# FIRST REPORT

# STANDING COMMITTEE ON PETROLEUM & CHEMICALS (1999-2000)

(THIRTEENTH LOK SABHA)

DEMANDS FOR GRANTS (1999-2000)

# MINISTRY OF PETROLEUM AND NATURAL GAS

[Action taken by Government on the recommendations contained in the 10th Report of Standing Committee on Petroleum and Chemicals (1998-99) on Demands for Grants (1999-2000) of the Ministry of Petroleum and Natural Gas]

> Presented to Lok Sabha on ... 1.0:03:2000 Laid in Rajya Sabha on ... 1.0:03:2000



LOK SABHA SECRETARIAT NEW DELHI

February, 2000/Phalguna, 1921 (Saka)

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# COMPOSITION OF THE STANDING COMMITTEE ON PETROLEUM & CHEMICALS

(1999-2000)

#### Shri Mulayam Singh Yadav — Chairman

#### **Members**

#### Lok Sabha

- 2. Shri Ashok Argal
- 3. Shri Ramchander Bainda
- 4. Shri Ananda Mohan Biswas
- 5. Shri Ajay Singh Chautala
- 6. Dr. (Smt.) C. Suguna Kumari
- 7. Shri Padam Sen Choudhary
- 8. Shri T.T.V. Dhinakaran
- 9. Shri Dilipkumar Mansukhlal Gandhi
- 10. Shrimati Sheela Gautam
- 11. Shri Pawan Singh Ghatowar
- 12. Shri Shriprakash Jaiswal
- 13. Shrimati Nivedita Mane
- 14. Shri Punnulal Mohale
- 15. Shri P. Mohan
- \*16. Shri B.K. Handique
- 17. Shri Ashok Pradhan
- 18. Shri Mohan Rawale
- 19. Shri Arjun Sethi
- 20. Shri Shyama Charan Shukla
- 21. Shrimati Kanti Singh
- 22. Shri Prabhunath Singh
- 23. Shri D.C. Srikantappa

<sup>\*</sup>Nominated w.e.f. 24.1.2000 vice Shri Vilas Mutternwar, who was nominated to Standing Committee on Transport & Tourism.

- 24. Dr. Ramesh Chand Tomar
- 25. Shri Tarlochan Singh Tur
- 26. Shri Shankersinh Vaghela
- 27. Shri Ratilal Kalidas Varma
- 28. Shri B. Venkateshwarlu
- 29. Shri Rajesh Verma
- 30. Dr. Girija Vyas

#### Rajya Sabha

- 31. Shri Ahmed Patel
- 32. Miss Saroj Khaparde
- 33. Shrimati Basanti Sarma
- 34. Shri H. Hanumanthappa
- 35. Shri Kanak Mal Katara
- 36. Shrimati Malti Sharma
- 37. Shri Ram Nath Kovind
- 38. Shri Dipankar Mukherjee
- 39. Shri K. Kalavenkata Rao
- 40. Shri Anil Kumar
- 41. Shri P. Soundararajan
- 42. Shri Mukesh R. Patel
- 43. Shri Gaya Singh
- 44. Prof. Ram Gopal Yadav
- 45. Dr. (Smt.) Joyasree Goswami Mahanta

#### SECRETARIAT

1.	Dr. A.K. Pandey	Additional Secretary
2.	Shri John Joseph	Joint Secretary
3.	Shri Brahm Dutt	Deputy Secretary
4.	Shri J.N. Oberoi	Under Secretary
5.	Smt. Madhu Bhutani	Sr. Executive Assistant

#### INTRODUCTION

I, the Chairman, Standing Committee on Petroleum and Chemicals (1999-2000) having been authorised by the Committee to submit the Report on their behalf, present this First Report on Action Taken by Government on the recommendations contained in the Tenth Report of the Standing Committee on Petroleum and Chemicals (1998-99) (Twelfth Lok Sabha) on 'Demands for Grants of the Ministry of Petroleum and Natural Gas for the year 1999-2000'.

- 2. The Tenth Report of the Committee was presented to Lok Sabha on 22nd April, 1999. Replies of Government to all the recommendations contained in the Tenth Report were received by 4th February, 2000.
- 3. The replies of the Government were considered by the Committee on 28th February, 2000. The Committee considered and adopted the Report at their sitting held on 28th February, 2000.
- 4. An analysis of action taken by Government on the recommendations contained in the Tenth Report (1998-99) of the Committee is given in Appendix-II.

New Delhi; 29 February, 2000 10 Phalguna, 1921 (Saka)

MULAYAM SINGH YADAV, Chairman, Standing Committee on Petroleum and Chemicals.

#### CHAPTER I

#### REPORT

This Report of the Committee deals with the action taken by the Government on the recommendations contained in the Tenth Report (Twelfth Lok Sabha) of the Standing Committee on Petroleum & Chemicals (1999-2000) on 'Demands for Grants (1999-2000) of the Ministry of Petroleum & Natural Gas' which was presented to Lok Sabha on 22nd April, 1999.

- 2. Action Taken notes have been received from the Government in respect of all the 19 recommendations contained in the Report. These have been categorised as follows:—
  - (i) Recommendations/Observations that have been accepted by the Government.
    - Sl. Nos. 1, 2, 7, 8, 11, 12, 13, 15 and 17.
  - (ii) Recommendations/Observations which the Committee do not desire to pursue in view of Government replies.
    - Sl. Nos. 6, 9, 16 and 18.
  - (iii) Recommendations/Observations in respect of which replies of the Government have not been accepted by the Committee.
    - Sl. Nos. 3, 4, 5 and 10.
  - (iv) Recommendations/Observations in respect of which final replies of the Government are still awaited.
    - Sl. Nos. 14 and 19.
- 3. The Committee desire that the final replies in respect of the recommendations for which only interim replies have been given by the Government should be furnished to the Committee expeditiously.

