel, the Managing Director I.R.L. pointed out that the estimated cost may actually go up to Rs. 31.32 crores on account of the probable high cost of pipes and for certain other reasons.

18. Programme for the execution of the Project

After the issue of the D.O. letter dated 23rd April, 1963 mentioned in para 17 above, the execution of the project had been the subject matter of number of discussions between I.R.L. and Government and the final outcome was recorded in the letter dated 6th July, 1963 addressed to the Secretary to the Government of India, Ministry of Mines and Fuel by the Managing Director I.R.L. which had the approval of the Board of Director (meeting held on 5th July, 1963). Some of the more important points mentioned in this letter are reproduced below:

- (i) The execution of the Project may be settled by negotiation with the concerned E.N.I. Company, an earlier decision to invite tenders from a number of selected companies being given up, mainly because of the probable difficulty of finding the foreign exchange involved and also because of the likely delay in the execution.
- (ii) As certain aspects of design and specification in the scheme of the project drawn up by Snam Progetti appeared to be of a somewhat doubtful nature, and as certain economics in the total project cost estimate appeared probable, the design and specification should be reviewed in discussion with Snam Progetti and for this purpose the services of Bechtel Corporation of U.S.A. whose employment for the management of construction was in view, should be utilised.
 - (iii) Banning only the procurement supply of pipes and the installation of a communications system. Saipem will do a complete turnkey job subject to the scope of the work

as defined. The work to be done includes the construction of (a) the main line, the submerged river crossing, the rail bridge crossing and minor canal and road crossings; (b) the industrial civil works and the electrical and mechanical erection, works of the pump stations; and

- (c) the complete works of the tank farms.
- (iv) The total contract estimates for both the pipelines were given as under:—

Construction	Barauni- Haldia Line	Barauni- Kanpur Line
	Rs.	Rs.
Mainline construction work .	. 3,62,52,237	3,92,06,030
Products pumping Stas. & terminals erection	. 13,74,220	27,10,782
Industrial civil work .	15,00,000	25,80,000
Tank farm construction	44,79,183	1,37,55,428
	4,36,05,640	5,82,52,240
Foreign main line materials	32,99,508	21,65,891
Pumping & terminal stations materials for products		1,19,74,560
Six crude oil pumping sets	. 50,88,000	
Foreign tank farm materials · · ·	. 1,86,620	5,73,104
	1,76,07,566	1,47,13,553
Other services		
Procurement · · · · ·	. 1,00,000	1,00,000
GRAND TOTAL	6,13,13,206	7,30,65,795
Say ·	13,43,79,001 · 13,44 cror s	

(v) The programme for the execution of the project was given as under : Haldia-Barauni Line (a) Starting date • 1-11-1963 (b) End of construction work on the main line & supply CIF Calcutta of 6 crude oil pumping sets 30-6-64 (c) Start of construction work in the products pumping stations 30-4-64 (d) End of construction work in the products pumping 30-12-64 Barauni-Kanpur Line (a) Start of coastruction work on both main line & in the pumping station · · · 30-9-64 (d) End of construction work on both mainline & in the pumping station 30-6-65

- (vi) Snam Saipem will arrange for the procurement of all India supplies required for the execution of the work. For this service, Saipem will be paid a fee based on the value of the supplies to be procured (estimated cost about Rs. 50 lakhs). I.R.L. will, however, pay the bills and invoices on such purchases. It is considered that such an arrangement will be conducive to good construction progress as one party will remain responsible for synchronised action on all related matters.
- (vii) Saipem will arrange to procure all foreign materials required for incorporation in the project. There are many such items as pumps motors, valves, instruments, wrapping material etc. A figure of ceiling of cost on account of such supplies is included in the price negotiated, but payment will be limited to the actual costs plus charges on account of procurement services, inspection, ocean freight, freight, inland transport in India and abroad and handling and incidental charges.
- (viii) Following the negotiation carried out with Saipem. I.R.L. propose to enter into a contract with them in the value of Rs. 134379001 with a foreign exchange component of Rs. 62154973 (\$ 13,057767) i.e., about 46.2 per cent of the total.

Government's approval was sought for the following:-

- (i) I.R.L. entering into a contract with Snam in the total value of Rs. 13,43,79,001 with a foreign exchange component of Rs. 6,21,54,973 to be financed from E.N.I. credit. 5 per cent of the foreign exchange component is to be paid on the signing of the contract.
- (ii) the estimated project cost of Rs. 26.42 crores.

19. Receipt of Government sanction

On 31st July, 1963 Government of India, Ministry of Mines and Fuel in their letter No. 31st December 1963/ONG, dated 31st July, 1963 conveyed the approval of the President to the I.R.O. entering into a contract with Messrs. Saipem for the completion of the following works relating to H.B.K. Pipelines:

- (a) Construction of the mainline, the submerged river crossings, the rail bridge crossings and minor canal and road crossings.
- (b) The industrial civil works and the electrical and mechanical erection work of the pump station; and
- (c) the complete works of the tank farms.

at a total cost of Rs. 11,33,34,892 including foreign exchange component of Rs. 5,29,83,415. It was indicated in the sanction that construction of the Haldia-Barauni Pipeline will start in November 1963 and will be completed by 31st December 1964 while the construction of the Barauni-Kanpur Pipeline will commence by end of September 1964 and be completed by end of June 1965.

No mention was, however, made regarding approval of the estimated project cost of Rs. 26.42 crores.

20. Contract agreement with Saipem

On 31st July 1963 a contract was concluded and signed with Snam Saipem for the construction of the H.B.K. pipeline. A copy of the contract was forwarded to the Secretary to the Government of India, Ministry of Mines and Fuel on 2nd August, 1963.

On 23rd October 1963, Government sanction was accorded to the release of foreign exchange equivalent of Rs. 5,29,63,415/- and it was mentioned that foreign exchange will be mete out of the E.N.I. credit and payments made as per the contract signed on 31st July, 1963 between I.R.L. and Saipem.

21. Brief Particulars of the Contract with Saipem

The contract consists of three parts, Part I—contract and exhibits, Part II—General conditions and Part III—job description, construction specification and exhibits.

PART I

Exhibit 'A'—The line construction ,

Lump sum amount payable:

Haldia-Barauni line	(2″—)	•			•		Rs.	2,19,26,552
Length approximate	20 K	m	•	•		•	\$	30,09,598
Barauni-Kanpur line	•	•	•	•	•	. I	Rs.	2,47,05,895
12 approximate lengt	h 670	Km.	•	•	•	•	\$	30,46,247
						Haldi Barau		Barauni- Kanpur
							in r	netres
Length of the line	•	•	•			5,10,0		6,61,500
Length of the line Cased crossing	•	•						
•	sings	•				2,4	000	6,61,500
Cased crossing	s ing s	•	•			2,4 8,4	000 430	6,61,500 3,200
Cased crossing River submerged cross	sings					2,2 8,4 2,	900 430 900	6,61,500 3,200 3,200

Should final measurement of above items excluding rock exceed in plus or minus 3 per cent in quantity, an adjustment shall be made in the prices (lump sum mentioned above) at certain prescribed rates.

Exhibit 'B'-Pump Station and Terminal erection

Barauni-Hald	lia Line	Barauni-Kanpur line				
Haldia products p	oumping Stns.	Barauni Products pumping Stns.				
Asansol	·Do.	Patna	Do.			
Barauni	Do.	Dumraon	Do.			
Rudrani Termina	1	Mughalsarai	Do.			
i. e. 3 Products Po † 1 terminal	umping Stations	Allahabad Kanpur terminal 1.e. 5 Products Pu 1 terminal	Do. Imping stations &			

Lump Sum
Rs. 8,27,087
†
Rs. 16,16,506
†
\$ 1,14,944
\$ 2,99,89 —

(In the event of pumping stations capacity and facilities being varied hereafter the parties will re-negotiate for the fixation of an appropriate revised prices).

Exhibit 'C'-Civil Industrial Work in Pumping Station

(Machinery foundations and equipments beds fire fighting system, industrial sewage system, external lighting system, industrial road and yard, pipe yard, all separator civil construction parts, control and panel rooms, including procurement, expediting co-ordination, routine inspection for the following pumping stations and terminals).

Barauni-Hald	ia Line	Barauni-Kanj	Barauni-Kanpur Line			
Haldia Product pu	mping Stns.	Barauni Product	Pumping Stns.			
Asansol	Do.	Patna	Do.			
Barauni	Do.	Dumraon	Do.			
Rudrani Terminal		Mughalsarai	Do.			
Crude Oil pumping	g inlet & outlet m	nani- Allahabad	Do.			
iolds.		Kanpur terminal				
Lump Sum		Lump Sum				
Rs. 14,25,030 \$15,750		Rs. 24,51,480 \$ 27,000				

(In the event of pumping stations being varied hereafter the parties will renegotiate for the fixation of the appropriate revised prices).

Exhibit 'D'-Tank Farm Construction

For tank construction including civil works, erection, Indian Materials, procurement expending, co-ordination and routine inspection.

Haldia-Barauni Line	Barauni-Kanpur Line
54250 metre	1,66,600 cubic metre
Lump Sum	Lump Sum
Ps. 39,47,230 \$1,11,755	Rs. 1,21,21,816 \$3,43,196 Total per cubic metre: Rs. 72.76 \$ 2.66

The above average rates per cubic metre have been calculated and agreed on an assumed proportion of 45 per cent of allocating rooftanks and 55 per cent of fixed rooftanks for which the rates of Rs. 90 c.m. and Rs. 77 c.m. (excluding foreign materials) were agreed. Should the proportion change the rates and consequently prices shall be varied accordingly.

Exhibit 'G'-List of Materials to be Supplied by the Contracton

				Rs.	
	-Haldia line materials Pumping stations & terminals				\$ 5,96,828 \$14,58,386
,,	Pumping set for crude oil pump	ing	•	2,86,000†	\$10,08,404
,,	Foreign materials for tank farm	•	•	• •	\$ 39,205
,,	Materials for electric system	•	•	1,88,000†	\$2,58,000
Baruni-	Kanpur line materials · ·	•	•		
,,	pumping stations & terminals	•	•	9,44,560†	\$18,72,210
,,	Foreign materials for tank farm	•	•	• •	\$ 1,20,400
,,	Materials for Electric system	•	•	2,00,000†	\$ 4,03,000
				30,55,744†	\$61,48,188
	Exhibit 'H'-Procurement Se	rvice	es of	Indian Mate	rials
Haldia	Barauni Section	•	•	Rs. 73,344†	\$5,600
Barauni	Kanpur Section · ·	•	•	Rs. 73,344†	\$5,600
			•	1,46,688	U 11,200

Exhibit I—Progress Schedule

							Haldia- Barauni	Barauni- Kanpur
Starting Date	•	•	•	•	•	•	1-11-1963	30-9-1964
End of construct six crude oil p				ine & s	upply	of.	30-6-1964	30-6-1965
Start of constructing stn.	ction w	ork in	the 1	produc	et pun	np-	30-4-1964	••
End of construct	ion wo	ork in 1	he pi	roduct	s pum	ping	31-12-1964	••

The above programme will be valid provided mainly that-

- (i) Line pipe of the proper size and thickness also as not to discontinue work, together with the corresponding coating materials, are handed over by the owner to contractor at delivery location in accordance with the programme indicated in the exhibit.
- (ii) Construction design including final lists and specifications for the materials to be supplied by contractor, is made available to contractor as per the programme indicated in the exhibit.

22. Scope of the work under the Contract

The object of the products pipelines has been defined in Part III of the contract under Job Description. It has been explained that the object is to transport motor spirit, Kerosene Oil, H. S. Diesel and Aviation Turbine Fuel from the Refinery area to be various main consumption centres considered important for the delivery of such oil products and which are situated along with the proposed pipeline route.

No where in the contract has it been mentioned as to the total quantity of products crude to be transported through the pipeline. The mainline and other pump capacity etc. have been given and on the basis of these facts, the total capacity of the HBK Line can

possibly be worked out. However, after the conclusion of the contract Snam Progetti gave a Project design description dated 26th February, 1964 (consisting of 17 pages) wherein the scope of the pipe line system had been given as under:

The pipeline system shall allow the transport of the following products:

		1	На	ldıa-Barauni Sect	ion		
Produc	oduct			Starting Point	Delivery Point	Quantity	
					tons/per a	nnum	
Crude Oil Kerosene M. S.	•	•	•	Haldia Haldia Haldia Barauni	Barauni Barauni (future) Barauni Rudrani	20,00,000 30,00,000 2,65,000 2,79,000	
		Ва	raı	mi-Kanpur Section	n		
H. S. D. Kerosene M. S.	•	•	}	Barauni	Patna Mughalsarai Allahabad Kanpur	5,12,000 3,72,000	
A. T. F.				B arauni	Kanpur	2,00,000	
						15,12,000	
				SUMMAR	Y		
Haldia Barauni Section				• · Crude Produ	cts o 5 milli	tons per year on tons per	
Barauni-Kanpur Section			1,	· · · Produc	year rts 1.5 mil		

^{23.} On 26th June, 1964 a formal contract was signed engaging M/s. Beethel Asian Corporation Ltd., as our agent to manage all matters relating to H.B.K. Project.

24. Amendment to the contract

In July, 1964 just after a year of the conclusion of the contract with Saipem an amendment to the contract with Snam Saipem was issued inter-alia bringing out certain important modification to the original contract. As indicated in para 19 above, in the various exhibits attached to the contract agreement, it was agreed and indicated that should final measurement of the items indicated in exhibit 'A' or in the event of pumping station capacity and facilities being

varied etc. the parties will renegotiate for the fixation of the appropriate revised prices. Apparently on account of the change made, due to administrative reason, on the pumping station capacity etc. an amendment was issued to the original contract in July, 1964. The papers leading to the initiation of the amendment or reasons for initiating the same are not available and therefore whatever conclusion we derive at will be more or less on a presumptive basis. The details of the changes effected in the original contract and the financial repurcussion if any involved are discussed below:

Amendment to Exhibit 'A'	Schedu e of prices for line construction
As in the original contract	As amended by the amendment of July 1964
Lump su 1	Lump sum
Haldia-Barauni line · · ·	Rs. 2,19,26,552 Rs. 2,10,11,282
	† ‡ \$ 30,09,598 \$ 29,69,003
Barauni-Kanpur Line · · ·	Rs. 2,47,05,895 Rs. 2,47,05,895
	\$ 30,46,247 \$ 30,46,247
Net saving as a result of amendment	
	Rs. 3,15,270 † \$ 40,595

The saving is due to reduction in the scope of the work as will be seen from amendments to other exhibits.

Pump Station & Terminal erection Exhibit 'B'

			As in the Original contract	As amende amendn	•
Haldia-Barauni ·	•	٠	3 Products pumping station & 1 Termi- nal pumping station.	3 Products Stn. & 1 Point.	Pum ping Delivery
				I Crude Station.	Pumping
Barauni-Kanpur	•	•	5 Products pumping stations & 1 Termi- nal	·	No. 2) 2 pumping Delivery Terminal

				Haldia-Ba	arauni	Barauni-Kanpur		
				Original	Amended	Original	Amended	
Products pumpir	ıg sta	tion	•	3	3	5	2	
Crude "	•		•		1		••	
Terminal ·	•	•		1		I	I	
Delivery Point	•	•	•	• •	I		2	
				4	5	6	5	

It will be seen from the details given above that while in the original contract 8 Nos. products pumping stations were provided, in the amendment, the number was reduced to 5 and in lieu one crude pumping station and three delivery points were introduced. The original contract catered for 2 terminals while the amendment has reduced this to one. The overall financial effect of these changes is net saving to the Corporation to the tune of Rs. 4,72,493 plus \$1,21,334 as indicated below:

Origi: a! contract	As a nended
(8 products pumping Stns. and 2 terminals)	(5 products pumping stns. I crude pumping station and 3 delivery points and I terminal)
Rs. 24,43,593 plus \$4,14,834	Rs. 19,71,000 plus \$2,93,500

Exhibit 'C' Civil Industrial Work in Pumping Station

The original contract catered for machinery foundations and equipment beds fire fighting system, industrial sewage system, external lighting system, industrial road and yeard, pipe yeard all separator civil construction parts, control and penal rooms including procurement, expediting co-ordinating routine inspection for 8 products pumping stations, 1 crude oil pumping station & two terminals at a total cost of Rs. 38,76,510 plus \$42,750.

Through the amendment the scope of the contractor's liability for work was reduced drastically and the contractor was made responsible only for procurement services of the industrial civil works contracts, construction supervision and coordination etc. in respect of 6 pumping stations and 4 delivery points at a cost of Rs. 1,57,200 plus \$30,000.

On account of excluding the scope of the actual constructional works from the contract there has been a saving of \$12,750 in foreign exhange. For procurement etc. services the amendment

allows the contractor a sum of Rs. 1.57 lakhs plus \$30,000 which works out to approximately 7 per cent on the overall cost for civil works actually executed. The eventual value of the contracts given for the civil works has been stated to be Rs. 42.42 lakhs plus Rs. 3 lakhs for procurement services as against the original contract figure of Rs. 40.80 lakhs (approx.) (which included a foreign exchange of \$42,750 U.S. Dollars).

Since the pumping stations were varied from the scope given in Exhibit 'C' of the original contract and since according to the terms of the contract the parties will have to renegotiate for the fixation of the appropriate revised prices, it may be difficult to establish at this stage whether the contractor would have agreed to do the job as per his original rates given in the contract in 1963. At any rate, the amount paid to the contractor for procurement etc. services which works out to approximate 7 per cent of the cost of the work appears to be on the high side.

Exhibit 'D' Take farm construction

Here also the original contract catered for tank farm construction including all civil works etc. at a total cost of Rs. 1,60,69,046 plus 4,54,951 US Dollars. The total unit required was indicated as 2,20,850 cubic meter and the average rate per cubic metre was shown as Rs. 72.76 plus U.S. \$2.60. With the issue of the amendments the contractor's responsibility was limited to procurement of the contract, construction supervision etc. at a cost of Rs. 50,000|- plus \$10,500. As against the originally estimated quantity of 2,20,850 cubic metre, indicated in the contract, the revised estimate was indicated in the amendment as 58,250 cubic metre only. The reduction in the scope of the work has resulted in a considerable saving in the H.B.K. Project. It appears that the tankage the different delivery stations (except Haldia) has been constructed by the Marketing Division at a cost higher than that originally contemplated in the contract with Snam Saipem. Before arriving at any conclusion, it would be necessary to examine whether the marketing division has adopted the same specification etc. for tankage as has been mentioned in Saipem's contract.

Exhibit 'G' Supply of Materials

The original Exhibit 'G' to the contract provided for the supply of materials by the contractor to the value of Rs. 30,55,744 plus \$61,48,188. The amendment limits the supply of materials by the contractor to Rs. 29,39,167 plus \$44,10,513. There has thus been a considerable saying which was mainly due to reduction in the scope of the work. In the amendment to Exhibit 'G' it has been mentioned that the contractor will supply only materials from foreign sources as listed in the list of materials dated 21-4-64. A

perusal of this list of materials indicated that full specification for the materials to be supplied under the contract has not been given and instead 'CON' NOS. have been indicated against each item. Apparently the description of the materials would find a place in these 'CON' (specifications) which are not available here. Before making final payment to the Contractor under Exhibit 'G' (as amended) it may be necessary for the Engineers to verify whether the materials actually supplied agree to the specifications indicated in the list of materials dated 21-4-64, which again are based on details given in various 'CON' Nos. A comparison of the original specification and the revised one has been effected wherever possible in respect of some of the more important items and the results are tabulated below:

Item	Original Revised Specification Specification
Pipeline materials	
Glass inner wrap unsaturated	(60/gr/m2) 1470 sq. mt. 1453 m. q

1. Diesel Engine

Station	Horse Power	Nos	Horse Power	Nos.
Barauni .	650	2	370	2
Booster No. 2			540	1
Asansol	282	3	370	3
Haldia	835	2	370	3
Patna	480	2		
Dumraon	480	2		
Mughalsarai .	. 480	2	750	3
Allahabad .	650	2		
Barauni	650	2	370	3
	480	2	750	3
		17		16

2. Scraper Traps

Haldia .				•			•	1	I
Barauni .	•						•	2	2
Mughalsarai	•		•		•	•	•	2	2
Kanpur .	•	•	•	•	•	•	•	I,	I
Asansol .	•		•				•	2	2
Patna .	•	•	•		•		•	2	
Dunracn .	•					•		2	
Aliahalvad .	•	•			•	•	•	2	
allow to the distribution of the transport								14	8
		ration are rain		3. Ga	te Va	lves		·	
Station		Orig Spe	ginal cificat	ion	,	No.		rised fication	N o.
I			2			3		4	5
Barauni-Haldia Barauni-Kanpu			ASA-		}	19 27	} 12"	ASA-600	40
					-	46	-		40
Barauni .		6"	ASA-1	50		8	12" AS	A-600	4
		8" A	ASA-1	50		16	10" AS.	A-600	6
		8" /	ASA-6	00		4	8" ASA	-600	6
			ASA-			3	12" AS	_	5
			ASA-	-		14	10" AS	-	19
			ASA-	_		4	8" ASA	•	18
		12"	ASA-	-3∞		1	6" ASA	•	I
							8° .^ SA	1-150	2
					-	50	4' ASA	\-150 ·	3
							3" AS/	N-150	1
							4" ASA		5
							3" ASA		2
							2" AS	_	6
							11" AS.		5
							ı" ASA		90
							(fire fig)	nting exclud	led)

I	2	3	4	5
Asansol	. 8" ASA-600	13	12" ASA-600	4
	12" ASA-600	6	10" ASA-600	12
			8" ASA-600	4
			4" ASA-600	4
		19	3" ASA-600	4
			3" ASA-150	2
			r" ASA-600	40
				70
Rudrani	. 6" ASA-150	9	12" ASA-600	2
	8'' A SA-150	10	10" ASA-150	4
	8" ASA-600	2	8" ASA-150	3
			6" ASA-150	2
			8" ASA-150	2
			6" ASA-150	ı
			4" ASA-150	I
			3" ASA-150	I
			4" ASA-150	1
			3" ASA-150	4
			1 1" ASA-600	I
			1' ASA-600	20
				42
Haldia .	. 6" ASA-150	8	12" ASA-600	2
	8" ASA-150	18	10" ASA-600	4
	6" ASA-600	6	8" ASA-600	3
	12" ASA-600	2	14" ASA-150	I
		34	12" ASA-150	2
			10" ASA-150	5
			8" ASA-600	2
			3" ASA-600	1
			3" ASA-150	:
			2" ASA-150	2
			11 ASA-600	2
			1" ASA-600	5:
				90

1	2	3	4	5
Dunarow .	. 10" ASA-300	9		
	12" ASA-300	2	Nil	
	,	11		
Mughalsarai .	. 6" ASA-150	42	12" ASA-600	4
	8" ASA-150	24	10" ASA-600	11
	8" ASA-300	5	8" ASA-600	5
	10" ASA-150	30	10" ASA-150	3
	10 " A SA-300	I	8" ASA-150	8
	12" ASA-150	17	6" ASA-150	6
	12" ASA-300	2	8" ASA-150	2
		121	4" ASA-150	1
			3" ASA-150	r
			4" ASA-600	2
			3" ASA-600	2
			4" ASA-150	2
			3" ASA-150	5
			1" ASA-600	1
			1" ASA-600	50
				104
Allahabad ·	· 6" ASA-150	13	12" ASA-600	2
	8" ASA-150	17	10° ASA-150	3
	8" ASA-300	1	8' ASA-150	5
	8" ASA-600	4	6" ASA-150	1
	12" ASA-300	1	3" ASA-150	3
	12" ASA-600	1	3" ASA-150	3
	12" ASA-600	1	11 ASA-600	1
		37	1" ASA-600	20
				35
Kanpur ·	· 6" ASA-150	13	12" ASA-600	2
	8" ASA-150	17	10 ° ASA-150	3
	8" ASA-600	Ī	8" ASA-150	7
	12" ASA-600	1	6' ASA-150	2
		32	8" ASA-150	2

1	2	3	4	5		
			6" ASA-150	I		
			4" ASA-150	I		
			3" ASA-150	1		
			4" ASA-600	I		
			3" ASA-600	1		
			3" ASA-150	4		
			11" ASA-600	I		
			1" ASA-600	25		
				51		
Patna · ·	· 6" ASA-150	14	12" ASA-600	2		
	8" ASA-150	5	10" ASA-150	3		
	10 " ASA- 150	10	8" ASA-150	5		
	10" ASA-300	5	6" ASA-150	I		
	12" ASA-150	3	3" ASA-150	3		
	12" ASA-300	2	11'' ASA-600	I		
			1" ASA-600	20		
		39	•	35		
		(plus: 3 an latec	supply to Booster I d 4 not originally o	Nos. 1, 2, contemp-		
Booster Nos. 1, 2, 3	Nil.		10" ASA-600	2		
and 4			12" ASA-600	4		
				6		
	As per original con	ntract.	410 Nos. of gate	alves.		
			643 Nos. ,,			

It will be seen from the details given above that in some cases the Specifications have been drastically changed and the number of units required have been increased.

EXHIBIT'I' PROGRESS SCHEDULE

Description	As per the original contract	As per the amendment
Haldı a-Barosmı		
(i) Starting date · · · · · · ·	1-11-63	1-3-64
(ii) End of construction work on the main line .	30-6-64	28-2-65
(iii) Start of construction work in the product pumping stations	30-4-64	30 -6- 64
(iv) End of construction work in the product pumping stations	31-12-64	28-2-65
(v) Start of const. work at Haldia Stn. and Booster No. 2	••	15-12-64
(vi) End of construction work	••	30-4-65
Baraum-Kanpur		
Start of construction work at the main line .	30-9-64	1-10-64
End of construction work on the main line	30-6-65	30-6-65
Start of construction work at all pumping station	8 30-9-64	1-9-64
End of construction work in the pumping station	30-6-65	30-6-65

It will be seen from the details given above that the work which should have been started on 1-11-1963 was actually started only on 1-3-64. One of the main reasons for postponement of the starting and completion dates was due to non-availability in time of pipes and certain construction equipment. This has been explained in the note indicating the progress on the Haldia-Barauni Pipeline (as on July, 64) forwarded to the Ministry under D.O. letter No. PL|B, dated 19-9-64 from the C.A.O.

25. Further Development of the Case after the Amendment signed in July, 1964 to the Contract.

In July 1964 an amendment to the contract with Saipem was signed by the I.R.L. just after a month on 27th August, 1964, Bechtel International Corporation, Sanfransisco in their letter No. 4415-MLF-203, dated 27-8-64 intimated the Bechtel Asian Corporation as under:

is presently completing design and procurement of H.B.K. and would appreciate it if you will communicate to I.R.L. that no change will be made to these concepts in Milan unless an official request is received reflecting a precise decision to change the project scope."

The H.B.K. design concepts were given as under by the Bechtel International Corporation:

Product	Volu n	ne	From	То	To commence	
Kerosene	0. 265 1	МТА	Haldia	Barauni	1969	
Motor Spirit	0.093	,,	Barauni	Asansol	1965	
,,	0.186	**	,,	Barajabar	1965	
"	0.043	,,	,,	Patna	1965	
Kerosene	0.037	,,	,,	,,	1965	
H. S.D.	0.021	,,	,,	,,	1965	
Motor Spirit	0.064	,,	,,	Mughalsafai	1965	
Kerosene	0.056	,,	,,	,,	1965	
H. S. D.	0.077	,,	,,	,,	1965	
Motor Spirit	0.043	**	,,	Allahabad	1965	
Kerosene	0.037	,,	,,	,,	1965	
H. S. D.	0.021	,,	39	,,	1965	
Motor Spirit	0.278	,,	,,	Kanpur	1965	
Kerosene	0.242	,,	,,	,,	1965	
H. S. D.	0.333	,,	,,	,,	1965	
Air action turbine Puel.	0 200	, ,,	,,	,,	1965	
TOTAL:	2 076					
Crude Oil	1.9	,,	Haldia	Barauni	Not fixed	

It was also clearly indicated by Bechtel International Corporation that as design and procurement were approaching completion and material deliveries were underway and change effecting designed facilities would be double cost of IRL and most certainly would effect the project schedule.

On 4th September 1964, the I.R.L. in their letter No. PL B 124-II, dated 4-9-64 intimated M/s. Snam Ltd. the quantities which they plan to move through the pipeline from Barauni to Haldia and Ba-

rauni to Kanpur and also the products and quantities to be off-loaded on the various offtake points en route. Snam was requested to work out the pumping schedules on the basis of the above information. The total offtakes in Barauni-Kanpur pipeline was indicated as approximately one million ton and in the Barauni-Haldia section it was shown as O.I.M.T.

On 18th September, 1964 a review of the design concepts to be embodied in the Barauni-Haldia section was conducted between I.O.C. Fertilizers Corporation, Snam Progetti and Bechtel and the results of the review were embodied in a note as under:

- 1. IOC on behalf of Fertilizer Corporation committed to deliver naphtha from Barauni to Durgapur starting in late 1967 at the rate of 15,000 tonnes per month maximum and or a total 175,000 tonnes per annum.
- 2. Snam Engineers investigated this particular condition and reported that up to 250,000 tonnes per annum of light products could be moved from Barauni to the Durgapur area at the same time 1,000,000 tonnes of crude was moved from Haldia to Barauni utilising a 30 days cycle.
- 3. I.O.C. confirmed that a delivery line from Baradabar to a point opposite Calcutta near Maurigram was definitely needed and Snam indicated that they were prepared to undertake detailed design and location of this lateral upon conclusion of an agreement with I.O.C. to the fee to be paid for this service.
- 4. I.O.C. confirmed that initial throughput in the Barauni-Haldia section would consist of 25,000 tonnes per annum of motor spirit from Barauni to Asansol and a further 103,000 tonnes to Maurigram. This would rise to 93,000 and 186,000 tonnes respectively thereafter. Naphtha movement when in initiated would be additional to this movement of motor spirit.
- 5. I.O.C. suggested the outside possibility of moving light products (i.e. motor spirit, naphtha etc.) from Barauni to Haldia for off-store delivery at some point in the future and that design concepts related thereto might want to be investigated at this time.

Bechtel in their letter No. 4415|FLC|677|341|688, dated 22.9.64 forwarded the minutes of the meeting indicated above to the General Manager with the following remarks:—

"We will appreciate you confirming the revised volumes as submitted in the attached review and returning same to us at the earliest so that the Engineers can prepare the final hydraulic gradients for the present planned facilities. We will also appreciate you forwarding to us as soon as possible the latest motor spirit throughput schedule beyond the initial phase through 1971. A copy of this letter to Snam Progetti in Delhi will be a request for them to confirm these volumes and submit any revisions or corrections to this office."

On 21st October, 1964 this was confirmed by I.O.C.

On 31st October, 1964 Bechtel Asian Corporation wrote to their California Office as under:—

"Reference is made to the letter from I.O.C. sent by Daulat Singh to Snam which requests certain works to be performed by them. I agree that the referred quantities of products to be moved are not the same as those originally furnished by them and used in designing the system. Snam Delhi has not objected to furnish the information requested by the owner even though it is probably outside the scope of their contract. It has been pointed out to I.O.C. management that at any time the type and quantity of product to be transported is changed a new programme for the handling of these products will be required.

gard to the operations and the desired quantities of products to be transported. It has been made quite clear to I.O.C. that the design of the pipeline has been finalised and there is only a limited amount of flexibility in the system."

26. Revised Design Concept of the H-B-K Pipeline Project

On 27th November 1964, nearly six months of the issue of the amendment to the main contract, Bechtel, intimated the I.R.L. the revised design concept of the Barauni-Kanpur and Barauni-Haldia system as under:—

'A' Barauni-Kanpur system

The volume for the Barauni-Kanpur system indicate that a total of four stations will be required in 1969. The system is presently being designed for 1,512,000 tonnes (1.5 million) per year which was previously forecast for 1971. This requires two stations only.

'B' Barauni Haldia system

It is not quite clear just what is now expected of the Barauni-Haldia portion of the system. Therefore we would like to make the following observation:

- (a) As now estimated, deliveries to Asansol, Maurigram and surplus motor spirit to Calcutta can be handled with the facilities as presently designed. This is based on the assumption that the products will be pumped in one direction only.....
- It would be possible to deliver 230,000 tonnes per year of light products from Barauni to Durgapur in addition to pumping 1,000,000 tonnes of crude oil from Haldia to Barauni on a 30 days cycle. This would, however, require a 94 percent load factor, which seems high considering the problems that might be anticipated in shipment in two directions. It is suggested that 90 per cent load factor be used to estimate the delivery capacities of the pipeline. Using this factor, only 1,50,000 tonnes per year of light products can be delivered in addition to the deliveries to Barauni..... unless you advise otherwise we will consider that the design of the system will be finalised on the following basis:

Primary (Normal) flow			
Barauni to Durgapur		Naphtha Light	175000 T/A
		Products	230000 ,,
Haldie ·	•	Motor Spirit	93000 ,,
Maurigram ·	•	**	184000 ,,
			682000 "
Emergency flow			
Barauni to Durgapur		Naphtha	15000 "
Haldia to Barauni		Crude oil	1000000 "
			1150000 "

27. Addendum to the Contract

On 15.12.1965 an addendum to the contract was made for including Branch line construction from Baradabar to Maurigram in the purview of the contract.

28. Conclusion

1. At the 40th meeting of the Board of Directors of the Indian Refineries Ltd. held on 15.3.63 (Agenda Item No. 164) it was decided that H.B.K. Pipeline will have the following capacities.

Barauni-Haldia Section

(i) Upto 3 million tonnes of crude oil when required. Ordinarily about 5,00,000 tonnes of products from Barauni to Calcutta and Calcutta to Barauni and westwards.

Barauni-Kanpur Section

(ii) Upto 1.7 million tonnes of products.

In the contract concluded subsequently with Saipem on 31st July 1963 no mention was however made as to the total quantity of products crude to be transported through the pipeline. However after the conclusion of the contract Snam Progetti gave a project design description dated 26.2.64 wherein the scope of the pipeline system was indicated as under:

Haldia-Baraun Section

Crude Oil: Haldia-Barauni · 2 Million tons per annum

3 Million tons for future expansion.

Products: Haldia-Barauni · 2,65,000 tons per annum

Barauni-Ru trani • 2,79,000 ,, ,, ,,

Barauni-Kanpur section

Product · 1.5 million tons p.a.

On 27th August 1964, the Bechtel International Corporation intimated the H.B.K. design concepts as under:

Haldia-Barauni: Crude Oil · 1.9 million tons.

Haldia-Barauni: Product · · · 2 · 7 ,, ,,

On 27th November, 1964 the revised design concept of the Barauni-Kanpur and Barauni-Haldia system was indicated by Bechtel as under:

Haldia-Barauni: Crude Oil . 1 Million ton

Product · · · · · · · · · · · Million ton

Barauni-Kanpur: Projucts · 1.5 Million tons.