4. The Committee will now deal with the action taken by the Government on some of their recommendations:—

#### A. Utilization of Plan Outlay

# Recommendations (Sl. Nos. 3 to 5, Para Nos. 2.4 to 2.6)

- 5. The Committee had noted that out of 9th Plan outlay of about Rs. 78,400 crore, the estimated expenditure during the first three years of the Plan would be about Rs. 34,000 crore. The Committee had expressed their doubt that with non-utilization of the Plan funds, how the Government would be able to achieve the objectives and targets set for various activities. The Committee, therefore, urged upon the Government to review the overall policy planning regarding exploration and production strategy in particular with a view to accelerating production of indigenous crude oil/gas in the country. The Committee also emphasized that balance outlay should be fully utilized during the remaining period of the 9th Plan.
- 6. The Committee had also noted that one of reasons for shortfall in utilization of plan funds was delay in taking up exploration work by ONGC, OIL and GAIL (Rs. 500 crore) and implementation of new refinery projects (Rs. 2000 crore). The Committee had warned that with the Private Sector like Reliance making much headway in refining capacity, the Public Sector might not lag behind because of inordinate delay in implementation of their projects.
- 7. The Committee had specifically brought to the notice of the Government the case of the Bina Refinery Project which was pending due to non-clearance from the Ministry of Environment & Forests. To obviate delay in getting environmental clearance, the Committee wanted the Ministry of Petroleum and Natural Gas to examine the possibility of waiver of environmental clearance of oil sector projects, which have due approval of the Government/Planning Commission.
  - 8. The Ministry in their reply have stated:

"The thrust of 9th Plan has been on improving quality of exploration by NOCs for enhanced success rather than on total quantity of exploratory inputs. However, ONGC and OIL have planned enhanced exploratory inputs and higher reserve accretion targets during the 9th Plan.

Estimated investment during first three years of the 9th Plan by these companies would be of the order of about US \$ 500 million excluding the participating share of NOCs. This will be additional investment over and above by NOCs".

Clarifying the reasons for delay in implementation of the projects, the Ministry have stated:

"Government is encouraging PSUs also to implement its expansion proposals or grass-root joint venture proposals. Though a few PSU projects have been delayed due to Environmental clearance or inadequate response from JV Partners but it is also a fact that only two private refineries have made progress in project implementation though 19 number of proposals have been approved by the Government, for domestic Tariff Area as well as 100% EOU".

Regarding environmental clearance of oil sector projects, the Ministry have stated:

"The matter to examine the possibility of waiver of environmental clearance for oil sector project was taken up with Ministry of Environment and Forests. As per that Ministry the environmental clearance for 29 selected activities has been made statutory w.e.f. 27th January 1994 only after taking into account the need for EIA for these projects. The oil sector broadly consists of the following categories of industrial operations:

Exploration and production of oil and gas.

Transportation and storage of crude oil and petroleum products.

Refining of crude oil to produce finished products.

The environmental impact of each project depends not only on the location of the project but also on the processes and operations involved in this industry. There are also possibilities of servere risk if proper mitigation measures are not taken in the early stages of the project. The production of oil/gas involves disposal of waste material and storage and transfer of the crude oil/gas through the pipeline. The pipeline if its passes through ecologically sensitive area(s)/thickly populated area, comprehensive environmental management measures need to be taken. Oil refineries and related industrial complexes because of the very hazardous nature of the chemicals and operations involved, necessitate a detailed environmental examination in order to facilitate integration of suitable remedial measures. Hence, Ministry of Environment and Forests has not accepted the view that the oil sector be exempted from the purview of environmental clearance".

- 9. The Committee are not convinced with the reply of the Ministry. The Committee need hardly emphasize that economic planning and achievement of the planned objectives are of utmost importance for economic development of the country and deviation on any count including non-utilization of plan funds, is considered as lack of effort in order to reach the goal. The Committee would impress that the import of the recommendation should be appreciated fully instead of finding solace in the fact that only two private refineries have made progress. The Committee trust that the Ministry would make all out efforts to get the pending projects of National Oil Companies and their Joint Ventures implemented immediately. The Committee would like to be apprised of the progress made in this regard.
- 10. Regarding Bina Refinery Project, the Committee find that environmental clearance from Ministry of Environment and Forests was received on 16th February, 1995 and since then it is pending for final clearance from various agencies, though a period of about five years has passed. The Committee learn that environmental clearance to Bina Refinery has not been given for the reasons that a pipeline crosses Coral Reef in Gujarat Maritime National Park which is likely to cause an environmental hazard. Reliance pipeline is reported to have crossed that Coral Reef. If this is factually correct, the Committee consider it as double standards and deprecate the same. The Committee appreciate the role of the Ministry of Environment and Forests and other Central and State agencies involved in the protection of environment, but do not see any justification in having one set of standards for Public Undertaking and another for private Companies and also taking more than five years in according final approval. The Committee, therefore, reiterate their earlier recommendation regarding waiver of environmental clearance of oil sector projects which have due approval of the Government/Planning Commission. The least the Government can do is to regulate environmental clearance in a time bound manner. The Committee would like the Ministry of Petroleum and Natural Gas to pursue this objective diligently.

#### B. Private Sector Participation in Exploration Activities

Recommendation (Sl. No. 10, Para No. 2.11)

11. The Committee had apprehended that the Government might hand over such areas/fields where National Oil Companies (NOCs)

viz. ONGC/OIL have done some survey/exploratory activities in developing fields to attract private investment in the exploration of Oil and Gas. The Committee, therefore, wanted that NOCs should be properly compensated in such cases by way of making them partners in the Joint Venture Companies.

#### 12. In their reply, the Ministry have stated:

"As regards discovered fields, the past cost compensation to NOCs has to be seen as a total package and revenue of Government and NOCs from the project and while considering such proposals an overall view needs to be taken including past cost compensation to NOCs with the objective of maximising benefits to the Government".

13. The Committee find the reply of the Ministry evasive and would like to draw their attention to the statement made before the Committee by the Petroleum Secretary that:

"The way out of it is to see that the ONGC, in terms of all these projects, gets reasonable share, that these are in the nature of joint ventures".

The Committee would be happy if this statement is pursued with an aim that NOCs emerge as strong players in oil production. The Committee's interest is that compensation awarded to PSUs is tangible and all deeds are transparent in this regard.

#### C. Exploration of Coal-bed Methane and Deep Sea-bed Gas

#### Recommendations (Sl. Nos. 12 and 13, Para Nos. 2.13 and 2.14)

14. The Country has vest coal resources and Coal bed Methane is available in plenty. Its exploitation is economically viable. The Committee had expressed satisfaction over the fact that the Government have taken positive measures in this regard. The Committee wanted that R&D Schemes should be initiated to tap this new source of energy.