In their letter dated 27.11.64 giving the revised design concept of the H.B.K. system, Bechtel clearly indicate that unless I.B.L. advise otherwise, the design of the system will be finalised as indicated above. No reply was apparently sent to Bechtel thereby in-

dicating that I.R.L. accepted the revised design concept given by Bechtel. If this stand is correct, the following capacities only:

Haldia-Barauni					Barauni- Kanpur			
Crude Oil		•	•		1 Million ton			
Products	•	•	•	•	0.6 Million ton	1.5 Million tors.		

The present installed capacity of the Haldia-Barauni section appears to be 1.8 million metric tonnes of crude (or 1.7 million tons) which is more than what was contemplated in the last design concept given by Bechtel in their letter of 27.11.1964 and apparently accepted by the Management.

In a recent D.O. Letter No. 15(9) 67-OR dated 3.4.67 from the Deputy Secretary, Min. of Petroleum & Chemicals to the Director-in-Charge it has been indicated that at present the need of the Haldia Barauni pipeline is only for one million tonnes of imported crude and not 2 or 3 million tonnes which was originally envisaged.

The pipeline now constructed, on the basis of the revised design concept given by Becthel in their letter dt. 27.11.64 will therefore be able to cater for the present day needs as indicated in the Ministry's letter dated 3.4.67 indicated above. As a matter of fact, the present installed capacity of Haldia-Barauni Section which is 1.8 million tonnes of crude, is more than the requirement indicated in the Ministry's letter.

The changes made in the line capacity from time to time after the conclusion of the contract do not appear to have the approval of the Board of Directors and decision apparently had been taken by the local management. However, the installed capacity of the line is more than what is now required by Govt. One point will however emerge for consideration on account of the change in the original design concept. If the rates in the original contract (as amended) with Saipem were based on a concept of pumping 2 million tonnes of crude through Haldia-Barauni section (the contract is silent on this point) any reduction now in the capacity will result in an unintended benefit to the contractor if the entire contract sum is paid to them. So far as the material is concerned it will not be difficult to ensure whether all the materials listed in the list of materials dt. 21.4.64 (which forms part of the contract through an amendment to Exhibit 'G') have been supplied in full by the contract as per the original specification. If there be any change in the materials supplied or in the specification on account of the reduction in the rated capacity of the Haldia-Barauni line, proportionate reduction in the cost will have to be made. So, far as the payment for work done

(Labour etc.) is concerned it is required to be examined by the Engineers whether on account of the reduction in the rated capacity of the line, there had been any unintended benefit to the contractor and if so necessary amendment to the contract reducing the lump sum rates may be necessary.

- 2. Amendment to Exhibit 'G' of the contract indicates that contractor will supply materials from foreign sources as listed in the list of materials dated 21.4.64. While Exhibit 'G' (list of materials) has been amended, Part III of the contract giving material specifications has not correspondingly been amended as a result the specifications provided for various items in part III of the contract do not agree with those indicated in list of materials which forms part of amended Exhibit 'G' Part III of the contract therefore requires suitable amendment.
- 3 The project design description dated 26.2.64 which also forms part of the contract apparently appears to be not complete and the Engineers may like to go into the details.
- 4 Sanction of the Government of India does not appear to exist for execution of the H.B.K. Project at a cost of approximately Rs. 26.42 crores. Sanction only exist for entrusting the work to Snam Saipem at a cost of Rs. 11.33 crores. In this connection paras 16 and 19 may please be seen.

Sd|- L. S. SUBRAMANIAN, Internal Audit Officer, Indian Oil Corporation Limited (Pipelines Division).

APPENDIX V

(Vide para 3.78)

Note dated 6-5-1967 of the Director-in-charge, Indian Oil Corporation Limited (Pipelines Division) re. Designed Capacity of HBK Pipelines (Agenda Item No. P|2 of 18.5.1967)

At the 40th meeting of the Board of Directors of the Indian Refineries Ltd. held on the 15th March, 1963, it was decided that the HBK Pipeline will have a capacity to pump three-million tonnes of crude oil per year from Haldia to Barauni. The 42nd meeting of the same Board held on the 5th July, 63 authorised the Managing Director to approach the Government for approval to the award of the contract of the pipeline to the ENI. The basic design concepts for the pipeline were discussed on our behalf by Bechtel with SNAM PROGETTI and in a letter dated July 13, 63 to IRL, Bechtel confirmed that ENI had been advised about the pumping of either two million tonnes or three million tonnes of crude oil from Haldia to Barauni depending on the number of pumping stations eventually to be decided. The number and capacity of the pumping stations was decided thereafter, it being settled that there will be a pumping station at Haldia with two engines of 370 H.P. each with a third one of identical power as stand-by, a booster station at Burdwan with one engine of 550 HP, a pumping station at Aasansol with two engines of 370 HP plus a stand-by of equal power. In the "Project Design Description" drawn up by SNAM Progetti on 26th February 1964 the same specifications were repeated with the statement that with these facilities the Haldia-Barauni pipeline will be to deliver two million tonnes of crude oil per year to Barauni. This specification was subsequently confirmed by SNAM Progetti in the engineering Drawing No. DIS-GB-0742 which was adopted as a hasis for the construction of the Haldia-Barauni pipeline.

2. A Committee of six engineers in the Pipelines Division was recently asked to examine these specifications in the light of the hydraulic gradient of the Haldia-Barauni pipeline, the specification of the pipe and the maximum pressure which can be built up by the pump installed. It was found that even with all the pumps at Haldia, Burdwan and Asansol working 24 hours a day for 335 days a year, it is not possible to deliver more than 1,774,800 metric tons of Kuwait type of crude to Barauni. If the crude is lighter (like Agha Jari) the quantity will be even smaller. However, it may be pointed out that it is not usual that all the pumps will work

all the time and according to SNAM's own design concepts, as followed in the pumping stations at Gauhati, Barauni and Mughalsarai, one pump at least is always kept as a stand-by and the station is assumed to work 800 hours per year. Therefore, under normal operating conditions, even with 335 X 24 hours pumping, when provision for stand-by pumps is kept as would be necessary at Haldia and Asansol, the quantity of crude that can be delivered at Barauni will be less than even 1½ million tonnes per year.

- 3. This discovery of the shortfall of line capacity means that SNAM Progetti has failed in more than one document forming part of their contractual obligations to make a correct statement of what the pipeline capacity is. Even Bechtel who was closely associated on our behalf in the examination of the design and engineering failed to notice this anomaly.
- 4. Government have been advised in general terms of the position already, and a further communication will be sent with full details.
 - 5. Subject to Board approval, it is proposed that:
 - (a) "Final Acceptance" of the Barauni-Haldia pipeline be withheld until SNAM gives us satisfaction on the point ("Final acceptance" of the Barauni-Kanpur section was given in August 1966);
 - (b) Further payments to SNAM be simultaneously withheld till the question be settled to our satisfaction; and
 - (c) A suitable compensation, say, 10 per cent of the total contract value, be demanded from SNAM as compensation.

Sd|- S. K. GUHA, Director-in-Charge May 16, 1967.

EXTRACT OF THE MINUTES OF THE BOARD MEETING HELD ON 18-5-1967

ITEM No. P|2 Designed Capacity of HBK Pipeline

The Director-in-Charge (Pipelines) explained the position. The Board approved that final acceptance of the Barauni-Haldia Pipeline be withheld till the matter is settled to our satisfaction. The Board also approved further payments to Messrs. Snam be withheld till the question is settled.

As regards compensation at the rate of 10 per cent of the total contract value, the Chairman suggested that the compensation should not be limited to 10 per cent, but should cover what may be involved in our not achieving full capacity including the cost of additional facilities to achieve the desired capacity.

APPENDIX VI

(Vide para 3.78)

Note, dated 25-1-1968 of Chairman, I.O.C. re Amendment of main contract with Snam-Saipems in July, 1964—Haldia,-Barauni-Kanpur Pipeline

AGENDA ITEM No. Imp-77 of 3-2-68 meeting.

A note dated the 13th June, 1967 on the above subject was circulated to the Board by the Director-in-Charge (Pipelines Division), the burden of which was that the amendment of July, 1964 to the main contract for the construction of H-B-K Pipeline reduce the scope of work of Snam-Saipems considerably, the net effect of carrying out that work under the direct responsibility of India Refineries Limited resulted in a substantial increase of the original estimate, the original design capacity of the line was changed without the proper sanction of the Board and in the result the Amendment appeared to have given considerable advantage to Snam-Saipems. The note concluded with a recommendation that the lists of materials and other documents be immediately examined by an independent agency in order to ascertain the extent of the excess. On a consideration of the aforementioned note, the Board at its meeting held on the 1st July, decided that the engineers of the Pipelines Division should prepare an inventory along with documents so as to verify if the equipment and material supplied by Snam-Saipems have been received both in regard to the quantity and quality or performance, associating, if necessary, the Accountants of the Pipelines Division. As regards the basis of the main contract with Snam-Saipems and the Amendment of July 1964 various aspects of the matter were discussed including the question of sanction of the Board of the Ministry. The Board, as such, decided that the Chairman may go into the entire matter and place his findings before the Board or the Ministry. The Board, as such decided that the Chairman may go into the entire matter and place his findings before the Board for further action.

D(P) was accordingly requested to furnish the relevant files, documents, etc. on the subject. Discussions were held with him also in July, 1967. As a result that it was necessary to certain the views of Shri M.V. Rao, who was the Financial Controller pertaining to that period in which the main contract of July, 1963 and the Amendment of July, 1964 were executed. On an examination of the relevant files Shri Rao prepared a note giving his views-copy enclosed as

Annexure-I. This note was sent to D(P) for comments, are contained in Annexure-II. Thereafter, the points made in both the notes were discussed by me with Shri Guha and Shri Rao at a meeting on the 29th December, 1967 with the help of available records and those points are dealt with in the following paragraphs.

- 3. The first question is whether the original contract envisaged any change in the lump-sum price or scope of work, which led to the execution of the Amendment of July, 1964. In this connection Exhibits 'B', 'C', 'D' and 'G' indicating the description of various jobs and lump-sum prices thereof of the original contract were mentioned in discussions. For example, Exhibit 'B' stipulates that "In the event of pumping stations capacity and facilities being varied hereafter the parties will renegotiate for the fixation of appropriate revised prices". Exhibit 'C' also makes exactly a similar stipulation. Exhibit 'D' relating to Tank From construction anticipates adjustments in the rates and lump-sum prices should the proportion between the floating roof and the fixed roof tanks change, etc. These stipulations indicate that there were provisions for modifications if circumstances necessitated the same.
- 4. A related question in connection with the above was whether the extension of time allowed in the Amendment was justified or not. For the sake of clarify a comparision of the time schedules as in the original contract and as in the Amendment are indicated below:—

Haidia-Barauni line

 Original contract
 Amendment

 From 1-11-63 to 3c-6-64
 From 1-3-64 to 28-2-65

(There is no change in the case of Barauni-Kanpur Line). above dates indicate that the next extension of time is 4 months only after allowing for the postponment of start-up by 4 months. Under the contract, it was the responsibility of the I.O.C. to procure pipes, to do land acquisition, secure various permits, etc. These responsibilities were time-consuming. The Rourkela Steel Plant capacity was fully booked and, therefore, 40,000 tonnes had to be imported from Japan and about 15,000 tonnes subsequently ordered on Rourkela. Similarly the pipeline route covering a distance of about 750 miles had to be progressively acquired in time. quence of failure in the timely availability of any of these two items, would have resulted in downtime payment to Snam-Saipem. Although no reasons are given for extension of time in the available records in the Pipelines Division, in retrospect, one has to consider if it really gave any special benefit to the contractor especially as the lengthening of the period of construction usually results in higher over-heads and other costs to the Contractor. On the other hand, if the Contractor had mustered more man-power and equipment in order to complete the work within the original time schedule, the IOC would have perhaps been in a more vulnerable situation in having to discharge contractual responsibilities in time.

5. Mainline Construction—Exhibit 'A'

Owing to the reduction in the scope of work under this item, the lump-sum price in the original contract worked out at specified rates, was reduced by 3,15,270 and \$ 40,595. On the completion of the line, Snam claimed an extra amount of Rs. 16.73 lakhs on account of the increase in length of the rail bridge crossings over the length mentioned in the original contract. LO.C. have hold the view that the quantity mentioned in the original contract was a typographical mistake and, therefore, their claim is unjustified. This matter has been dealt with separately by the sub-Committee of Directors consisting of the Chairman, Shri M.V. Rajwade, Shri R. S. Gupta and Shri S. K. Guha whose report is under submission to the Board.

6. Erection of Pump Stations and Terminale—Exhibit 'B'

The position with regard to pumping stations, delivery facilities in the original contract and in the Amendment of July, 1964 is indicated below:

Facility								Original Contract	Amend- ment of July, 1964
Crude Oil Pump folds	_		th in	let and	d outl	et ma	ni-	6	
Product Pumpin	g Sta	ations	•	•	•	•	٠	8	5
Terminale	•		•	•	•		•	2	1
Delivery Points	•		•	•	•	•	•	•	. 3
Booster No. II	for C	Crude p	ump	oicg	•	•	•	• •	. 1

Exhibit 'B' of the original contract includes the lump-sum prices of erection of products pump stations and terminale only at a price of Rs. 24,43,593 plus \$344,834. There is no mention of the crude oil pumping sets in Exhibit 'B' as these sets were to be skid mounted for mobility sake and, therefore, not required for erection. However, Exhibit 'G' representing the list of materials and prices to be supplied by Snam-Saipems includes 6 Nos. of Pumping Sets for crude oil at a price of Rs. 2,88,000.00 plus \$. 1,008,404.00. The price mentioned in the Amendment of July, 1964 for the reduced

facilities is Rs. 19.71 lakhs plus \$. 293,500. In other words, there is a total reduction of Rs. 4,72,593 plus \$ 121,334 on erection work. The price of 6 Nos, of Crude Oil Pumping Sets is not included in the Amendment under revised Exhibit 'G' which replaces Exhibit 'G' in the original contract, which implies that I.O.C. are not these sets. The question, therefore, is whether the reduction in prices as indicated above is commensurate with the reduced erection work included in the Amendment. matter on which it is extremely difficult to pass any judgement at this point of time. The decision at that time was apparently guided by the categorical advice given by Bechtel in writing to the effect that they had made a thorough review of the actual erection cost and considered the price finally agreed as reasonable. It has to be appreciated that Bechtels were appointed as the I.R.L.'s Manager Agents to deal with certain aspects of the design of the pipeline system prepared by Snam-Progetti with a view to effecting economy in project cost and to supervise the construction jobs of the pipeline and as such the Management had to rely on their judgement. In case, however, the Board desire to go into this matter further, it will have to be a very exhaustive exercise to be undertaken by the Senior Engineers and Accountants.

7. Civil Industrial Works in Pump Station-Exhibit 'C'

The civil engineering industrial work included in the original contract is related to the pumping and terminal facilities discussed in the preceding paragraph. The original contract provides for a lump sum price of Rs. 40.80 lakhs (including \$42,750 in foreign exchange). The Amendment of July, 1964 excluded all the civil industrial work in pump stations, etc. but Snam Saipems was made responsible for securing contracts and for supervision at a fee of Rs. 3 lakhs (including \$30,000 in foreign exchange). The eventual value of the contracts for all the civil works, as indicated in the note of D(P), came to Rs. 42.42 lakhs which, together with the fee of Rs. 3 lakhs, made a total of 45.42 lakhs resulting in an excess expenditure of Rs. lakhs. Exhibit 'C' of the original contract, however, stipulated that "in the event of pumping stations being varied hereafter the parties will renegotiate for the fixation of the appropriate revised prices" Therefore, one may as well take the view that by the time the Amendment of July, 1964 was signed, it should have been possible to renegotiate for the prices of the work-load imposed on Snam Saipems. However, in order to reach a firm conclusion whether the exclusion of civil industrial work in pumping stations from Snam's responsibility worked out to the disadvantage of the IOC needs a very exhaustive comparison of the items and extent of work contemplated in the original contract and the work actually executed by the IOC under the supervision of Snam. This comparison could best be made only with the detailed working drawings of all civil engineering works at pumping stations, if they were at all available at that time. Therefore, here again the considerations advanced in the preceding paragraph equally apply in this case. It has, however, to be kept in view that all contracts for these jobs were approved by IOC (I.R.L.) before acceptance.

8. Tank Farm Construction-Exhibit 'D'

Exhibit 'D' of the original contract provided for the construction of tank farms of a total capacity of 2,20,850 M³ within a lump sum price of Rs. 182.35 lakhs worked out at the rates specified therein, namely, at Rs. 90 cu.m. and Rs. 77 cu.m. (excluding foreign materials) for floating roof tanks and fixed roof tanks and in the assumed of 45 per cent and 55 per cent respectively. The Amendment of July, 1964 however, excluded this work Snam's responsibility—they being made responsible supervision and procurement of contract floating roof and 29, 125 cu.m. 29:125 cu.m. for respect of cone roof tanks for Haldia Pumping Station at a price of Rs. 50000 plus \$ 10,500. The original contract also provided for the prices and rates being changed proportionately, if the proporation between the fixed roof tanks and floating roof tanks changed. against this, D(P)'s original note of June, 1967 states that the Marketing Division had to spend Rs. 145.55 lakhs for a capacity of 1.25.650 M8. At the time the original contract was executed the extent of tankage required at various delivery point had not exactly been worked out. In fact, there appeared to be some rethinking in this matter, as could be seen from the fact that the original contract provided for a total tankage of 54,250 M3 for the entire Haldia-Barauni line while at the time of amendment a mention of 52,250 M³ tankage is being mentioned for erection at Haldia alone. (Half floating roof and half cone roof). Tankage at other points would have been in addition. Further more, the proportion between the fixed roof tanks and the floating roof tankage at other points would have been in addition. Further move, the proportion between the fixed roof tanks and the floating roof tank alongwith the specifications and also other facilities have to be kept in mind when making a comparison of costs.