Similarly, the Committee while expressing happiness at the steps being taken by the Government to explore deep sea gas, had hoped that with the technological advancement in off-shore operations, the country would be able to tap this source of energy at reasonable cost. 15. The Ministry in their reply have highlighted the role of the State Governments in the successful implementation of the Policy for Coal-bed Methane (CBM). The Ministry have stated:

"CBM operation in this country is being undertaken for the first time and will take some time before potential of CBM at commercial level is known. The terms and conditions of CBM require consultation with the State Governments. While West Bengal Government has given their consent, Governments of Bihar, Madhya Pradesh and Gujarat have not consented and have given their objection. The policy will be implemented after consultations with State Governments are completed. ONGC has undertaken R&D projects in West Bengal and Bihar for CBM operations".

With regard to Deep Sea-bed Gas, the Ministry have replied:

"Tapping of Gas hydrates, as a possible source of energy, is a relatively new area. Only research activities are under way at present in some parts of the world to develop technology to exploit gas from gas hydrates. Doing this on a commercial scale will take some more time. In India, The Government has already chalked out a plan to carry out R&D work in this area".

16. With the depletion of hydro-carbon reserves, the need of the hour is to go in for alternative sources of energy and success in this regard can be achieved if R&D efforts are fully strengthened. Monetary constraints and procedural hassles should not be allowed to come in the way of achieving excellence in R&D. The Committee recommend that the Government should constitute a special cell to effectively monitor and coordinate various activities related to R&D.

17. The Committee appreciate the role of States in exploiting Coal-bed Methane but seeing the importance and urgency of the matter, it would be appropriate, if the Central Government formulate a national policy, wherein the interests of States are fully protected. The Committee would like the Government to examine this proposal positively.

Regarding Tapping of Gas hydrates, the Committee are happy with the positive developments. However, they desire that the project should be completed within a reasonable time frame. They would also like to be apprised of the progress in this regard.

#### D. Restructuring of Oil Sector PSUs

#### Recommendation (Sl. No. 19, Para No. 2.20)

- 18. From Press reports, the Committee had learnt that the Government was contemplating restructuring of the oil sector PSUs on the basis of the Nitish Sengupta Report. The Committee wanted that before taking any such major decision the matter should be placed before them for consideration.
  - 19. The Ministry in their reply have stated:

"This Ministry constituted a Committee chaired by Dr. Nitish Sengupta, Director, International Management Institute, in October, 1998 with the following terms of reference:

- (i) To study and analyse the emerging scenario in the Petroleum Sector after the year 2001, with specific reference to development and creation of market competitiveness and the viability of stand-alone refineries and marketing company under the conditions of de-regulation/liberalisation and globalisation.
- (ii) To examine the option available and suggest strategic alliance/merger of such oil companies between themselves or otherwise so that we may develop new player(s) on an integrated basis of upstream and downstream activities in the domestic oil sector of marketing and refining, who can stand up to the future competitive conditions and market forces and also operate as viable units with potential for growth.
- (iii) To recommend an action plan having regard to strengths/ weakness of these units and the various oil companies and their Vision Plans to meet the objective indicated in para (ii) above.

The report is under examination'

20. The Committee would like to re-refer to their earlier recommendation where it was observed that before taking any major decision in the matter, it should be placed before them for consideration. The Committee would like to have an assurance from the Government in this regard.

#### **CHAPTER II**

# RECOMMENDATIONS THAT HAVE BEEN ACCEPTED BY THE GOVERNMENT

#### Recommendation (Sl. No. 1, Para No. 2.2)

The Committee note that 9th Five year Plan has envisaged certain thrust areas viz. acceleration of exploration efforts specially deep offshore, acquisition of acreage in other countries, improving reservoir management, creation of adequate refining capacity, augmentation and upgradation for marketing and distribution facilities. Since these objectives are aimed at enhancing the efficiency of petroleum sector, which in turn will be in the overall interest of the country, the Committee desire that Government should take effective and concerted efforts to achieve them. As far as possible the objectives should be quantified with a view to achieving them in a time-bound programme.

# Reply of the Government

#### **EXPLORATION EFFORTS**

#### Oil and Natural Gas Corporation

ONGC in the IX Plan has envisaged to give a deliberate impetus to exploration in thrust areas identified by it, particularly deepwater areas, effective reservoir management and acquisition of exploratory acreages abroad through its subsidiary ONGC-VL.

During the IX Plan, ONGC plans to drill 7 wells in the East and West Coast deepwater areas. In the first two years of the IX Plan ONGC has already drilled two wells in these areas with its own upgraded drillship Sagar Vijay. Efforts to acquire state of the art technology regarding deep-water exploration and production through strategic alliances and/or joint ventures are in line.

With the major producing fields entering declining phase and the new discoveries not being of substantial size ONGC plans to achieve these targets with better reservoir management as outlined below.

> \* To improve the well working efficiency, continuous workover jobs are being carried out viz. application/optimisation of

artificial lift system, water/gas shut-off jobs in high watercut/high GOR wells, adoption of new techniques e.g. drilling of multilateral wells, application of gels/polymers for profile modification etc.

- \* Research and development efforts are in progress for technological advances and breakthough for increasing recoverable component of hydrocarbons and for maximising ultimate recovery.
- \* The Enhanced Oil Recovery (EOR) schemes are under field scale implementation/planned for field implementation viz. polymer flood in Sanand, in-situ combustion in Balol and Santhal to improve the recovery as well as the country's oil production. In addition to this the ongoing in-situ combustion pilot in Bechraji field, is under commissioning.

The producing fields are reviewed at a regular interval/ need base with the availability of more data mid course correction such as in-fill drilling, optimisation of production/ injection system are implemented.

Additional development of Bombay High, Heera, Wasna & Sough Kadi and implementation of exploitation schemes of marginal fields like B-55 are under implementation/planned for implementation.

To augment its indigenous efforts ONGC through its subsidiary ONGC-VIL is on continuous look out for exploration acreages and producing properties in foreign countries. At present ONGC-VL is pursuing such properties in Kazakhastan, Iraq and Russia. It already has a large gas discovery in Vietnam offshore to its credit as a result of its efforts in the past.