9. Supply of materials—Exhibit 'G'

The Exhibit 'G' to the original contract provided for the supply of materials by Snam-Saipems to the value of Rs. 30,55,744 plus \$ 61,48,188. The Amendment reduced the supply of materials and, therefore the cost thereof to Rs. 29,39,167 plus \$ 44,10,513 resulting in a saving of Rs. 1,16,577 plus \$ 17,37,675. The point raised in D (P7's note of 13th June, 1967 is that some of the facilities eliminated under the Amendment will have to be installed for efficient operation of the line. It is yet to be seen what facilities omitted earlier have been

considered necessary and the Board can take a view only when the proposals in regard to them are received. The emphasis at that time appeared to be to reduce costs to the extent possible.

10. Procurement Services-Exhibit 'H'

Under the original contract Snam-Saipems was to receive Rs. 1,46,688 plus \$11,200 for procurement service of various materials. The Amendment increased these fees to Rs. 1,57,080 plus \$11,920 on account of the addition of cement and tank materials (like steel plates, etc.). This matter has already been discussed separately with Snam-Saipems in connection with the over-all payments due to them. Snam Saipems have agreed to afford credit to I.O.C. on account of procurement services for cement and steel under a pre-charge settlement.

11. Progress Schedule-Exhibit 'I'

This matter has been dealt with under para-4 above.

12. Para 3 of D(P)'s note, dated 13th June, 1967

This para reads as under: -

"The amendments redefined the scope of work to be performed by the contractors, Messrs. SNAM-Saipem. The materials to be supplied by them were also redefined and reduced from the quantities originally agreed upon. The amendment also specifically excluded crude unloading facilities at Haldia from the responsibilities of the Contractor. Finally the amendment specified Messrs. Bechtel as the Owner's representative in the following terms:—

The duties of Bechtel Asian Corporation within the scope of Contractor are as follows:

In all matters pertaining to the Contract documents and construction of the pipeline system Indian Refineries will act by and through Bechtel and be represented for all purposes of the contract by Bechtel Asian Corporation Limited as Manager, Agent and representative of Indian Refineries Limited".

The question of redefining the scope of work and the materials to be supplied by Snam-Saipems have already been dealt with in the foregoing paragraphs. As regards the statement that the Amendment also specifically excluded crude unloading facilities at Haldia from the responsibilities of the contractor, a reference to para 2(c) of the General conditions of the original contract stipulates that he following is specifically excluded from he contract:—

- (a) * * (b) * *
- (c) Sea Terminal at Haldia
- (d) * *

Nowhere else in the original contract have the crude unloading facilities been spelt out and the Amendment has merely reiterated that these facilities will not be carried out by Snam-Saipems.

As regards the Bechtel's responsibilities and powers as defined in the Amendment, it is a matter of fact. The question whether these powers were necessary or liberal has to be viewed in the context of the I.R.L.'s organisation and capacity at that time to deal with a Project of this complexity and magnitude and Bechtel's performance in the case of Gauhati-Siliguri Pipeline contract. It is needed difficult to judge this question at this point of time.

13. Conclusion and Procedural aspects

In the absence of a full record giving pros and cons relating to the Amendment one can now only deduce the reasons from a study of facts. Shri M. V. Rao, who was the Financial Controller at that time, has expressed the view that the intention of the Amendment was to put the original contract on a firm and operative basis both with regard to the facilities required as well as the schedule of construction. Emphasis was also laid on effecting maximum economics, more particularly in the foreign exchange expenditure. It is also not an unusual feature to introduce amendments in major contracts of this nature in the course of implementation especially when the precise scope and extent of the work were matters of some uncertainty originally.

The question whether the Board's or Government's approval to the Amendment or a mere report to higher authorities about this event would have been necessary is again a matter about which different views can be taken in the light of the facts alluded to in the following sub-paragraphs.

At its meeting held on the 5th July, 1963, the then Managing Director reported to the Board that Government had advised that negotiations for executing the project may be undertaken with E.N.I. with the assistance of Bechtel Asian Corporation to advise on certain doubtful points of designs and specifications. As a result of a series of discussions held with E.N.I. and Bechtel, the previous estimate of Rs. 29 crores had been brought down to about Rs. 26 crores. He, therefore, proposed to award a turn-key contract to E.N.I. at a total cost of Rs. 13.4 crores which included the supply of all the materials and equipment required for the pumping stations, etc., but excluded the cost of the pipes and the tele-communications system. In the circumstances, the Board authorised the Managing Director to approach the Government for approval to the award of the contract.

Accordingly, in his letter dated the 6th July, 1963, addressed to the Government, the Managing Director explained in detail the scope of work, supplies and services to be performed by Snam-Saipem at total cost of Rs. 13.43 crores, including foreign exchange of Rs. 6.21 crores. The details of the scope of work as advised to

Government are contained in Annexure-III to this note for purposes of comparison with the modifications incorporated in Amendment of July, 1964. The letter also mentions that "as regards pump station requirements, it has been agreed with Saipem that any modifications made hereafter will be followed by a refixation of contract costs, which are at present based on Snam Progetti's proposals". In the case of tank farm, the letter mentions that "The possibilities of a further reduction is under examination and in the event of I.R.L. deciding on a further curtailment, the negotiated contract price will also be reduced proportionately". The letter further states that "In regard to any matter of design and specifications, which are currently under re-examination a change in the agreed values of the work to be done will be made, should the scope of work as presently defined be altered. This is with reference to tank farm and pumping stations, in particular". The aforementioned quotations provide a good indication of the changes contemplated in the scope of work and the contract of 31st July, 1963 was executed with Snam-Saipems with Government's approval, in the background of the changes contemplated. The Amendment of July, 1964 modified the scope of work, etc., and reduced the value of the original contract, more particularly in foreign exchange. Therefore, one may as well take the view that no fresh approval of the Government was necessary especially as the Amendment of July, 1964 did not result in an upward revision of the value of the Contract as approved by the Government following the specific authorisation given by the Board to the Managing Director. Notwithstanding the abovementioned view, a letter No. A (14-39) /64, dated 28th September, 1964 (i.e., 2 months after the Amendment of July, 1964) was addressed to Government stating that "In view of some changes on the scope of various construction and import of materials in respect of the above-mentioned contract, an Amendment was carried out after mutual negotiation with Messrs. Snam Ltd." and therefore approval was sought to the issue of an Amendment to the Government's earlier guarantee to the reduced foreign exchange. Government immediately gave its approval without questioning the propriety of the Amendment of July, 1964 presumably on account of the fact that such changes were already mentioned in the Managing Director's letter of 6th July, 1963. It is again a question of one's judgement whether a full scale reference to Government should have been made or if what was done was adequate. Insofar as the remission of this matter to the Board is concerned, it seems that no reference has been made to the Board ever since it authorised the Managing Director to approach the Government for award of the contract to Snam at its meeting held on the 5th July, 1963.

The above report is submitted to the Board for consideration.

NEW DELHI; Sd/- N. K. KASHYAP,

Dated 25th January, 1968.

Chairman.

APPENDIX VII

(Vide para 3.78)

Note of the Sub-Committee of Directors, I.O.C. re. Pumping capacity of Haldia-Barauni Pipeline and payment of outstanding claims to Snam:

(Agenda Item No. P/45)

On a consideration of a note submitted by the Director-in-Charge, I.O.C. (Pipelines Division) on the subject of "Review of payments to Snam Limited", the Board decided at its meeting held on the 27th November, 1967 that no payments should be made to Snam Limited for the time being and constituted a Sub-Committee of Directors consisting of the Chairman, Sarvashri S. K. Guha, M. V. Rajwade and R. S. Gupta for:—

- (i) a detailed study of the pipeline capacity and report to the Board; and
- (ii) holding discussions without delay with Messrs Snam and others and to take action thereafter in the matter at their discretion.

The Sub-Committee after examining the records, held several meetings between the 18th and 23rd December, 1967 and the 12th to 24th January 1968 with the delegation of E.N.I. led by Dr. Gasparini and with the representative of Bechtel Mr. H. M. McCamish from the 12th—18th January 1968. The report of the Sub-Committee of Directors is, therefore, being submitted in two parts (Annexure-I and II) in pursuance of the resolution reproduced above.

Sd/- N. N. KASHYAP,

NEW DELHI;

Chairman.

The 25th January, 1968.

Annexure-1

PART I

Report of the Sub-Committee of the Board on the subject of "Pumping Capacity of Haldia-Barauni Pipeline".

By their letters dated the 17th and 12th October, 1961 the Ministry of Steel, Mines and Fuel entrusted the project for the Barauni-Delhi and Barauni-Calcutta product pipelines to Indian

Refineries Limited and for the preparation of the project report and tender documents for the above pipeline to Messrs Snam Progetti respectively. As a result the Managing Director of Indian Refineries Limited initiated discussions regarding the requirement of pipes as well as the pattern of movement of different products through the proposed pipeline. On the 24th August, 1962 the Managing Director informed the Board that Messrs Snam Progetti had recommended two product pipelines, namely, one 8" line for movement of products from Barauni to Rudrani (70 miles from Calcutta) and other 8" line from Budge Budge to Asansol for movement of imported products. On the 20th October, 1962, the Board of Directors took note of the information that a 10" line between Calcutta and Barauni and a 12" line between Barauni and Kanpur would cost about Rs. 25 crores with provision of two-way flow between Barauni and Calcutta. The Board authorised the Managing Director to negotiate with E.N.I. for the construction of the work. However, in a subsequent meeting of the Board of Directors on the 29th November, 1962 it was stated that as a result of the emergency, Government had decided that the Barauni-Calcutta and the Barauni-Kanpur pipelines projects should be held in abeyance.

2. On the 28th January, 1963 the Board of the I.R.L. was informed that on a reappraisal of the oil position on account of 'Emergency", Government have decided that the Barauni Refinery should be expanded to a capacity of 3 million tonnes per year and that an oil pipeline from Haldia/Calcutta to Barauni should be constructed for transport of crude oil to that refinery. The Board approved that the pipeline from Haldia to Barauni for transportation of three million tonnes of crude oil per annum should be a dual purpose pipeline so as to serve the purpose of product movement also, if necessary. At the Board meeting held on the 15th March, 1963 the Board noted that a recommendation had been made to Government that alongside the Haldia-Barauni Pipeline, a pipeline from Barauni to Kanpur should also be taken up for construction and that Government appeared to be in agreement with this view. On this basis, the Board was informed that the total pipeline system would be capable of transporting the following products:-

Haldia-Barauni section—3 million tonnes of crude oil when required; ordinarily about 500,000 tonnes of products.

Barauni-Kanpur section-1.7 million tonnes of products.

3. Finally the Board considered the matter again on the 5th July, 1963 when it was informed that the previous estimate for the Haldia-Barauni-Kanpur pipeline system of Rs. 23 crores had been brought down to Rs. 26 crores. The Board agreed that a contract be awarded to E.N.I. for the construction of the pipeline and authorised the Managing Director to approach the Government for obtaining the

approval. The construct on contract with Snam Saipems was signed on 31st July, 1963 while contracts with Bechtel International Limited and Bechtel International Corporation were signed in February/March, 1964 with the dateline of 1st September, 1963 and another with the Bechtel Asian Corporation on the 21st June, 1964 after obtaining necessary approvals from the Government. The Board of Directors of I.R.L. did not have any opportunity to discuss this question of capacity and other related issues regarding H-B-K pipeline after this meeting.

The construction contract signed with Snam Saipem on 31st July, 1963 did not mention the quantities of various products or crude oil to be transported through the pipeline in the preamble. However, on page-1 of Part-III "Job Description-Construction specifications-Exhibits" of the same contract it is mentioned that the quantities of products and of crude oil to be carried by this system are shown in the Enclosure-18. This document, however, is not available in the records of the Pipeline Division. However, on page 2 of the Job Description referred to above it is mentioned that the scope of Haldia-Barauni pipeline was to transport—(a) motor spirit from Barauni to Rudrani (b) kerosene from Haldia to Barauni and (c) crude oil (light Iranian) from Haldia to Barauni. This document also mentions that for (c) above, 9 Nos. of crude oil pumping sets, in order to run the line in full capacity are to be provided along the line at suitable places and where necessary inlet and outlet manifolds should be installed so that the pumping sets could be installed in case of necessity. It was further stated that among the materials to be supplied by Snam Saipem there would be mounted" pumping sets for crude oil.

4. It may be pertinent to mention here that the above contract was on the basis of detailed discussions held between Snam and Bechtels at Milan in June, 1963. In these discussions the Managing Director, I.R.L. also participated part time. Subsequently a cable was received on 24th June, 1963 from Snam Saipem seeking certain clarifications with regard to the line of approach to be adopted about the designs of Snam Progetti (who were entrusted with the preparation of the project design), vis-a-vis Bechtels' concepts about the designs. To this a reply was sent on 5th June, 1963 by the Managing Director indicating that "we desire adoption Bechtels' concepts agreed by you. In event of disagreement matter may be referred to us for deciding further action". A further cable to Snam Progetti was addressed by the Managing Director on 1st July, 1963 stating that "Understand from Bechtel discussion held last week Milan regarding design concept Barauni Pipelines. In view necessity urgent decision, grateful if you will send us written report on subject and give copy simultaneously Bechtel representative for his comments to us under advice to you. Please give Bechtel copy of this telegram". Accordingly, a letter was addressed by Snam to

I.R.L. on 4th July, 1963 with copy to Bechtel indicating the compromise formula reached as a result of joint discussion between Bechtel and Snam on the design concepts to be adopted for this pipeline. In that letter Snam clarified that "our criteria of calculation are more conservative than Bechtels this is the usual European practice and we do not see any reason as to why a different safety factor for India". The letter further stated that "We fully accept, however, that sacrificing safety factor and flexibility of operations to the economic factors Bechtels' concepts are valid and technically sound..." Similarly, Bechtel Corporation in their letter dated the 13th July, 1963 addressed to I.R.L. reiterated the compromise formula indicated in Snam's letter of 4th July, 1963 and confirming that there are no technical differences in Bechtels' designs and Snam's revised designs of 4th July, 1963. The letter further stated that "the basic decision reserved for I.R.L. is the judgment of the economic value of the additional safety factor and flexibility proposed by Snam". The compromise design indicated, amongst other things, the throughputs of crude oil at 3 million tonnes per year and 2 million tonnes per year with an installed H.P. at pumping stations of 8300 HP and 3000 HP respectively. The construction contract of 31st July, 1963 however, included, amongst others, the supply of 6 mobile pumping sets of 1500 HP each or a total of 9000 HP. This was, however, changed to 3000 HP in the Amendment of 31st July, 1964 to the construction contract in order to cater to 2 million tonne capacity only crude oil. As against this, the installed HP for crude oil movement is 2760 HP.

- 5. The foregoing indicates that the quantity of crude oil to be transported from Haldia to Barauni was all along assumed to be 3 million tonnes per year upto the signing of the contract of 31st July, 1963. However, in the documentation thereafter, 2 million tonne is assumed as the capacity required immediately and becomes the basis for designs etc. While 3 million tonne was indicated as a future target. The Amendment of July 1964 takes 2 million tonne as the basis of designs and the construction of the pumping stations. The line diameter was, however, on the basis of 3 million tonne capacity. As stated earlier, at no time after July 1963 the Board had the opportunity to discuss this matter nor was any information sent to the Government of India regarding these changes.
- 6. At the meeting of the Board of Directors held on the 1st July, 1967 it was reported that the actual capacity installed on the Haldia-Barauni pipeline is only about 1.5 million tonnes of crude oil. The Sub-Committee decided to discuss this aspect with M|s Snam and M|s. Bechtel as to how there was a shortfall in the capacity even from 2 million tonnes per year. Then a delegation of representatives of E.N.I. Group headed by Dr. C. Gaspirini including several of the designers and engineers, who were associated from the beginning in the design and construction of the pipeline arrived for dis-

cussion on the 18th December, 1967. Several meetings were held by the Sub-Committee with this Group jointly and somtime singly between the 18th and 23rd December, 1967. The decisions taken by the E.N.I. Group in brief can be summarised as follows:—

- (i) The basic decisions regarding design of the pipeline were taken by Bechtel acting on behalf of I.R.L., who had specifically asked Snam in June 1963 to follow the instructions of Bechtel.
- (ii) From the beginning, it was the understanding that the capacity for transport of crude oil was to be utilised under emergency conditions by which it was the understanding of the E.N.I. that crude oil would be transported only occasionally which meant short periods and it was not necessary to provide for the transportation of a given quantity of crude oil in course of a full normal year's operations.
- (iii) That all basic decisions regarding the design concept were based on certain discussions held in Milan in June 1963 in the presence of the Managing Director of India Refineries Limited who was accompanied by representatives of Bechtel Corporation and that all basic decisions were taken with the full knowledge of the I.R.L. management.
- 7. At this stage, the Sub-Committee felt it necessary to send for a representative of the Bechtel Corporation in order to ascertain what exactly were the instructions given, on the one hand by I.R.L. to Bechtel and on the other by Bechtel to E.N.I. A cable was sent to Bechtel on the 23rd December and a representative of Bechtel finally arrived on the 12th January, 1968 after arrangements had been made to make a deposit of Rs. 20,000. Bechtel representative left on 18th January, 1968.
- 8. At these discussions, the Bechtel representative stated that the provision to carry two million tonnes of crude oil per annum was conceived as an "Emergency" operation which in the "normal engineering terminology" (as understood by Bechtel) meant its operation for a short period only. On that basis a certain load factor was established and I.R.L. were advised by Bechtel in their letter of 13th July, 1963 about the compromise reached between Bechtel and Snam which ultimately formed the basis of the contract concluded on 31st July, 1963. There were several discussions thereafter about the load factor, hydraulic gradient, wall thickness, pumping stations, etc., about which Bechtel as Consultant-Managers kept the I.R.L. duly informed of all these discussions. The Bechtel representative also stated that the primary responsibility for design and engineering was that of Snam Progetti, and Bechtel's role was only to advise I.R.L. on these matters without assuming the responsibility for final decisions.