#### Oil India Limited

As a part of the measures for intensifying the exploratory efforts during the IX Plan period, OIL has carried out review of its exploratory efforts and has planned further improvement in the physical input for its exploratory programme. The major thrust areas identified by OIL for exploration during IX Plan period are:

(i) To probe for deeper prospect in the South Bank of River Brahmputra in Assam.

- (ii) To carry out exploratory drilling in the North bank of river Brahmputra in Assam.
- (iii) Survey in the Brahmputra river bed.
- (iv) Exploratory drilling in Ganga Basin in Uttar Pradesh.
- (v) Exploratory work in Saurashtra offshore based on the studies of Geo-scientific data, which is presently being carried out.
- (vi) Detailed/semi-detailed seismic survey and exploratory drilling for identification of stratigraphic and deeper prospects in the less explored areas of the Jaisalmer basin in Rajasthan.
- (vii) Exploratory activities are being carried out/planned through Joint Venture efforts in selected blocks in Rajasthan and in the Belt of Schuppen in Assam-Arkan Basin.

Oil is on look out for acreage in other countries. It has already ventured overseas by taking participating interest of 20% in Oman Block-IV in the Sultanate of Oman along with M/s TOTAL of France.

There is ongoing effort in OIL for better Reservior Management. Pressure Management Projects are on in its Assam Fields.

#### Directorate General of Hydrocarbons

In addition to the efforts for operating companies, DGH is also carrying out mainly reconnitory type of surveys to open up hitherto unexplored areas for future exploration. The efforts of DGH are mainly in areas where the information is required to be updated. The operating exploration companies would not normally carry out exploration in such areas on commercial consideration unless the information of these areas is adequate to develop the geological perception. Thus, DGH is creating minimum data base for National and Private oil companies to look at new areas.

As a result of these, about 0.61 million sq. kms of the sedimentary area has been opened up for exploration. These opened up areas would be the future areas for exploration in the years to come. Twelve deep water blocks in the East Coast which have been identified as a result of surveys conducted by DGH have been offered under first round of NELP. This is the first time that deep water blocks have been offered in the country. During the remaining IX Plan period, DGH propose to conduct various geo-scientific studies in several other areas.

In addition, DGH has also planned the reconnitory exploration work in Gaga Valley, Himalayan Foothills, eastern offshore, western offshore and Andaman offshore deep waters, Assam-Arakan fold belts and Kutch basins.

#### Refining Capacity

The refining capacity in the country at the end of VIII Plan period was 62.24 million tonnes per annum (MMTPA). In the, IX Plan, as of date (1.8.99), capacity additions of 31.2 MMTPA have materialised and during the balance period, further capacity addition of 35.6 MMTPA is expected to be created. Thus the total refining capacity by the end of terminal year of IX Plan (2001-02) is expected to increase to 129.04 MMTPA presuming that Essar Oil Ltd. (EOL) and Cuddalore refineries also materialize. Sector-wise/refinery-wise details are at Annexure-I. During X Plan period, as of the approved projects, additional refining capacity of 37.8 MMTPA is expected to be created (13.8 MMTPA through expansions and 24 MMTPA through grass root projects. The details are at Annexure-II). Thus the total refining capacity at the end of X Plan (2006-07) is expected to increase to 166.84 MMTPA.

Expected sector-wise capacity addition during IX and X Plan periods is summarized below:

Figs. In MMT

Sector	IX (Plan	X Plan
Public Sector	17.3	
Joint Sector	6.0	
Private Sector	43.5	0.0
Total	66.8	37.8

Taking the fuel and loss of refineries at 6% product availability from domestic refineries at the end of the IX and X Plans is expected to be 121.30 MMTPA and 156.83 MMTPA respectively. Demand of products at the end of IX Plan is projected between 114.75 (sectoral)—119.66 (GDP working) MMTPA and at the end of X Plan between 156.53—169.58 MMTPA.

In the context of refining capacity additions in the country, it may be mentioned that petroleum refining has been de-licensed and accordingly capacity can be added without going through Industrial Licensing System. In the de-licensed scenario, investors are expected to make their own decisions in regard to the refining projects.

Refining Capacity in India

S.No.	Name of the Refinery	Capacity as on 1.4.97 (end of VIII plan)	Capacity as on 1.8.99	Capacity as on 1.4.2002 (end of IX plan)	Capacity as on 1.4.2007 (end of X plan)
1	2	3	4	5	6
	PSU				
1.	IOC-Digboi	0.65	0.65	0.65	0.65
2.	IOC-Guahati	1.00	1.00	1.00	1.00
3.	IOC-Barauni	3.30	3.30	4.20	6.00
4.	IOC-Koyali	9.50	9.50	12.50	12.50
5.	IOC-Haldia	3.75	3.75	3.75	3.75
6.	IOC-Mathura	7.50	7.50	8.00	8.00
7.	IOC-Panipat		6.00	6.00	9.00
8.	HPCL-Mumbai	5.50	5.50	5.50	5.50
9.	HPCL-Visakh	4.50	4.50	7.50	7.50
10.	BPCL-Mumbai	6.00	6.90	6.90	6.90
11.	CRL-Cochin	7.50	7.50	7.50	13.50 <sup>†</sup>

<sup>&</sup>lt;sup>†</sup>Expansions yet to be approved.

1	2	3	4	5	6
12.	MRL-Chennai	6.50	6.50	6.50	9.50 <sup>†</sup>
13.	BRPL-Narimanam	0.50	0.50	0.50	0.50
14.	BRPL-Bongaigaon	2.35	2.35	2.35	2.35
15.	NRL-Numaligarh		3.00	3.00	3.00
	Sub Total	58.55	68.45	75.85	89.65
	JVC				
16.	MRPL-Mangalore	3.69	3.69	9.69	9.69
1 <b>7</b> .	Bharat-Oman				6.00
18.	Eastern India				9.00
19.	Punjab Refinery				9.00
	Sub Total	3.69	3.69	9.69	33.69
	PVT.				
20.	RPL-Jamnagar		21.30	27.00	27.00
21.	EOL-Jamnagar			10.50*	10.50
22.	Cuddalore			6.00*	6.00
	Sub Total		21.30	43.50	43.50
	Grand Total	62.24	93.44	129.04	166.84

<sup>\*</sup> May Slip to X Plan.