- 9. The issues which came up in course of discussion with the E.N.I. delegation and the Bechtel representative were covered again in several joint meetings and in separate meetings of the Sub-committee. In course of these meetings it was established beyond doubt that there is a fundamental difference of approach between the understanding of "Emergency" on the part of the Government of India and IRL-IOC on the one side and that of E.N.I. and Bechtel on the other. It is clear that by emergency it is meant in India a state of affairs in which the Barauni Refinery has to be operated on full through-put with imported crude oil as opposed to crude oil brought from indigenous fields; and under these conditions no one knows how long it may be necessary to operate. On the other hand both E.N.I. and Bechtel maintained that their understanding of the "Emergency" all along was a short period and occasional operation only under emergency conditions. In other words, there is an indirect admission by E.N.I. and Bechtel that under normal conditions of operation, with adequate provision for maintenance, shut-downs due to various causes and normal safety factors as used elsewhere, it would not be possible to transport two million tonnes of crude oil through the pipeline. It can also be stated that these conditions, namely maintenance requirements, provision for shut-down and safety factors used on the other pipelines built in India by E.N.I., (and in one case designed by Bechtel), provided for certain norms like 760 hours of shut-down annually, provision of a spare pumping set in each station and operating within certain pressure limits on grounds of safety. These factors, on the admission of both E.N.I. and Bechtel, are completely absent in the case of Haldia-Barauni pipeline in terms of transporting even 1.94 million tonnes of Kuwait crude oil which it can do today if all the pumps are operated all the vear round.
- 10. In the face of this deadlock in the discussions with E.N.I. and Bechtel, the Sub-Committee of Directors has considered the possibility of seeking remedy as open to it under the respective contracts. In this matter the following difficulties have been encountered:
 - (i) As regards the relative responsibility in the matter of design as between E.N.I., Bechtel and I.R.L., the position is as follows:
 - E.N.I. maintain that with the appointment of Bechtel to review and monitor designs the final responsibility is no longer with them. Bechtel, however, states that the primary responsibility for engineering design is that of Snam Progetti even though they may have suggested certain modifications. Bechtel contract states that:
 - "BIC shall perform on behalf of and to the extent authorised by Owner, directly or through technical personnel in the regular established offices and field offices of its affiliated companies in the United States of

America technical consulting services and assistance in connection with performance under the Snam contracts of engineering design and procurement for the HBK Project. Such services will include review of design concepts and progress, monitoring of procurement procedures and progress and services necessary in the planning and coordination of the Project"....

- "Under the Snam Contracts, primary responsibility for engineering design, material procurement, construction, completion and start up of the HBK project is that of Snam Progetti or Snam Saipem, Bechtel having no such responsibility except as expressly provided herein."
- In so far as the I.R.L. is concerned, complete reliance was placed on Bechtel in the matter of design and other technical matters as they were the advisers, consultants and Project Managers. Bechtel claimed that at every step I.R.L.'s approval was obtained.
- (ii) The basic design decisions, namely capacity, safety factors, etc., are alleged by both Bechtel and E.N.I. to have been taken with the full knowledge of the I.R.L. management in 1963. Documentation in this case has been studied and it reveals that the compromise formula jointly recommended by Bechtel|Snam and to which I.R.L.'s approval was obtained provided for a safety factor of 1.76 whereas the final design secures a through-put of 1.94 million tonnes of Kuwait crude on a lower safety factor of 1.54 (and operation round the clock throughout the year). However, in the amendment made in the Agreement in July, 1964 safety factor is not mentioned but the calculations are on the basis of 1.54 safety factor. Snam have also produced a letter dated 26th September, 1963 from Bechtel to I.R.L. pointing out that the selection of this location (i.e. the location of the Asansol Pump Station) however, cause a decrease of 195,000 metric tonne per year in the actual maximum capacity obtainable from the presently proposed facilities of 1,900,000 metric tonnes per year. It, however, appears that at no stage Bechtel or Snam advised I.R.L. in writing about their concept of "Emergency."
- (iii) The fact remains that Bechtel were introduced to E.N.I., the spokesman of I.R.L. in matters of design. However, in the contracts with Bechtel for the consultancy-management services for this pipeline, there is no provision for any penalty in case of any default on their part. There is, however provision for arbitration in London under the

- the London Chamber of Commerce. Furthermore, Bechtels appear to have covered themselves in the matter of all suplementary contract documents advising I.R.L. in writing of the action they were taking.
- (iv) The primary design was done by Snam Progetti of the E.N.I. Group by an agreement arrived at through an exchange of leters in November, 1961. This document also does not provide for any penalty for any lapse by Snam Progetti or for arbitration. In vew of the above difficulties, it is for consideration whether a recourse to arbitration will yield the desired results.
- 11. The question regarding the remedial measures which may correct the deficiency has also been discussed in passing with the E.N.I. delegation and the Bechtel representative. They have claimed that the deficiency (in terms of 2 million tonnes of capacity) can be made good at little cost, and the Bechtel representative has casually mentioned a figure of \$200,000. The problem has been studied very quickly by the engineers of the Pipelines Division and they report the following:
 - (a) With the presently installed capacity and within the to pump annually 1:709 million tonnes of Light Iranian to pump annually 1.709 million tonnes of Light Iranian crude annually with 8,000 operating hours. Should, however, the calculation be made without the normal 760 hours of shut-down in a year, the figure will increase to 1.870 million tonnes.
 - (b) The deficiency can be made good and the transport of 2 million tonnes of Light Iranian crude oil ensured by the following measures, under normal operating conditions and normal safety factors:
 - (i) Establishment of two new pumping stations at locations between Haldia and Baradabar on one side, and between Asansol and Barauni on the other;
 - (ii) Provision of standby mainline engine and pumps at Haldia and Burdwan.
 - (iii) Certain readjustments in the location of pumping capacity as between Haldia and Asansol.
 - The cost of the above modifications has to be estimated carefully, but prima facie it can be stated that this will be in excess of \$200,000 mentioned by Bechtel. All pumping units will have to be imported.
- 12. Since both the sides could not agree as to the responsibility for making up the deficiency in the design, Snam, who had earlier insisted on IOC dropping this issue, agreed to delink it from the

package deal, as contained in Part-II of the Sub-Committee's report so as to have further time to prove their stand. In the meantime IOC can further go into its own documents and obtain expert and legal advice. This will also enable the rectification of the corrosion in line in Haldia area in time.

(Sd./- N. N. Kashyap) (Sd./- M. V. Rajwade):
Chairman Director
(Sd./- R. S. Gupta) (Sd.|- S. K. Guha):
Director Director

P.S.—This Report was approved by the Sub-Committee of Directors consisting of the Chairman, Shri M. V. Rajwade and Shri S. K. Guha at its meeting held on the 25th January, 1968. Shri R. S. Gupta, who is also a Member of this Sub-Committee, could not, however, be present at this meeting owing to previous engagement elsewhere. This Report, however, has been subsequently seen and signed by him.

NEW DELHI;

The 25th January, 1968.

APPENDIX VIII

(Vide para 7.7)

Copy of Ministry of Petroleum & Chemicals letter No. 31|62|63-ONG dated 8th April, 1964, from Shri B. Subba Rao, Under Secretary, addressed to the Secretary to the Govt. of West Bengal Commerce and Industries Development, Calcutta, regarding laying of the Haldia-Barauni pipeline through Ranigang Coalfield.

I am directed to refer to your letter No. 3174-Mines dated the 20th September, 1963 in which you have forwarded a letter from the Mining Adviser to the Government of West Bengal to the Competent Authority, enumerating certain objections to the laying of petroleum pipelines on Raniganj Coalfield.

- 2. These technical objections have been carefully considered by our pipeline experts who are satisfied that there is no danger to the pipeline even if it is laid in the coal bearing area where the first working has been done and where coal is standing on pillars. Some subsidence may, of course, occur as a result of depollaring operations, but the pipeline will be able to adjust itself to the subsidence that normally occurs in such areas. These experts are also pipe rupture arising on this account and causing any damage to the coalfields.
- 3. In view of the above, there need be no apprehension in any quarter regarding the safety of coal mines as a result of laying of the petroleum pipeline. However, if any safety or protective measures are required for the safety of the pipeline, the same will be adequately provided for at the cost of the pipeline authority. The same authority shall also make provisions for such measures as may be necessary to prevent the pipeline from causing fire or other damage to the coal properties over which it passes. Incidentally, you may kindly refer to the discussions which Shri M. Gopal Menon, General Manager, Pipelines Project, had with the Secretary to the West Bengal Government, Commerce and Industries Department on the 17th December, 1963 when the Mining Adviser to the State Government was also present. It is learnt that the State Government, were satisfied regarding the explanations given to them.
- 4. In the circumstances explained above the competent authority has been instructed to proceed expeditiously with the acquisition of right of user in the land. This letter issues with the concurrence of

the Department of Mines & Metals, Ministry of Steel Mines and Heavy Engineering.

Copy to:-

- M/s. Bechtel Asian Corporation Ltd., New Delhi (Attention: Mr. H. M. McCamish).
- 2. M/s. Bechtel Asian Corporation (Att: Mr. Hoeffort), Calcutta.

APPENDIX IX

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(Vide para 7.22)

Findings of the Investigating Committee

CONCLUSION

Considering all aspects of the problem the Committee has come to the conclusion that laying of the pipeline in the present alignment through the coal field area has not been a happy choice. In its wake it has brought up a number of problems which have to be faced by Indian Oil Corporation throughout the life of the pipeline at a heavy recurring cost. It will have to maintain a constant vigilance over the pipeline with a special squad sufficiently equipped with and materials for the purpose. Even then Indian Oil Corporation would not at any time be free from constant anxiety regarding their pipeline and the fear of affecting the mines. However, in view of the fact that laying of the pipeline is a "fait accompli" and it is in commission the Committee has recommended certain preventive and palliative measures in general. Considering that the pipeline is of national importance, the Committee only hopes that the mine managements will give a little more enlightened consideration while extracting coal in the close vicinity of the pipeline.

RECOMMENDATIONS

In view of what has been stated earlier in the report the Committee makes the following recommendations:—

- (a) A portion of the pipeline over a length of approximately 12,400 ft. (3.780m) should be diverted, new diversions would add up to 37,000 ft. (11,280 m).
- (b) Vigilance to be exercised by Indian Oil Corporation Limited should be exercised by Indian Oil Corporation Limited should be intensified by having 24 hours maintenance gang stationed at Asansol with proper enuipment.
- (c) Pipeline valves should be installed at intervals of not more than 7 Km. from Asansol eastward and 8 Km. to the west of Asansol and, as soon as practicable, arrangements should be made to control the valves electronically. Indian Oil Corporation Ltd. should contact M/s. Bharat Electronic and other similar institutions for indigenous manufacture of such items. The Committee does not recommend any expenditure of foreign exchange on this account.

- (d) Temporary diversions of the pipeline may be made in consultation with the Director General of Mines Safety in the case of working quarries of underground workings in special cases.
- (e) It is considered necessary that Indian Oil Corporation should have prior intimation of development of workings or extraction of pillars within 45 m. and below the pipeline. For this purpose Indian Oil Corporation should make a workable arrangement with Director General of Mines Safety.
- (f) To offer better protection to the pipeline by reducing the load over it before final extraction of coal is started below any portion of the pipeline, the earth cover should be removed and if necessary, it may be kept covered by not more than 1 ft. of coarse sand. Particular vigilance should be maintained over such portion by IOC and if at any time any damage to the pipeline is noticed or suspected the respective mine management and Directorate General of Mines Safety should be informed forthwith.
- (g) Panel barriers should be formed by the mining companies beneath the pipeline wherever practicable so as to afford protection to it without incurring extra blockage of coal. Indian Oil Corporation may take this question up with Director General of Mines Safety for giving effect to this recommendation. In virgin areas, normal development as provided for in the Coal Mines Regulations of 1957 may be allowed in the panel barrier to be left for the protection of the pipeline.
- (h) In view of the importance of Asansol Pumping Station, even development of coal has not been recommended mainly as a precautions against fire creeping into the developed area under the Pumping Station thus jeopardizing its stability where highly sensitive instruments and machinery are located.
- (i) No restriction on total extraction of coal below the pipeline is recommended where such extraction is not likely to cause subsidence of the ground to more than the safe span and safe sag. Due to several variable factors it has not been possible to specify an exact depth and seam thickness vis-a-vis the nature of overburden strate but it is desirable to deal with each case on its merits as detailed in the calculations given in Annexure VII.

- (j) At comparatively higher depth of cover, danger to the pipeline due to a fire in extracted are a need not be taken into account. However, all surface cracks within 25 ft. (7 m.) of the pipeline on either side should be promptly filed in with earth.
- (k) In order to reduce the depth of subsidence, only one seam should be extracted at a time of caving and the extraction should be conducted from top-downward as far as practicable.
- (1) Where stowing arrangements are available, extraction of coal below the pipeline should be done in conjunction with stowing. The Committee does not recommend installation of stowing arrangements merely for extraction of coal below the pipeline.
- (m) At comparatively shallow depth of cover where subsidence may affect the pipeline a 56 ft. width of coal belt is recommended to be left for its protection. However, normal statutory development may be made in this belt.
- (n) In order to achieve a controlled and gradual subsidence of the ground, extraction of coal by longwell system of mining wherever practicable is recommended.
- (o) The behaviour of the pipeline, in order to determine its maximum safe span and sag between two points of support, should be further examined by a competent authority.

APPENDIX X

Summary of Conclusions/Recommendations of the Committee on Public Undertakings contained in the Report

S1. No.	Reference to Para No. in the Report Summary of Conclusions/Recommendations	
1	2	3
1	2.29 to 2.33	The Committee find that there were three reasons mentioned at the meeting of the Board of Directors of Indian Refineries Ltd. of 3rd July, 1961, for preferring Bechtels to ENI of Italy and John Brown of U.K., for the preparation of the Project Report.
		First that Bechtels had worked in the area in 1955. Secondly that Bechtels would prepare the Project Report in about 4 to 6 weeks and finally they might be able to "persuade the World Bank or other agencies in the USA on the question of financing the foreign exchange component of the Project". The Board of Directors had, however, clearly directed that Bechtels might be entrusted with the work "if the ENI credit is not forthcoming."
		The Committee would, therefore, like to take up first the non-availability of ENI credit. The Minutes of the meeting of the Board of Directors held on 10th October, 1961, show that the Managing Director reported that "from his discussions with the Government, we understood that credit from ENI for this study and Project is not available."
**************************************		In this connection, the Committee would like to recall that the agreement with the ENI for foreign credit was concluded by the Government of India in August 1961, and it was Government's intention to utilise it for Pipeline Project also. It stands to reason that if the credit was avail- able for the Project costing over Rs. 6 crores as

a whole, it should have been possible to accommodate an expenditure of a few lakhs which would have been incurred on the preparation of the Project Report.

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Further, it was obviously in the interest of Snam Saipem (belonging to ENI Group) to prepare the Project Report, which would have greatly facilitated the execution of the Project by them.

Even if for the sake of argument, it is assumed that ENI credit was not available for preparation of the Project Report, the Committee are unable to understand how Bechtels could be singled out for being entrusted with this work, specially when it is on record in the Minutes of the meeting of the Board of Directors of 3rd July, 1961, that "there were three parties in view namely ENI of Italy, Bechtels Corporation of the USA and John Brown of UK." If ENI credit was not available, it only meant that ENI might not be given the projects straightway in preference to others; but how could it be construed as doing away with the need for calling of offers from experienced undertakings of national and international standing which were evincing keen interest in the Project?

The Committee are not inclined to give much weight to the experience claimed by Bechtels as it related to 1955 (6 years earlier). If experience was the criteria, the Committee could understand the work of preparation of the Project Report being entrusted to B.O.C., who had earlier prepared preliminary Project Report for this Pipeline and were actively associated about this time as technical supervisors with a bigger pipeline project for carrying crude oil from Naharkatiya to Barauni, and who had also experience of dealing with Snam, the contractors who were ultimately entrusted with the execution of the Project.

Another advantage claimed for Bechtels is that they would "Prepare a Report in about 4 to

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6 weeks." The Committee are not able to attach much importance to this claim as in actual fact the time taken for concluding the agreement with Bechtels for preparing the Project Report after their name was first mooted in the Board meeting of 3rd July, 1961, amounted to nearly 5 months (the agreement was concluded only in December, 1961).

2 2.34 to 2.35 As regards the claim that Bechtels might be able to "persuade the World Bank or other agencies in the USA on the question of financing of the foreign exchange component of the Project", the Committee need only point out that in actual fact the Corporation Government decided not to call for global tenders, and entrusted the Project to Snam Saipem (belonging to ENI group) to be financed from ENI credit, agreement for which had already been concluded in August, 1961 i.e. four months before Bechtels were formally commissioned for the Project Report.

The Committee are unable to accept that ENI credit was not available for the Project study in October, 1961, for they find that Government had informed the Indian Refineries Ltd. on 17th October, 1961, that the Project Report for Barauni-Calcutta, Barauni-Delhi a bigger pipeline had been entrusted to Snam Progetti (belonging to ENI group). If, therefore, the Project study of a bigger pipeline project could be entrusted to Snam Progetti (belonging to ENI group) by Government at that time October, 1961 the Committee are unable to understand how Indian Refineries Ltd.|Government could persuade themselves to entrust the Project study of Gauhati-Siliguri pipeline to Bechtels to the exclusion of others. As the induction of Bechtels in the pipeline project on unfounded grounds has led to several complications later in this and Haldia-Barauni-Kanpur pipeline project, the Committee cannot but take a grave view of this failure of IRL|Government to nip the mischief in the bud.

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2.36 The Committee are even more puzzled by the decision of IRL|Government to appoint Bechtels as design engineers and over-all supervisors for this pipeline and pay Bechtels as much as Rs. 51.26 lakhs in rupees (Includes Rs. 22.48 lakhs as Income Tax liability) and 2.86 lakhs dollars (Rs. 13.63 lakhs).

The Committee note that one of the Directors of IRL had pointed out at the Board meeting held on 28th May, 1962, that "it might be useful to call for tenders for engineering and management services in order to verify the reasonableness of the offer made by Bechtel Corporation." The Committee are unable to appreciate how this reasonable proposition was talked out of hand on the ground that "Bechtel Corporation's offer compared quite favourably with similar jobs executed elsewhere and offers received for other jobs", and "the calling of tenders at that stage would merely delay the Project". It is also on record that the Board noted "this clarification" and observed that "a decision had already been taken by the Sub-committee of Directors empowered to deal with the matter."

The Committee are unable to appreciate how the Board of Directors could allow an issue which involved payment of nearly half a crore of rupees to be peremptorily taken out of their purview and considered judgement merely because they had asked a Sub-committee of their own Directors to go into the matter.

The Committee are baffled how a part of a directing body could dictate in this manner to the parent body to the detriment of public interest.

Moreover, the claim that the offer of Bechtels "compared quite favourably with similar jobs executed elsewhere and offers received for other jobs" is open to question. It is on record that BOC pipelines fees for Naharkatiya-Barauni

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pipeline amounted to about 7 per cent of the capital cost. At the relevant time, the estimate of capital cost of Gauhati-Siliguri pipeline was Rs. 6 crores while the amount paid to Bechtels has worked out to Rs. 51.26 lakhs in rupees (Includes Rs. 22.48 lakhs as Income Tax liability) and 2.86 lakhs in dollars (Rs. 13.63 lakhs) which would work out to 10.81 per cent, a much higher percentage than 7 per cent.

The Committee would also like to point out that Government sanction (vide letter No. 31|6|62-ONG dated the 5th October, 1962) was for the IRL proposal to entrust Bechtels with "the design engineering and the management of the Project" at a total cost of Rs. 41.20 lakhs including foreign exchange cost of Rs. 18.21 lakhs." The Committee would like Government to verify whether payment in excess of their sanction was made, and if so, by whom and on what authority, and fix responsibility for the lapse.

2.41 to 2.42 To conclude, the Committee are not able to appreciate the reasons why Indian Refineries Ltd./Government did not invite offers for undertaking engineering and spervision work from several well-known experienced parties of national and international standing before favouring Bechtels with the assignments on rates which proved to be far from competitive and without any commensurate benefit.

The Committee are also not able to appreciate why Indian Refineries Ltd./Government did not call for global tenders for execution of the Project specially when the ENI credit which was ultimately availed of for the Project contained a specific provision to the effect that IRL could "advertise and invite global tenders". While the Committee appreciate that Snam Saipem had the experience and knowledge of terrain, it would not have been unreasonable to expect that Snam Saipem would have offered even more competitive rates to gain the new contract in the face of keen competition by firms of national and international standing who were openly evincing keen

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interest in the work. The Committee need hardly point out that ENI group of companies had already their machinery, equipment and men in the country for execution of the Naharkatiya-Barauni crude pipeline and it was obviously in their interest to gain another pipeline contract. The Committee are of the view that had global tenders been invited nothing would have been lost, while there is every reason to believe that IRL would have considerably gained by inducing the firms to give most competitive offers in respect of cost and accommodation for foreign exchange component of the Project.

3.62 to 3.63

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While the Committee can understand Snam Progetti being entrusted with the work of preparation of Preliminary Project Report, they are puzzled by the acceptance of Indian Refineries Limited/Government of the offer of Snam Progetti to prepare the Executive Project Report, without first taking a firm decision on the feasibility of the pipelines and their alignments having regard to the economics of operation other relevant factors. The Committee cannot appreciate the plea that it was done in the interest of saving one working season for the execution of the Project was taken up in actual fact only in March, 1964, that is after more than 18 months of commissioning Snam Progetti for the preparation of the Executive Project Report. The plea, therefore, is entirely untenable and unacceptable to the Committee and they deprecate the illusion of urgency which was created for telescoping the two distinct stages of preparing a Preliminary Project Report and Detailed Project Report to facilitate the I.R.L./Government to take rational decisions.

The Committee also find that the Government consulted the Indian Institute of Petroleum, Dehra Dun, and other Indian experts, about the general alignments and terminal points for the pipeline, only in 1962 and decided in 1962 that the pipeline should be laid only between Haldia-Barauni and Barauni-Kanpur. The Committee

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feel compelled to observe that had Government taken the elementary precaution of settling the terminal points and general alignment of the pipeline in consultation with the Indian Institute of Petroleum, Dehra Dun, economists and other experts in the field, they would have saved both money and time by indicating clearly the requirements to the foreign company. The Committee would like Government to take remedial measures to ensure that such costly lapses which affect the very basis of planning and have grave financial and economic implications, do not recur.

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6 3.66

The Committee are not able to appreciate why it was necessary to bring Bechtels on to the scene when they had already commissioned Snam Progetti both for the preliminary Project Report and the Executive Project Report.

3.67

As regards the plea that it was found possible to effect a saving of nearly Rs. 3 crores by associating Bechtels in finalising the design and specifications for I.R.L., the Committee would like to quote the considered view of the Director incharge of Indian Oil Corporation who has gone on record on 13th June, 1967 to the following effect:

"The advice given by Bechtels appears to have been based on false premises because an economy brought about by reducing capacity and by eliminating various facilities is not a real economy, but an illusory one."

7 3.69 to 3.75 It is evident from the above that the agreement with Bechtels for payment is not related to the progress of the work, instead it was made time-bound, with the result that Bechtels managed to clear the scene after drawing more than a crore of rupees as fees and charges while the project was still in midstream as it was completed only in August, 1966 and commissioned on 26th September, 1966.

It would be pertinent in this connection recall that while agreement with Bechtels as design monitors and project managers was concluded only in March/April, 1964, the Indian Refineries Ltd. had started making payments them as early as December 1963 without waiting for Government's approval to the agreement on the plea "work done, payment made". The Committee would have very much appreciated if the hypothesis had been applied by Government to ensure that payment was only made after the work was completed. The Committee help the conclusion that the Indian Ltd. showed more concern for Bechtels interests than for the project and in fact so arranged the events that Bechtels became a reality as design monitors and project managers even before the approval of Government had been taken thereto.

The Committee are also not convinced that the Pipeline Division of I.O.C. who looked after the crucial phase of completion and commissioning of the pipeline project after Bechtels cleared off the scene on 30th June, 1965 and could not be entrusted with the responsibility of project managers and design managers from the very inception.

The Committee have dealt at length with the role of Bechtels in advising Indian Refineries Ltd. to stick to the alignment of the pipelines through coal-fields in Chapter VII from which it would be seen that Bechtels shifted their ground in crucial matters of alignment more than once.

Later in this Chapter the Committee have pointed out how the actual throughput capacity of Haldia-Barauni pipeline for pumping crude oil has been found to be even less than 1.5 million tonnes, as compared to Government's intention of building a pipeline with 3 million tonnes capacity to match the plans for expension of Barauni to 3 million tonnes by 1966. It is also on record that certain portions of the pipelines were found to have corroded necessitating replacement at

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the cost of Snam (Estimated Rs. 15 lakhs) and I.O.C. about 4 lakhs.

The above instances are indicative of the failure of Bechtels to discharge faithfully their responsibilities as design monitors and Project Managers.

The Committee are convinced that the favoured treatment meted out to Bechtels and the unusual provisions in the Agreement made with them could not have been possible without the knowledge of the Undertaking and the Government both of whom should be held to account for the serious lapses to safeguard public interest.

8. 3.76 to 3.77 The Committee find that the Managing Director of Indian Refineries Ltd., in his letter of 5th April, 1963, had informed Government inter-alia that: "The 9 firms addressed, including ENI—there are two each from USA, UK and France and one each from Italy, West Germany and Japan—have all expressed their keen interest in the work and have also stated that they expect to be able to offer credit for the foreign exchange cost involved."

The Committee are, therefore, greatly surprised to find that the Managing Director in subsequent letter of 6th July, 1963, addressed^{*} to the Secretary, Ministry of Mines & Metals, stated inter-alia "The execution of the project negotiation with the conmay be settled by cerned ENI company, an earlier decision to invite tenders from a number of selected companies being given up, mainly because of the probable difficulty of finding the foreign exchangeinvolved, and also because of the likely delay in execution." The Committee are not able to appreciate how the difficulty of foreign change could be made an alibi for not calling for global tenders when it is on record that out of the 9 firms including ENI addressed Indian Refineries Ltd., two each from the USA, UK and France and one each from West Germany and Japan, had all expressed their keen

interest in the work and also indicated that foreign exchange credit for the cost involved could be offered. It would also be recalled that the ENI credit itself contained a clause inglobal tenders by advertisement could The Committee are baffled with the manner in which the Managing Director reversed the earlier indication of going in for global tenders in his letter of 5th April, 1963 to Government by making all manner of assumptions in his latter letter of 6th July, 1963, of foreign exchange difficulties. It is difficult to believe how the foreign exchange difficulties got three centuated during the brief period of months to such an extent that even calling global tenders linked with accommodation foreign exchange component could be arbiterarily ruled out. If Government had made full use of the enabling provision in the ENI credit, they could have induced ENI group of firms to improve their terms, as they already their machinery, equipment and men in India for execution of the pipeline project about this time between Gauhati and Siliguri. The global tender would have had the additional benefit of giving the Government an opportunity to the offer of ENI against technological developments in the field all over the World and it is quite possible that the shortcomings, particularly in the capacity and alignment which came to mar the Project at a later date would have been avoided. The Committee would like ment to fully investigate the circumstances under which IRL and Government allowed themselves to be persuaded to hand over construction contract to Snam-Saipem sively without putting it to sure and practical test of global tenders.

9 3.81 to 3.83 The Committee find that while most of the issues have been identified, the conclusions reached cannot command unquestioned acceptance, as, in the first place, these were inquired into either by Chairman, IOC, or a Committee of the Directors of IOC who cannot, in the nature of things, be expected to probe, without

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reservations, into the action of the then Managing Director of Indian Refineries Ltd., as hewas occupying at the time of inquiry by IOC the strategic position of Secretary of the Ministry of Petroleum and Chemicals, and under whose administrative control IOC fell.

Moreover, the Sub-Committee of four Directors of IOC (one of whom was later replaced on his transfer by another Director) who made inquiries into the matter included some high-ranking officers of IOC two of whom were earlier directly connected with the matter at the relevant time as Joint Secretary, etc., in the administrative Ministry of Mines & Fuel.

Further, some of the conclusions reached naturally are far from conclusive and appear more like a possible hypothesis to save the trouble of a detailed and searching inquiry.

10 3.86

The Committee are constrained to say that while issues are posed, the problem is not faced squarely as evidenced in the first case from the observation "it will have to be a very exhaustive exercise to be undertaken by the senior engineers and accountants", and in the second case in respect of the cost of modification for reaching 2 million tonnes pipeline capacity—that it would have "to be estimated carefully, but prima facie it may be stated that this will be in excess of \$200,000 mentioned by Bechtel. All pumping units will have to be imported."

11 3.89 to 3.92 The Committee take a very serious view of the fact that the important records of IRL, particularly the Enclosure 18 of Part II—'Job Description', etc.—and papers indicating the stages of processing of contract documents at the various levels of management, are not available and are reported to be missing. The loss of such vital documents cannot be treated with complacency. What amazes the Committee most is that "no record was kept of those discusions at various stages" which led to the "finalisation of contractual matters". All this is sought to be justified on the ground that the

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work was handled on a "war footing". The Committee are unable to accept this plea, as they consider it the first and foremost duty of those who are handling important negotiations volving crores of rupees to maintain faithfully contemporaneous records of the negotiations so that these can be suitably drawn upon for settling details of the agreement and for informing the Board of Management|Government of nuances of the various clauses of agreement and how maximum advantage has been secured for the Public Undertaking and every care exercised to safeguard public interest. The Committee cannot resist the impression that the negotiations were not carried out with diligence or care; otherwise how else can the defective nature of agreements with foreign companies be explained.

Moreover, the procedure of dealing with such matters on a war footing has given neither results in the matter of expeditious completion of the pipeline (it was delayed in commissioning by more than 18 months), nor achieved the objective underlying its construction in as much as the capacity established is far below the 3 million tonnes capacity of Barauni refinery.

The Committee would like Government to take very serious notice of this lapse on the part of those who were entrusted with the negotiations and take suitable action against them.

The Committee would also like Government to issue standing instructions in consultation with the Ministry of Finance and the Comptroller & Auditor-General of India on the manner in which contemporaneous records of such negotiations should be kept for future reference. A copy of these instructions may also be furnished to the Committee for information.

12 3.94

The Committee too are greatly "intrigued" how a very important communication from Bechtels which clearly mentioned the design capacity of the pipeline as 1.9 million tonnes per

year did not make the then General Manager, Managing Director of IRL to sit up and take a firm and unequivocal stand on this attrition of the capacity of the pipeline. The Committee are amazed that the reduction of the throughput capacity of the pipeline could have been dealt with in such a casual and perfunctory manner. The Committee consider that the matter calls for thorough investigation for fixing responsibility on all those officials who were lax and casual in discharging their responsibilities.

13 3.96

The Committee need hardly point out that it is not without significance that the date of sanction of Government letter to Indian Refineries Ltd. to enter the construction contract and the actual date of signing of the contract by the IRL with SNAM SAIPEM is the same viz. the 31st July, 1963. The Committee are not able to appreciate the great haste with which such an important contract involving over Rs. 11 crores was concluded without fully safeguarding Government's interests.

14 3.100

The reported agreement between I.O.C. and Snam needs careful scrutiny of Government to make sure that full damages have been recovered from Snam for the proved deficiency in the capacity as compared to the commissioned capacity.

15 3.102

The Committee, however, have not been furnished the full text of the legal opinion of Shri A. A. Peerbhoy as to the nature and extent of responsibility of the contractors on the relevant issues. The Committee would like Government to obtain the legal opinion at the highest level so that the best construction can be put upon it and no effort is spared to bring home the responsibilit for this failure to Messrs Snam and Bechtel.

16 3.105 and 3.106 It would be pertinent to recall the conclusion of the Board of Directors of IOC after a lengthy discussion about the dealing of Bech-

tels. The minute of the Board's meeting held on the 26th March, 1969, inter alia records:

"Looking into the dealings and records of M|s. Bechtel, the Board decided that the Crporation will not have any dealings in future with the party."

The Committee need hardly point out that the Resolution of the Board of Directors of IOC is conclusive on the subject and underlines the need for a thorough investigation by Government to determine the manner and the reasons for which Mis. Bechtels were brought on to the scene, first for Gauhati-Siliguri pipeline project and later for HBK project and paid over Rs. 1.5 crores (comprising Rs. 75.46 as fees and the balance as reimbursable cost) with hardly any commensurate benefit to the Project. In fact, but for their inept technical advice at crucial stages the history of the project of HBK pipeline may well have been different. The mittee would like Government to pursue matter to its logical conclusion and take up with all those concerned with the introduction of this party to the Pipeline projects and the undue favours which were shown to them at every stage as evidenced by the unusual provisions of the agreements. The Committee cannot help pointing out that the then Managing Director, IRL, who was signing the agreements on behalf of IRL showed more concern for the interests the Bechtels than for the public money he was entrusted with.

17 3.108

The extracts (given in para 3.107) from the Resolution of the Board of Directors of IOC would conclusively prove that the then Managing Director was acting on his own in his dealings with Snams as well as Bechtels in vital matters concerning the capacity of the pipeline; bypassing thus the Board of Directors. He also failed to obtain prior specific approval either of the Board of Directors or Government to the deviations which adversely affected the capacity of the Project without any commensurate saving in expenditure. The Committee are puzzled

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how the Board of Directors Ministry allowed the then Managing Director to act in this manner to the detriment of public interest. The Committee would like Government to fully investigate the matter and fix responsibility.

18 3.111 and 3.112

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The Committee have noted with grave concern the observations of the Internal Audit Officer that there does not appear to exist any sanction of Government for the execution of the Haldia-Barauni-Kanpur projects over which an expenditure of over Rs. 26 crores has already been incurred. The Committee would like to be informed of the factual position. If the position as stated in the Report of the Internal Audit Officer is correct, the Committee expect Government to take action against all those who are responsible for this lapse.

The Committee are not able to appreciate how this important Audit Report dealing with several matters of vital importance to IOC could be allowed to remain without detailed investigation and report both to the Board of IOC and Government. The Committee need hardly stress that the various other issues raised in the Audit Report should be thoroughly examined in consultation with the Comptroller and Auditor General and the responsibility for the loss suffered by the Undertaking Government fixed and deterrent action taken against all those who have shown laxity in the discharge of their responsibilities.