† Expansions yet to be approved.

# REFINING CAPACITY ADDITIONS

S.No.†		IX Plan		X Plan		
	Name of the Refinery	Capacity Addition	Year of Completion	Capacity Addition	Year of Completion	
	ŕśu					
	IOC-PANIPAT	6.0	COMMISSIONED IN 1998-99	30		
	BPCL-MUMBAI	0.9	COMMISSIONED IN 1998-99			
	NRL-NUMALIGARH	3.0	COMMISSIONED IN 1999-2000	)		
	IOC-MATHURA	0.5	1999-2000			
	IOC-KOYALI	3.0	1999-2000			
	HPC-VISAKH	3.0	1999-2000			
	IOC-BARAUNI	0.9	2000-2001	18		
	CRL-COCHIN			6.0	2003-04, AWAITING APPROVA	
	MRL-CHENNAI			3.0	2003-04, AWAITING APPROVA	
	SUB TOTAL	17.3		13.8		
	ývč:					
10.	MRPL-MANGALORE	60	1999-2000			
	BHARAT OMAN			6.0		
12.	EASTERN INDIA			9.0	2003-04	
	PUNJAB REFINERY			9.0	2004-05	
	SUB TOTAL	6.0		24.0		
	PRIVATE					
	RPL-JAMNAGAR	27.0	COMMISSIONED PARTLY IN	1999-2000		
15.	EOL-JAMNAGAR	10.5	2001-2002 (MAY SLIP TO X I	PLAN)		
16.	CUDDALORE	6.0	2001-2002 (MAY SLIP TO X I	PLAN)		
	SUB-TOTAL	43.5				
	GRANT TOTAL	66.8				

#### MARKETING EFFORTS

- (a) Government is planning to commission over 3400 LPG distributorships under various marketing plans during the 9th Plan. Out of this 2078 LPG distributorships have been planned under 1996-98 Marketing Plan taking into account the following:
  - (i) To cover all urban locations with a population of 10,000 and above by including potential of adjoining villages falling within the radius of 15 Kms.
  - (ii) All urban locations having population of 5000 and above would be surveyed for setting up a distributorship and the viability to be ascertained by taking into account the potential of adjoining villages falling within 15 Kms. radius.
  - (iii) Cluster of villages within 15 Kms. radius of nucleus villages having a population of 10,000 and above, to be surveyed for setting up rural distributorship and included in the plan depending upon the viability.
  - (iv) Villages within 15 Kms. radius around towns having population of 1 lakh and above to be surveyed for opening of rural distributorships. While identifying rural locations contiguous to these towns, it would be ensured that adequate number of LPG distributorships exist in such towns so as to avoid marketing of LPG by rural distributorships in urban areas.
- (b) To cater to the increased demand 927 RO dealerships and 155 SKO-LDO dealerships have been included in the Marketing Plan 1996-98.
- 2. The following infrastructure facilities have also been planned during 9th Plan for distribution of petroleum products, and to meet the requirement of consumers across the country.

#### (A) PORT CAPACITY

The Port capacity at the major ports as on 31.3.1997 was 97 MMT, based on reassessed capacity by Ministry of Surface Transport. On the basis of schemes identified and included by MOST, the additional capacity planned to be created in the major ports during 9th Plan

period, is about 65 MMT. Oil companies have started putting captive port facilities by setting up two virtual jetties at Kandla. Action has been initiated for converting one virtual jetty to a permanent jetty. Some of the minor ports *viz*. Dahej, Pipavav, Mundra, Vadhavan and Gopalpur are also being developed to decongest the Major ports. Oil companies have also taken up setting up of jetties one each at JNPT and Ennore for which they are entering into MOUs with the respective ports.

#### (B) PRODUCT PIPELINES

Considering various advantages of pipeline transportation, an ambitious programme has been drawn up to set up a number of product pipeline during 9th plan. These pipelines would eventually help formation of a national pipeline grid for economic and efficient transportation of petroleum products. As per current outlook 2072 Kms. of product pipeline is expected to be added during 9th Plan period.

#### (C) PRODUCT TANKAGE

As on 1.4.1999, tankage for MS, HSD and SKO with marketing oil companies is 9.29 million Kl. During 1999-2000, industry has planned to put up 1.228 million Kl. Tankage. Tankage Development Plan for the balance period of 9th Plan, *i.e.* for the year 2000-2001 & 200 1-02 are being firmed up to ensure that adequate product tankage is available with the industry for operations to maintain uninterrupted supplies throughout the country. About 3.8 lakh KL of product tankage is planned to be put up in logistically difficult, hilly, far flung areas.

#### (D) BOTTLING CAPACITY

Total bottling capacity planned through 226 bottling plants at the end of IX plan is 7562.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Recommendation (Sl. No. 2, Para No. 2.3)

As against the actual plan expenditure of about Rs. 40,000 crores during 8th Five Year Plan, a plan outlay of Rs. 78,401 crores has been approved for 9th Five year Plan (1997-2002). The Committee are,

however, dismayed to note that physical targets for crude oil/gas production, accretion to reserves etc. have not been enhanced proportionate to the quantum increase in approved 9th Plan outlay. Rather in some cases targets have been kept lower than the 8th Plan targets. For instance as against the 8th Plan target of 197.5 MMT of crude oil production, the target for the same has been placed at 180.82 MMT for 9th Plan. Similarly targets for accretion to hydrocarbon reserves for 9th Plan have been put at just 50% of the targets made for 8th Plan period. The Committee feel that this must be due to Government's zeal to achieve almost 100% targets and even more during the Plan. They, however, strongly recommended that vigorous efforts should be made by all concerned Government Departments/ organisations and others involved in activities related to petroleum sector to give their best so as to improve country's self-sufficiency level in this critical sector.

#### Reply of the Government

Actual Crude Oil Production during the VIII Plan period was 154.3 MMT as against the originally planned target of 197.3 MMT which was subsequently revised to 169.45 MMT. Thus the IX Plan target of 180.81 MMT is 17% more than the VIII Plan achievement.