4.13

The Committee regret that although the defacto transfer of Koyali-Ahmedabad Pipeline has taken place the question of dejure transfer of the Koyali-Ahmedabad Pipeline has not been settled since 1967 in spite of the fact that both IOC and ONGC are under the administrative control of the same Ministry. Such prolonged indecision and delay in the Ministry, in the opinion of the Committee, are not indicative of expeditious and business-like approach, which should distinguish a Ministry administering Public Undertakings.

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20 5.10 The Committee find that the Estimates of the to Gauhati-Siliguri Pipeline have escalated to the 5.15 extent of 25 per cent during the course of 3 revisions. Whereas in the case of Haldia-Barauni-Kanpur Pipeline the estimates have escalated to the extent of 15 per cent in the course of two revisions. The final estimates of Haldia-Barauni pipeline are still to be prepared.

The present system of control on public undertakings envisages a three tier system of Financial Control:—

- (a) Control of Board of Directors,
- (b) Control of Government,
- (c) Control of Parliament.

The Committee are concerned to find that the whole system of three tier financial control has not been properly applied in controlling the finances of this Undertaking. They find that the Project estimates of G.S. Pipeline for Rs. 591.20 lakhs were sanctioned by Government on 4th October, 1962. After this sanction, the Undertaking went on spending money on its own far in excess of the sanctioned estimate of Rs. 591.20 lakhs and submitted to Government only in January, 1966 the final estimates of the Project as Rs. 775.38 lakhs after the completion of the Project. The Committee find that this excess expenditure of Rs. 194.18 lakhs for the completion of the Project was done by the Undertaking without any proper approval of the Government, although according to the prescribed financial procedure and rules not more than 10 per cent of the sanctioned amounts, an Undertaking could incur without the Government's sanction. question as to how the Government permitted this unauthorised expenditure beyond 10 per cent of the sanctioned estimates by the Undertaking, the Ministry in a written reply have stated as follows:-

"It has not been possible to trace the exact reasons why IOC continued the completion of the Project at the enhanced cost without getting interim sanction for this."

The Committee find that the Board revised the estimates of the Project for the first time on 28th January, 1963 as Rs. 661.52 lakhs. The Committee fail to understand why these revised estimates were not referred to the Ministry and also why the Ministry's representative on the Board did not take note of it and informed the Government of this unusual escalation of cost.

The Committee understand that the Indian Refineries Ltd. had a Financial Division. They are, therefore, unable to appreciate how the Controller could allow Financial penditure to be incurred without proper sanction for revised estimates of the Board Government. The casual and leisurely manner in which the Indian Refineries Ltd. have approached question of revision of the estimates and its expost facto regularisation by Board Government are indicative of the fact that effective control and direction are not being exercised. It is for this reason that the undertakings have come to play with the tax-payer's money without paying adequate attention to the prescribed procedure of obtaining Government's prior approval to the revised estimates. The Committee would like in this connection to draw attention to Paras 1.7 and 1.9 of the Fiftieth Report of the Public Accounts Committee (Fourth Lok Sabha) on New Services and New Instrument of Service and stress that effective action should be taken by the Government to implement the recommendations and take prior approval of Parliament in case of substantial revision. The Committee also expect that while examining the question of according approval to revised estimates, Government would seriously consider its effects on the economics of the project. The Committee feel that where the economics of the projects are adversely affected as a result of revised estimate of expenditure the matter should be specifically brought to the notice of Parliament without avoidable delav.

What amazes the Committee most is that the Government did not bother to examine the type of control that they had on the Undertaking and allowed complete freedom to the Undertaking which were not permitted even by the delegation of powers.

The Committee recommend that the circumstances under which the Undertaking was allowed to spend money beyond 10 per cent of the sanctioned estimates without the approval of the Government should be investigated and the persons responsible both in the Undertakings and the Ministry should be proceeded against.

The Committee strongly recommend that in future the prescribed principles of financial control should be adhered to by all Undertakings including the I.O.C. The Committee regret that in no year the Demands for Grants of the Ministry provided for the expenditure and for full six years. Parliament was unaware of what was happening in the financial administration of the undertaking. Taking strong exception to bypassing of the Parliament's financial control, the Committee recommend that in future all cases of Project Estimates Revised Estimates should be given effect only after Parliament has approved of the total Capital Expenditure on the entire project or the revision of the project estimates as the case may be.

21 6.9 to 6.12 The Committee are surprised to learn from the Ministry that the various reasons that caused the delay in the construction of the pipelines were not specifically brought to the notice of Government for resolving at Government level. To them, it appears, that the "emergency" and "speed" stated to be involved in the projects was only confined to the entrusting of works to the foreign contractors without inviting Global Tenders. Afterwards, both the Undertaking and the Ministry hardly took any effective measures to expedite the completion of the project. The Committee expect the Ministry

to take initiative in matters involving clearance by Government Ministry in the interest of timely execution of vital project.

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The Committee are convinced that the Ministry do not make any effective use of the reports from the Undertakings nor do they have technically qualified personnel to scrutinise them. They are of the view that the existing machinery in the Ministries is not capable of effective supervision of Public Undertakings. They recommend that the Government should appoint a Committee consisting of Management experts Secretaries of Ministries controlling major Undertakings to evolve a proper machinery for their respective Ministries capable of exercising effective control on their Undertakings.

This Committee of Experts should also advise as to how the existing procedure of control in the Ministries could be further streamlined to enable them to have a grip on:—

- Progress of construction of project from time to time;
- 2. Financial matters with specific reference to the progress of actual expenditure vis-a-vis the target and according to the sanctioned estimates;
- 3. The information received from the projects from time to time and to ensure that the materials are scrutinised, digested and co-related promptly and put up to the Secretary Minister without any loss of time to enable them to know the true picture at any given time so that in the event of any weakness being detected prompt action is initiated by the Ministry;
- 4. The administrative ministries should develop a central control agency on the pattern existing at the head quarters of Railway and Defence Ministries to deal

with their respective departmental undertakings and also in existence at the head quarters of giant international enterprises after suitable adoption and modifications so that the ministries could have not only complete grip over the progress and functioning of Public Undertakings but are also furnished the information and data after proper screening and sifting.

 Study of important areas in the Undertakings and technique including PERT SYSTEM to locate the critical areas in every Undertaking.

The Committee recommend that the proper machinery should be evolved to provide an affective leadership to the Undertaking through the medium of technically qualified cell. Unless this is achieved the Committee is convinced that the Ministries will not be able to discharge their responsibilities to the Undertakings.

22 7.35 to 7.42

The Committee regret to note that the entire question of laying the pipeline through the coal bearing area has not been dealt with care and caution it deserved. They note that Indian Technical opinions had been throughout against the laying of pipeline through the coal bearing area. The Mining Adviser to the West Bengal Government (on 17th September, 1963) followed by Chief Mining Adviser to the Ministry of Mines and Fuel (on 14th September, 1963) and Chief Inspector of Mines, Dhanbad (on 21st December, 1963) had emphatically and repeatedly objected to the laying of this pipeline through the coal bearing areas. The foreign technical advisers of the Corporation viz Snam-Progetti/ Bechtel however, held contrary views and categorically stated that no technical difficulty or risk was involved to the pipeline or to the coal bearing areas and insisted that the pipeline should be laid as suggested by them. Ignoring the warning of the Indian experts,

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I.R.L. accepted the advice of their foreign technical advisers and wrote as follows in their letter of February, 1964:—

"There will be no danger to the pipeline if it is laid in the coal mines and if any protective measures are necessary for the pipeline at certain specified points, they would be undertaken by the pipeline authorities and at the same time requested then Ministry to obtain necessary clearance from the Coal Mining experts."

The Committee is surprised to find that Bechtels, the consultants of I.R.L. in their letter, dated the 20th December, 1963 confirming that the crossing of coal Mining areas presents no technical difficulties to the products pipeline stated categorically that from their experience of construction of pipeline in coal mining areas in the U.S.A., France and Germany no difficulty has been experienced. While accepting the advice, the Committee find that Bechtel did not point out any specific instance of a place or area in a foreign country where the pipeline has been laid through the coal fields.

The Committee find that while the question of laying pipeline through Coal bearing areas was being discussed in November-December, 1963 in consultation with the coal Mining Adviser to the Government of India, the Managing Director, Indian Refineries Limited is on record as having stated at a meeting with representatives of Bechtels and Snam regarding the location of Ruderani Terminal that "there will not be any change in the alignment of the Haldia-Barauni Section of the Pipeline." This would suggest that the issue had been foreclosed at administrative level of Indian Refineries even while the discussions were going on with the Mining experts of the Government.

After the completion of project again in February, 1965 Bechtels representative in Delhi wrote to their principles in San Francisco Office

asking for advice on the problem of pipelines across coalfields. The San Francisco. office replied on the 8th February, 1965 that in such matters it would be necessary to obtain. the advice of a mining consultant engineer and they recommended that Shri C. J. J. Raju be consulted. The Committee find that Shri Raju in his report has inter alia observed that during his visit to Jharia coalfields, he found that "the safety pillars left below the township public roadways are liable to be destroyed due to the fires in the neighbouring goafs and that crocks extended to the surface above the safety pillars were emitting smoke. Mr. Hoaffert Bechtels on his note on the visit to the coalfields on 8th April, 1965 noticed fire on the surface." In the opinion of Shri Raju hazard of the pipeline being exposed smoke due to fire, etc., the cracks cannot be ruled out. This aspect of the problem did not. seem to have been given the necessary consideration by Snams Engineers while planning the layout of the pipeline. Even when question of advisability of laying the pipeline was questioned, both Bechtels (consultants to I.O.C.) and Snam (Design Contractors) did not seem to have studied it in all its aspects and given the necessary advice at that stage which case the difficult problem could have been avoided." Shri Raju in his report also stated "that it would be a desirable step to divert the pipeline or lay a new pipeline over areas from coal deposits."

The Committee further find that neither Indian Refineries Limited nor Government had consulted the Geological Survey of India or asked them to prepare the section showing the outlay of coal seems along the pipeline till Shri Raju specifically asked for the map which was prepared for the first time at his instance. Shri Raju in his report has mentioned that a number of collieries over which the pipeline passes viz. Sripur, Satram, Madhavpur, etc. have gassy fires and that in some of these collieries,

particularly old ones, where working has been discontinued, fires may start any time.

Shri Raju's report was discussed at a Inter-Ministry meeting on 6th February, 1966 and a decision was taken to "plan for a restricted diversion of the pipeline over the worked leased held areas within the next two or three years and the pipeline permitted to be in operation till then with proper safeguards."

It was ultimately decided by the I.R.L. Beard Government on the Report of a Survey and Design team set up for the purpose to a diversion of 96 kms. to avoid the coal fields at a cost of Rs. 195 lakhs, which was sanctioned by the Government of India on 12th May, 1967.

The Committee feel that it is indeed unfortunate that the Government diregarded the opinion of the Indian Mining Experts and completely relied upon the advice of the foreign experts for laying the pipeline through the coalfields. As the events have proved, the views of the Indian experts have ultimately prevailed.

:23 7.43

The other point that the Committee have noted with regret is that I.R.L. made a commitment of providing necessary protective measures in the coal field area without examining and knowing the financial implications for such a commitment and even without knowing fully what those protective measures would be. Curiously enough, the protective measures were to cost Rs. 18 crores as against the laying of new pipelines which was to cost Rs. 2 crores. The Committee are extremely surprised to find that the I.R.L. Government had never applied the mind to the economies of the protective measures vis-a-vis the expenses of laying new pipelines which is unpardonable. What surprices the Committee most is that I.R.L. Government before making their commitment

amounting to Rs. 18 crores for protective measures never deamed it necessary to seek the prior approval of the Finance Ministry which was obligatory.

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.24 7.44 and

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The Committee find that Government consulted the Burma Oil Company (Pipelines Division) in London in 1967 taking into account the fact that B.O.C. Pipelines Division were working as consultants to Oil India in Naharkatiya Barauni crude pipelines. The Committee feel that the expert advice should have been sought at a earlier date so that their recommendations about the use of regulated mining practice, adoption of hydraulic and stowing etc. could be brought to the notice of the mining experts and mining concerns consideration and allay their fears. The Committee are also of the view that the Investigation Committee which was appointed in May, 1968 should have been appointed in 1963 when the Mining Advisers to the West Bengal Government and the Advisers to the Government of India had objected to the laying of pipelines through the coal bearing areas in no uncertain terms and if that was done all these lapses would not have occurred.

The Committee regret that the indifference of I.R.L. Government went to the extent of ignoring to ask for a third set of independent opinion before accepting the defective advice. The Committee is convinced that such gross indifference and derelication of duty of the officials of Government I.R.L. being inexcusable, impartial inquiry followed by severe punishment of guilty officials for the lapses is called for.

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The main contention of the IRL in not agreeing to consider the proposal for diversion of alignment of the pipeline through the coalbearing area in 1963 and 1964 was that a decision to realign the pipeline would result in considerable delay. The Committee desired to

know the estimate of the delay that would have been caused, but no precise reply was forthcoming from Government.

The Committee would like to point out in this connection the following two salient facts:

The first contract for construction work was signed with Snam on 31st July, 1963. The first objection of the West Bengal Government Mining Adviser to the West Bengal Government to the proposed alignment of the pipeline through coal-bearing areas was raised on 18th September, 1963. The actual construction was started only in October, 1964.

It is also pertinent to recall that the Executive Project Report in the form of "drawings and specifications" came in piece-meal from 1963 till 1966 when the Project was completed.

Another reason put forward by I.R.L. for not considering realignment of the pipeline is that it would have involved payment of damages to the contractors for down time for keeping their machines and men idle on the job. estimate of the down time payment has been given to the Committee, but judged from the actual rate of down time payment made to the contractor for non-availability of land etc., the Committee feel that its quantum would have been far less than the cost that would have been incurred for realigning the pipeline at that stage to avoid the coal-bearing area. least that the Committee could expect from I.R.L.|Government was that they should have carried out a most careful appraisal of the various alternatives such as cost of realignment and payment of down time vis-a-vis the grave hazard of pushing the pipeline through coal mining area against the advice of mining The Committee have experts of Government. pointed out elsewhere in the Report how the existing alignment of pipeline through the coalbearing area is alleged to have resulted in locking up of coal reserves to the tune of 1. 2. 3.

Rs. 350 crores and carried an implied commitment to the tune of Rs. 18 crores on stowing works to minimise the hazard of fire in the area surrounding the pipeline.

It is, therefore, evident that in actual fact there was a time lag of over one year in the signing of the agreement and its execution which could have been used with prudence to go into all aspects of realignment and taken a decision in the over all interest of the Project.

Another fact which comes prominently to notice in this case is that complete reliance was placed by the Public Undertakings Government on foreign companies for the preliminary Project Report, executive Project Report, engineering details, project execution, design monitoring and management supervision without exercising their right to over-see and scrutinise their actions to ensure that they were in the best interest of the country. The abject reliance on foreign companies went to the extent of rejecting outright the expert advice of Government's own Mining engineers.

The Committee would like the Public Undertakings Government to learn the lesson from this costly lapse that the responsibility for overseeing the work of foreign collaborators should in no circumstances be compromised and that vigilance should be exercised at every stage to hold the foreign collabartors responsible for discharging their obligations under the contract faithfully. Government should also take care to make adequate provision in the agreements to safeguard their right to recover money for damages suffered or short-falls in capacity as compared to the designed capacity contracted and paid for.

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The Committee find that when the proposal for diverting the Pipeline from the coal bearing areas for about a total length of about 93 kms. at a total cost of Rs. 195 lakhs was sent to the Ministry of Finance for their approval and concurrence, the then Deputy Prime Minister and the Finance Minister, while approving

the scheme of diversion on 6th May, 1967 remarked that "this appears to be a very bad case and had led to a wasteful expenditure of nearly Rs. 2 crores and suggested an enquiry in the matter "with a view to fixing responsibility on the officials concerned at all levels both in the Pipelines Division and in the Ministry." result the matter was referred to the Vigilance Commissioner Shri N. S. Rau on 30th June, 1967, for investigation. The appointment was approved by the Prime Minister. Although it was expected that the report would be submitted in 3 or 4 months time the report was actually submitted as late as on 16th April, 1970. Shri Rau retired as C.V.C. on 23rd August, 1968, before submitting the report on H.B.K. Pipeline. Before his retirement, however, the Secretary of the Ministry had discussions with him and he was requested to continue the investigation in his personal capacity even after his retirement as Vigilance Commissioner (the letter dated 28th August, 1968 from Shri Nayak to Shri Rau and the letter dated 21 22nd August. 1968 from Shri Rau to Shri Nayak reproduced at Paras 8.10 and 8.11 of this report may be referred).

The Committee made enquiries as to how Shri Rau was asked to carry on the investigation in his personal capacity on his retirement as Vigilance Commissioner and at what level the decision was taken. The Ministry have given a written note that the question of Shri Rau's continuing to do the investigation was examined by the then Secretary in consultation with the then Minister and after prior approval of the Minister Shri Rau was advised to continue the investigation. The Committee have taken note of the reply given by the Minister in the Lok Sabha on 20th April, 1970 in which it has been stated:

"Minister's written order on the date on which extension was granted is not available in our records. Subsequently however, the then Minister of Petroleumand Chemicals, has given in writing that the extension to Shri Rau was granted after taking his prior approval."

The Government has given no explanation as towhy the work was not allowed to be done by Shri Rau's successor as C.V.C. The Committee are surprised that such an important ment was made by the Secretary by taking only verbal orders of the Minister and only subsequently the written orders of the Minister were obtained. It is a fit case to be enquired into asto on what dates the subsequent orders were obtained because the Committee have noted that the Ministry failed to produce this paper before the Committee at the time of evidence when they wanted the Ministry to produce any written evidence available with them. The Committee was told that the relevant file was with the C.V.C. and hence they could not produce it.