The approved outlay for Exploration & Production sector for IX plan is of the same order as actual plan expenditure in this sector during VIII Plan. Besides, in addition to the activities of two national oil companies in E&P Sector, several private and joint venture companies are also operating. Twenty two Exploration blocks and 18 small and medium sized fields are under Private/J.V. operations. Few more blocks and 1 medium sized and 11 small fields awarded earlier are likely to come under Private/J.V. operations shortly. Estimated investment during first three years of the IX Plan by these companies would be of the order of about US\$ 500 million excluding the participating share of NOCs. This will be additional investment over and above by NOCs. Already about 10% of country's oil and gas production is coming from Private/J.V. operations.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Recommendation (Sl. No. 7, Para No. 2.8)

It was heartening to hear from Chairman, IOC that they had decided to go ahead with Paradeep Refinery, even if Joint Ventures backed out. With the empowerment of IOC Board, they are reported to have taken very major decisions for taking up several new projects. In Committee's view all major PSUs should take similar initiative which will enable PSUs to compete with multinationals which are sure to enter in this sector due to the liberalisation process.

#### Reply of the Government

Depending on the capability and merit of the projects, major PSU Companies will take similar initiative to expedite the project.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Recommendation (Sl. No. 8, Para No. 2.9)

The Committee regret to note that production of crude oil in the country is stagnant at 33-34 MMT during last 3-4 years. The Committee also note that the crude oil production during April to November as compared to the same period in 1997-98 registered a negative growth of 4%. They are concerned that even the projected production of Crude Oil and Natural Gas in the terminal year of IX Plan which is placed at 36.98 MMT is a very modest target. They also find that import of crude oil would go up from present level of 35 MMT to 78 MMT in the year 2001-02. The demand of Petroleum products is estimated to grow at a compound annual growth rate of 5.77% and is expected to be 104.80 million tonnes in terminal year of IX Plan. Dependence on imported oil will rise from present 60% to 70% by that period. The Committee have been informed that various measures are being taken by ONGC/OIL, for enhanced oil recovery. Besides, to expedite the exploration/production activities the Government have started offering certain blocks/oil fields to private joint ventures for exploration and production under the New Exploration Licensing Policy. Further 48 more blocks have been offered under the scheme. The Committee expect while awarding contracts to various private/multinational agencies that the Government would take due precautions to safeguard country's interests not only for the short term but for a long term perspective.

#### Reply of the Government

While inviting bids the Government has been keeping in view the generally prevailing international practices for attracting private investment in the exploration and production. Moreover in all the contracts entered/to be entered, the current terms make it obligatory for the contractors to sell their oil and gas only in India.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

# Recommendation (Sl. No. 11, Para No. 2.12)

Another laudable thrust area identified for 9th Plan is to have acreage in other oil producing/perspective countries like Algeria, Vietnam and Russia where ONGC Videsh Ltd., (a subsidiary of ONGC) will acquire overseas exploration acreages and oil producing properties. In Committee's view this will be of great help to the country in future when increasing amount of oil is to be imported and due to international, economic and political situations. There may be times when availability of crude oil becomes too little. The Committee, however, feel that efforts of ONGC/ONGC (Videsh) alone may not be sufficient. They therefore, recommend that all Navratna oil sector PSUs should form a big joint venture to enter into this field, as a big corporate entity with pooled resources. This will enable them to achieve the desired results.

#### Reply of the Government

In view of the widening gap between demand and supply of oil and gas, acquisition equity oil abroad is an important plank of the strategy to achieve oil security. ONGC-Videsh Ltd. a wholly owned subsidiary of ONGC is active in exploration and development activities of oil and gas in Vietnam, Middle East and CIS countries. The objective of OVL is to acquire attractive overseas exploration acreages and producing properties to increase equity oil abroad. ONGC has a gas project in Vietnam and has been pursuing opportunities in Iraq, Iran, Russia (Udmurt, North Caspian Sea and Astrakhan) and is evaluating other opportunities.

OIL has also taken 20% participating interest in a block in Oman with M/s. TOTAL of France for exploration of oil and gas.

IOC and ONGC have entered into corporate strategic alliance in line with the recommendations of the Committee.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Recommendation (Sl. No. 12, Para No. 2.13)

Yet another area where the Committee find positive steps/outlook of the Government is towards exploitation of coal bed methane. They also find that it is an economically viable proposition. 9 prospective blocks, 3 each in West Bengal, Bihar and Madhya Pradesh have been identified for taking up the work. The Committee desire that these be expedited and more and more similar projects identified for exploration by PSUs or through participation by private organisations/joint ventures. Simultaneously, R&D schemes should be initiated to find best use of this new source of energy. In Committee's view this new source of energy will help the country in meeting the ever growing demand of oil and gas.

#### Reply of the Government

The policy for exploration and exploitation of CBM was approved by Government in July, 1997. CBM operation in this country is being undertaken for the first time and will take some time before potential of CBM at commercial level is known. The terms and conditions of CBM require consultation with the State Governments. While West Bengal Government has given their consent, Governments of Bihar, Madhya Pradesh and Gujarat have not consented and have given their objection. The policy will be implemented after consultation with State Governments are completed. ONGC has undertaken R&D projects in West Bengal and Bihar for CBM operations. Ministry of Coal is also undertaking R&D project in West Bengal under UNDP funding.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Comments of the Committee

(Please see Para Nos. 16 and 17 of Chapter I of the Report.)

# Recommendation (Sl. No. 13, Para No. 2.14)

The Committee have been informed that there are almost proven sources of hydrates (gas) available in sea bed. A few areas in Bay of Bengal have been identified for exploitation. With the technological advancement and country's experience over two decades in off-shore operations will help the project implementing agencies to tap this source of energy at a reasonable cost to make it a cost effective proposition.

#### Reply of the Government

Tapping of Gas hydrates, as a possible source of energy, is a relatively new area. Only Research activities are under way at present in some parts of the world to develop technology to exploit gas from gas hydrates. Doing this on a commercial scale will take some more time. In India, the Government has already chalked out a plan to carry out R&D work in this area.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Comments of the Committee

(Please see Para No. 17 of Chapter I of the Report.)