Committee are distressed with manner in which the then Secretary Ministry of Petroleum and Chemicals was allowed to play on his own a crucial role in meeting and persuading Shri Rau three days before his retirement to continue the investigation in his personal capacity even after retirement. pertinent to recall that one of the subjects of enquiry was whether "any of the officials concerned with this matter in the Ministry of the Government of India and the I.R.L. I.O.C." was "prima facie callous or negligent in charge of their responsibilities" and what action, if any, should be taken against them. As already pointed out earlier, the post of Managing Director of Indian Refineries Ltd. at the relevant time pertaining to the enquiry was occupied by none other than the person who was then heading the Ministry of Petroleum and Chemicals as Secretarv. In the circumstances, it would have evidently been more appropriate if the entire question of referring the issues raised by the then Deputy Prime Minister and Finance Minister for investigation had been entrusted by Government to the Cabinet Secretariat and necessary actiontaken in the matter by the Cabinet Secretary in

consultation with the Minister concerned and the Prime Minister whose approval had originally been taken to entrust the enquiry to the Central Vigilance Commission. The Committee cannot resist the feeling that in persuading Shri Rau to continue with the enquiry even after retirement in his personal capacity in circumstances which are not free from doubt cannot be expected to settle the matter conclusively. The Committee feel compelled to record their fear that the whole investigation has got vitiated in the circumstances and the objective underlying it has been defeated.

The Committee feel that the work of the investigation ought to have been done by the C.V.C. and not by Shri Rau in his individual capacity. The Committee have also noted with great regret that this enquiry has been allowed to be dragged on for a number of years. Although it was stated to the Committee that the work was being done in an honorary capacity the Committee find that the enquiry has already cost the exchequer an amount of Rs. 57,000 upto 28th February, 1970 †Rs. 7,500 to be paid as honorarium to a Professor of Osmania University. The Committee fail to understand that when the investigation was being done by the C.V.C. how it was withdrawn with the retirement of Shri Rau from the post of C.V.C. The Government has not given explanation as to why the work was not allowed to be done by Shri Rau's successor as C.V.C.

The Committee also made enquiries as to what would be the status and force of the report submitted by Mr. Rau in his personal capacity. The Secretary in his written note has stated that "the Report would have the same force as any other report submitted under either the Commissions of Enquiry Act or by Departmental Inquiring Officer or under Arbitration Act." The Committee do not agree with this view of the Ministry. In the view of the Committee the report submitted by Shri Rau in his personal capacity would not carry convictions nor will command the respect which a report of this nature could do when submitted by C.V.C. In

view of the fact that Shri Rau's re-appointment was made in a very suspicious manner, the Committee further feel that a report submitted by Shri Rau in his personal capacity, is not worth considering. The Committee would, however, also suggest that enough information and evidence are available on the basis of which the Government should proceed departmentally as the rules may permit under the Conduct Rules to take suitable action in the matter.

27 9.1 to

9.7

The Committee have commented in Chapters II and III in details on the induction of Bechtels in the Pipeline Projects on unfounded grounds which have led to several complications. They are rather intrigued by the manner in which Bechtels were first introduced into the Pipeline Project by the then Managing Director of I.R.L. on three grounds, viz. that they worked in the area in 1955, that they would prepare the Project Report in about 4 to 6 weeks, and finally that they might be able to persuade the World Bank or other agencies in the U.S.A. in the question of financing the foreign exchange component of the Project. None of these considerations can hold the ground as Bechtels had worked in the area 6 years earlier from the time in question; they completed the Report not in 4 to 6 weeks but in 11 weeks and in actual fact the Corporation Government decided not to call for global tenders, and, therefore, the question of taking the assistance of Bechtels for persuading the World Bank for firancing the foreign exchange component of the Project did not arise. The Committee cannot but take note of the grave failure of the I.R.L. Government to nip the mischief in the bud.

The Committee are even more puzzled on the decision of I.R.L. Government to appoint Bechtels as design engineers and over-all supervisors for Gauhati-Siliguri pipeline and pay Bechtels as much as Rs. 51.26 lakhs in rupees and 2.86 lakhs of Dollars (Rs. 13 63 lakhs), (including an income-tax liability to the tune of Rs. 22.46 lakhs).

The Committee have also showed how the payment made to Bechtels for their services works out to 10.81 per cent of the cost of project as compared to 7 per cent which are reported to have been paid for Naharkatiya-Barauni pipeline which was executed about the same time.

The Committee find that the Managing Director of I.R.L. was also primarily responsble for bringing Bechtels into Haldia-Barauni-Kanpur pipeline project on the ground that Bechtel Corporation could bring about "medifications and simplifications in the E.N.I. design for the project..... without sacrificing safety and technical consideration so as to yield sufficient economies in Project cost." Bechtels thus got inducted into the H.B. K. pipeline project as design monitors and project managers at a colossal charge of about Rs. 87 lakhs. Bechtels managed to clear off the scene by 30th June, 1965, by contriving an agreement which made payments to them time bound without relating it to the actual progress of work. The result was that Bechtels vanished from the scene nearly a year before the completion and commissioning of the Project. They also managed to get payments with retrospective effect on the ground that "the work done-payment made", but the same hypothesis was not stretched by Government to ensure that payment was made Bechtels only after the work was completed. The Committee cannot help the conclusion that the I.R.L. showed more concern for interest than for the Project.

Bechtels played a crucial role in the discussions at Milan in July, 1963, which led to the conclusion of faulty agreement with Snams for construction of the pipeline with capacity of even less than 2 million tonnes against the intended capacity of 3 million tonnes.

It is also on record how Bechtels changed their stand about alignment of the pipeline through the coal-field area after the pipeline had actually been laid. The Committee see no reason why Bechtels could not have referred the

matter earlier say in 1963 instead of 1965 to the San Francisco office when the Indian mining consultants were unanimously of the view that the pipeline should not be laid in the coal bearing area, and why they could not suggest examination of the coal fields by an Indian expert earlier than 1965. The net result is that besides the hazards to which the pipe-line has been unnecessarily exposed by laying it in the coal area, it would cost nearly Rs. 2 crores to realign the pipe-line to avoid the coal fields.

As regards the claim that the introduction of Bechtels would result in economy, the Committee would like to recall the considered views of the Director-in-charge (Pipelines), IOC, that the economy achieved was more illusory than real, as the facilities and capacity were considerably reduced without commensurate reduction in cost.

The dealings of Bechtels were critically reviewed by the Board of Directors of IOC at their meeting held on 26th March 1969, and they recorded *inter ali*—

"Looking into the dealings and records of M|s Bechtels, the Board decided that the Corporation will not have any they recorded inter alia—

The Committee need hardly point out that the Resolution of the Board of Directors of IOC is conclusive on the subject and underlines the need for a thorough investigation by Government to determine the manner and the reasons for which Mis Bechtels were brought on to the scene, first for Gauhati-Siliguri pipeline project and later for HBK project and paid over Rs. 1.5 crores with hardly any commensurate benefit to the Project. In fact, but for their inept technical advice at crucial stages the history of the project of HBK pipeline may well have been different. The Committee would like Government to pursue the matter to its logical conclusion and take up with all those

concerned with the introduction of this party to the Pipeline projects and the undue favours which were shown to them at every stages evidenced by the unusual provisions of the agreements. The Committee cannot help pointing out that the then Managing Director, IRL, who was signing the agreement on behalf of IRL showed more concern for the interests of the Bechtels than for the public money he was entrusted with.

3

9.8 to 9.11

28

The Committee have not been able to appreciate why Indian Refineries Ltd. Government did not call for global tenders for execution of Gauhati-Siliguri Pipeline and Haldia-Barauni-Kanpur Pipeline, especially when the ENI credit, which was ultimately availed of for the project, contained a specific provision to the effect that IRL could "advertise and invite global tenders". It is on record that there were as many as 8 other foreign companies of international standing, two each from USA, U.K. and France and one each from West Germany and Japan, who were evincing keen interest in execution of the project and were also willing to extend credit terms to meet the foreign exchange component of the project on terms and conditions which were not less favourable than ENI Credit.

While the Committee appreciate that SNAM-SAIPEM had the experience and knowledge of Indian conditions, it would not have been unreasonable to expect that SNAM-SAIPEM would have offered even more competitive rates to gain the new contract in the face of keen competition by firms of national or international standing, who were openly evincing keen interest in the work. The Committee need hardly point out that ENI group of companies had already their machinery, equipment and men in the country for execution of the Naharkatya-Barauni crude pipeline and it was obviously in their interest to gain further pipeline contracts. The floating of global tenders would have had the additional merit

making the companies compete amongst themselves to construct a pipeline in keeping with the latest technological developments and expethe latest technological developments and expebelieve that the details of these would have enabled IRL|Government to make a comparative study and decide about the optimum design and pumping capacity for ensuring for achieving the prescribed throughput The importance of this aspect cannot be overstressed for it has been found that Haldia-Barauni Pipeline, which is of strategic importance, has been found to be of 1.5 million tonnes capacity only as compared to the original intention of having a 3-million ton capacity pipeline.

The Committee are of the considered view that had global tenders been invited, nothing would have been lost, while there is every reason to believe that IRL would have considerably gained by inducing the firms to give most competitive offers in respect of cost, design and accommodation for foreign exchange component of the project.

Another aspect, which intrigues the Committee, is the reversal in the stand of the Managing Director, that the contract should be given on exclusive basis to SNAM, when only a few weeks earlier he is on record to the effect that global tenders should be floated. The Committee would like Government to fully investigate the circumstances under which the Indian Refineries Ltd. and Government allowed themselves to be persuaded to hand over the construction contract to SNAM-SAIPEM exclusively without putting it to sure and practical test of global tenders.

29 9.12

Another aspect which has greatly worried the Committee is the halting and somewhat contradictory manner in which Government IOC have approached the probe into the affairs of the pipelines inspite of the fact that the matter has been agitated on the floor of the House

through questions, including a Notice Short Question on 1st April, 1970. It is on that the then Deputy Prime Minister and Finance Minister had given orders as early May 1967 that a thorough investigation should be held into the wasteful expenditure which would be incurred on the project and that responsibility should be fixed on the officials concerned at all levels in the Pipeline Division and in the Ministry. It is pertinent to recall how the appointment of the Central Vigilance Commissioner to hold the inquiry, the terms of his reference and finally entrusting Shri Rau even after his retirement as Chief Vigilance Commissioner with the task of inquiry, was allowed to be handled by an officer whose while holding earlier, the appointment of Managing Director of Indian Refineries Ltd., was in question. It would evidently have more appropriate if the entire question of referring the issues raised by the then Prime Minister and Finance Minister for investigation had been entrusted by Government to the Cabinet Secretariat and necessary taken in the matter by the Cabinet Secretary in consultation with the Minister concerned and the Prime Minister's approval had been taken to entrust the inquiry to the Central Vigilance Commissioner. If these elementary precautions had been taken, the Committee would have been compelled to record their fear that the whole investigation done so far vitiated in the circumstances and the objective underlying it has been defeated.

30 9.13

Similarly, in the case of inquiries held by the IOC regarding shortfall in the capacity of the pipeline as compared to the intended capacity or design capacity, the matter has been investigated by a sub-committee of the Directors of IOC, which had on it a number of officials who had earlier been connected actively with the Department of Mines and Fuel at the relevant time.

The Committee have also pointed out how issues have been posed but the problem has not been faced squarely.

31 9.14

The Committee also take a very serious view of the fact that the important records of IRL, particularly Enclosure 18 of Part II-'Job Description', etc.—and papers indicating stages of processing of contract documents at the various levels of management are not available and are reported to be missing. of such vital documents cannot be treated with complacency. What amazes the most is that "no record was kept of these discussions at various stages" which led "finalisation of contractual matters". mittee cannot accept the plea of dealing with such important matters on "war footing", as it has neither given results in the matter of expeditious completion of Haldia-Barauni-Kanpur Pipeline (it was delayed in commissioning by more than 18 months), nor achieved the objective underlying its construction in as much as the capacity established is far below the 3 million tonnes capacity of Barauni refinery.

32 9.15

The Committee have also pointed out the casual manner in which an important communication from Bechtels which clearly mentioned the design capacity of Haldia-Baraunipipeline as 1.9 million tonnes per year did not make the then General Manager Managing Director of IRL take a firm and unequivocal stand on this attrition of the capacity of the pipeline.

33 9.16 to

9.19

It is also a matter for concern how an agreement with Snams for Haldia-Barauni-Kanpur project was executed on 31st July. 1963, the very day on which sanction of the Government for it was received. The expedition in dealing with the matter would have been commendable but for the fact that the agreement suffers from many defects, including absence of any provision for penalty for any lapses by Snam-Saipem.

It is also on record that the amendment effected in July, 1964 to the original agreement of July, 1963 of I.R.L. with Snams, had in all probability resulted in increasing the liability of IOC for civil works without any commensurate benefit.

3

It is also on record that the Managing Director was acting on his own in his dealings with Snams as well as Bechtels in vital matters concerning the capacity of the pipeline, bypassing thus the authority both of the Board of Directors and Government. The Board of IOC have also gone on record to the effect, at the meeting held on 3rd February, 1968, that: "Out of the report and the discussions thereon, it emerged that the Board had been bypassed in the matter. The Board was very emphatic that the matters of such importance should necesarily be reported to the Board at the earliest possible opportunity. The Board also wanted to place on record that in future all such important matters which entail in itself any project of capital nature involving its performance, its capacity, design or of financial implications, should brought before the Board for its notice and appropriation. The Board's decision above matter also applies to any amendments which are of the above nature to any existing contracts or project."

The Committee feel that in the interest of ensuring that the high officers entrusted with the responsibility of managing public undertakings and of carrying out delicate negotiations with foreign companies discharge their responsibilities diligently, honestly and in the best public interest, the above-mentioned lapses should be investigated fully without fear and favour and all those found at fault awarded deterrent punishment.

9.20

34

The Committee find that estimates of the Gauhati-Siliguri pipeline have escalated to the extent of 25 per cent during the course of three

whereas in the case of Haldia-Barauni-Kanpur pipeline, the estima**tes** escalated to the extent of 15 per cent in course of two revisions. The final estimates of Haldia-Barauni pipeline are still to be prepared. Such frequent escalations of estimates deserve, in the opinion of the Committee, the prior approval of appropriate authority. The Committee, the therefore, deprecate such unauthorised revision of estimates and commend that authorities should have been consulted and their concurrence obtained before going ahead in excess of their estimates. Revision of estimates is frequent in a large number of Undertakings. The Committee notice that the present system of control on Public Undertakings envisages a three-tier system of financial control viz. (a) control of the Board of Directors; (b) Control of the Government; and (c) control of Parliament. As regards (a), the Committee find that the Public Undertakings can spend up to 10 per cent of the sanctioned amount/estimates without the approval of the Government. regard to (b) for expenditure beyond sanctioned amount exceeding 10 per cent, the Government approval becomes unavoidable. As gards (c), the Parliament approval has to be taken on the entire scheme followed by approval of the Budget every year. The Committee strongly recommend that all Public Undertakings in future should obey the prescribed principles of financial control at the stages indicated at (a), (b) and (c) above. The Committee further recommend that all cases of Project estimates Revised estimates should be given effect to only after Parliament has approved of the total capital expenditure on the entire Project of the revision of the project, as the case may be. The Demand for grants of concerned Ministries should make specific provisions regarding the capital outlay to be made for the entire period of construction of the Project initially and annual approval of the Parliament should

be taken of the amount sanctioned by Parliament on principle at the project stage.

35 9.21

Another matter, which has greatly exercised the mind of the Committee, is lack of record of negotiations carried out by the Managing Director of the Indian Refineries Ltd. with the foreign companies leading to the conclusion of the agreement. The Committee have urged that Government should issue standing instructions in consultation with the Ministry of Finance and the Comptroller and Auditor-General of India about the manner in which the contemporareous record of such negotiations should be kept for future reference and use of the Board of Management|Government to enable them to appreciate nuances of the various clauses of an agreement and satisfy themselves that maximum advantage has been secured for the public undertaking and every care has been exercised to safeguard the public interest.

36 9.22

Yet another aspect which has greatly worried the Committee is the abject abdiction of the right by the Management to oversee the design with particular reference to such vital matters as capacity and alignment to foreign companies. This dependence on the advice of foreign companies went to the extent of rejecting out of hand the expert advice of Indian engineers with the result that costly blunders were committed.

37 9.23 to

9.24

The Committee are distressed to find, after a careful examination of all the papers and other evidence on record that there have been serious lapses and dereliction of duty by the then Officers of IRL and the Ministry in the discharge of their responsibilities in executing the Pipeline Project. The Committee have pointed out several instances where the Managing Director exceeded the authority available to him; they

have noted with regret that the Board of Management and the Ministry were not vigilant enough to check firmly and in time this excessive use of authority by him.

The Committee also feel compelled to record their feeling that instead of holding the Officers responsible for their lapses, there appears to have been a persistent effort to slur over their dereliction of duty and not to fix the responsibility though copious facts to substantiate such lapses have come on record. The Committee would, therefore, like Government to take immediate steps to bring to book the guilty officers on the basis of evidence that is already available. The least that could be done is to proceed departmentally without delay the Officers concerned under the relevant Govt. Servants Conduct Rules. The Committee feel that Government, in the larger interests of the public sector, should not allow a feeling to go round that officers could commit such grave lapses and indulge in dereliction of duty with impunity and go unpunished.

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