#### Recommendation (Sl. No. 15, Para No. 2.16)

After reviewing the overall exploration, production, supply, refining activities in petroleum sector, it is not surprising to find that country's 60% demand are met through import of crude oil and petroleum products. Due to non-enhancement of indigenous crude oil production by the end of 2001-2002, the dependence on import is likely to rise to 70%. Thanks to the international low price of crude oil, the import bill has not risen above the peak level of Rs. 32,000 crores for the year 1996-97. Since this scenario is not likely to last long, the Committee once again emphasize the need for taking concerted and sincere efforts for taking up more and more exploration activities, taking acreage outside the country, tapping of other sources of energy like coal bed methane, sea bed hydrates and other possible substitutes for hydrocarbon energy.

#### Reply of the Government

The steps being taken by the National Oil Companies for taking up enhanced exploration activities are as under:—

#### Oil and Natural Gas Corporation

ONGC in the IX Plan has envisaged to give a deliberate impetus to exploration in thrust areas identified by it, particularly deepwater areas, effective reservior management and acquisition of exploratory acreages abroad through its subsidiary ONGC-VL.

During the IX Plan, ONGC plans to drill 7 wells in the East and West Coast deepwater areas. In the first two years of the IX Plan ONGC has already drilled two wells in these areas with its own upgraded drillship Sagar Vijay. Efforts to acquire state of the art technology regarding deep-water exploration and production through strategic alliances and/or joint venture are in line.

With the major producing fields entering declining phase and the new discoveries not being of substantial size ONGC plans to achieve these targets with better reservoir management as outlined below:—

To improve the well working efficiency, continuous workover jobs are being carried out *viz*. application/optimisation of artificial lift system, water/gas shut-off jobs in high water-cut/high GOR wells, adoption of new techniques e.g. drilling of multilateral wells, application of gels/polymers for profile modification etc.

Research and development efforts are in progress for technological advances and breakthrough for increasing recoverable component of hydrocarbons and for maximising ultimate recovery.

The Enhanced Oil Recovery (EOR) schemes are under field scale implementation/planned for field implementation viz. polymer flood in Sanad, in-situ combustion in Balol and Santhal to improve the recovery as well as the country's oil production. In addition to this the ongoing in-situ combustion pilot in Becharaji field, is under commissioning.

The producing fields are reviewed at a regular interval/ need base with the availability of more data mid course correction such as in-fill drilling, optimisation of production/ injection system are implemented.

\* Additional development of Bombay High, Heera, Wasna & Sough Kadi and implementation of exploitation schemes of marginal fields like B-55 are under implementation/planned for implementation.

To augment its indigenous efforts ONGC through its subsidiary ONGC-VL is on continuous look out for exploration acreages and producing properties in foreign countries. At present ONGC-VL is pursuing such properties in Kazakhstan, Iraq and Russia. It already has a large gas discovery in Vietnam offshore to its credit as a result of its efforts in the past.

#### Oil India Limited

As a part of the measures for intensifying the exploratory efforts during the IX Plan period, OIL has carried out review of its exploratory efforts and has planned further improvement in the physical input for its exploratory programme. The major thrust areas identified by OIL for exploration during IX Plan period are:—

- (i) to probe for deeper prospect in the South Bank of River Brahmputra in Assam.
- (ii) to carry out exploratory drilling in the North Bank of river Brahmaputra in Assam.
- (iii) Survey in the Brahmaputra river bed.
- (iv) Exploratory drilling in Ganga Basin in Uttar Pradesh.
- (v) Exploratory work in Saurashtra offshore based on the studies of Geo-scientific data, which is presently being carried out.
- (vi) Detailed/semi-detailed seismic survey and exploratory drilling for identification of stratigraphic and deeper prospects in the less explored areas of the Jaislamer basin in Rajasthan.
- (vii) Exploratory activities are being carried out/planned through Joint Venture efforts in selected blocks in Rajasthan and in the Belt of Schuppen in Assam-Arkan Basin.

OIL is on look out for acreage in other countries. It has already ventured overseas by taking participating interest of 20% in Oman Block-IV in the Sultanate of Oman along with M/s Total of France.

There is ongoing effort in OIL for better Reservoir Management. Pressure Management Projects are on in its Assam Fields.

# Directorate General of Hydrocarbons (DGH)

In addition to the efforts for operating companies, DGH is also carrying out mainly reconnitory type of surveys to open up hitherto unexplored areas for future exploration. The efforts of DGH are mainly in areas where the information is required to be updated. The operating exploration companies would not normally carry out exploration in such areas on commercial consideration unless the information of these areas is adequate to develop geological perception. Thus, DGH is creating minimum data base for National and Private oil companies to look at new areas.

As a result of these, about 0.61 million sq. kms. of the sedimentary area has been opened up for exploration. These opened up areas would be the future areas for exploration in the years to come. Twelve deep water blocks in the East Coast which have been identified as a result of surveys conducted by DGH have been offered under first round of NELP. This is the first time that deep water blocks have been offered in the country. During the remaining IX Plan period, DGH propose to conduct various geo-scientific studies in several other areas.

In addition, DGH has also planned the reconnitory exploration work in Ganga Valley, Himalayan Foothills, eastern offshore, western offshore and Andaman offshore deep waters, Assam-Arakan fold belts and Kutch basins.

Equity oil aborad—Acquisition of equity oil from abroad is an important plank of strategy being pursued during the IX Plan period. Government is encouraging oil sector PSUs to take up opportunities available abroad for acquiring exploration acreages either on their own or through strategic alliances/joint ventures. ONGC-VL, IOC and OIL are pursuing opportunities abroad for acquisition of exploration acreages and producing properties.

Grant of NELP terms to Deep Water Block on ONGC—In order to intensify exploration activities in deep waters of East and West-Coast, Government is considering grant of NELP terms to Deep Water blocks granted to ONGC on nomination basis.

Coal Bed Methane—To harness a new source of energy, Government has in July, 1997 approved the policy for exploration and exploitation of Coal Bed Methane (CBM) gas. So far 9 blocks have been identified in the country and consultations with State Governments are on to get their concurrence on the policy. Bids will be invited after consultations with State Governments are completed.

Gas Hydrates—Government is also looking into exploration and development of alternative hydrocarbon resources from gas hydrates. A Steering Committee on Gas Hydrates co-ordinates initiative for R&D work in this area.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Recommendation (Sl. No. 17, Para No. 2.18)

The Committee feels that adequate safety is a subject of paramount importance for ensuring safety of man and material in the entire hydrocarbon sector. The Oil Industry Safety Directorate (OISD) assists the safety council to lay down the procedures and guidelines in the matter of design, operation and maintenance as also the creation of new assets with a view to achieve the highest safety standards in a cost effective manner. The Committee are, however, surprised to find that the OISD standards are followed by PSUs on self-regulatory basis. Admittedly OISD lacks teeth and effectiveness. To overcome this problem the Government propose to bring a draft legislation before the Parliament under which OISD would get adequate and effective powers for ensuring of safety standards for all PSUs and private sector companies in hydrocarbon sector. The Committee recommend that this legislation should be finalised and brought before the Parliament at the earliest.

#### Reply of the Government

Ministry of Petroleum and Natural Gas have already initiated action for grant of statutory status of OISD.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### **CHAPTER III**

# RECOMMENDATIONS WHICH THE COMMITTEE DO NOT DESIRE TO PURSUE IN VIEW OF THE GOVERNMENT'S REPLIES

Recommendation (Sl. No. 6, Para No. 2.7)

The Committee are glad to note that some of the oil sector PSUs like ONGC, IOC, HPCL and BPCL have been given Navratna status. After reconstitution of their Boards, the respective Boards are competent to take investment and other major decisions. The Committee trust that this is a major step in the right direction and will expedite the whole process of project planning and implementation of oil sector PSUs.

#### Reply of the Government

Five Public Sector Undertakings (PSUs) under the administrative control of the Ministry of Petroleum and Natural Gas have been accorded 'Navratna' status. These PSUs are Oil and Natural Gas Corporation Ltd., Indian Oil Corporation Ltd., Gas Authority of India Ltd., Bharat Petroleum Corporation Ltd. and Hindustan Petroleum Corporation Ltd. As the Boards of Directors of these undertakings have since been restructured with the induction of eminent experts as non-official directors, they are now competent to take investment and other major decisions as per the delegation made to them under 'Navratna' scheme. It is now expected that these five oil PSUs can incur capital expenditure on projects on the basis of their own commercial considerations.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

# Recommendation (Sl. No. 9, Para No. 2.10)

The Ninth Plan projections for recoverable reserves present a very bleak future for the indigenous oil sector. As per the estimates, with the present production rate the hydrocarbon reserves will be utilised fully by 2016, unless more recoverable reserves are found. This makes all the more necessary to enhance and expedite the exploration activities in a big way. The objective should be to ensure that no basin remains un-explored. This process will ensure accretion to the recoverable reserves.

#### Reply of the Government

So far ONGC has carried out exploration activities in following basins/areas:

Himalayan Foothills (Himachal Pradesh and J&K), Ganga Plains (U.P. & Bihar), Gujarat, Upper Assam, Bengal, Assam-Arakan, Krishna-Godavary (onland and offshore), Cauvery (onland and offshore), Bombay Offshore, Kutch-Saurashtra (onland & offshore), Kerala-Konkan, Rajasthan, Vindhyan & Gondwana Basins and Andman Offshore.

From the above, it is evident that since inception, ONGC has adopted exploration strategy whereby exploratory efforts have been spread over different sedimentary basins in different parts of the country both onland and offshore and bringing on production six hydrocarbon basins. Besides the existing producing basins, ONGC has continued to expand their exploration activities in the frontier basins viz. Ganga Valley, Himalayan Foothills, Bengal Basin, Vindhyan Basin, Gondwana Basin, Kerala-Konkan, Kutch-Saurashtra and Jaisalmer Basin with an objective of improving reserve base. Besides these onland frontier areas, ONGC had also launched an ambitious deep sea exploration plan under which two wells were drilled in the deep water areas of KG Basin in the East Coast offshore in early eighties.

Apart from the continuance of exploration in producing basins following areas form the focus of activity in the IX-Plan.

Deep water exploration both in east and west offshore area.

Kutch offshore for Mesozoic prospects.

Focus on deeper objectives of Western and North Eastern onland basins like Cambay, Kutch, Saurashtra, Rajasthan and Upper Assam.

Focus on areas of uncertain prospectivity such as Deccan plateau, beneath the thrust sheets of Nagaland and Manipur.

Stepping up of exploration activities in frontier basins and new sectors in producing basins.

Oil India Limited has carried out exploration activities in the following basins:

Upper Assam, Assam-Arakan, Rajasthan, Andman Offshore, Ganga Valley (U.P.), Saurashtra Offshore, Mahanadi (Onshore & Offshore) and North East Coast Offshore.

Out of these only 2 basins viz. Upper-Assam and Assam-Arakan are Category-I basins.

Thus, ONGC & OIL have been carrying on exploration work in 16 basins out of 26 sedimentary basins and these efforts will continue in IX Plan.

In addition to the efforts for operating companies, Directorate General of Hydrocarbons (DGH) is also carrying out mainly reconnitory type of surveys to open up hitherto unexplored areas for future exploration. The efforts of DGH are mainly in areas where the information is required to be updated. The operating exploration companies would not normally carry out exploration in such areas on commercial consideration unless the information of these areas is adequate to develop the geological perception. Thus, DGH is creating minimum data base for National and Private oil companies to look at new areas.

As a result of these, about 0.61 million sq. kms. of the sedimentary area has been opened up for exploration. These opened up areas would be the future areas for exploration in the years to come. Twelve deep water blocks in the East Cost which have been identified as a result of surveys conducted by DGH have been offered under first round of NELP. This is the first time that deep water blocks have been offered in the country. During the remaining IX Plan period, DGH propose to conduct various geo-scientific studies in several other areas.

In addition, DGH has also planned the reconnitory exploration work in Ganga Valley, Himalayan Foothills, eastern offshore, western offshore and Andaman offshore deep waters, Assam-Arakan fold belts and Kutch basins.

#### Efforts by Private Companies

At present, contract are under operation for 22 exploration blocks in different basins with JV/private companies and exploration work is either in progress or is about to start.

#### New Exploration Licensing Policy (NELP)

Government of India, in January, 1999, had invited bids under the New Exploration Licensing Policy (NELP) with attractive fiscal terms and incentives. Under this policy, the upstream public sector companies viz. ONGC and OIL are to be provided level playing field by giving them the same fiscal and contract terms as are available to private companies. A total of 48 blocks (10 onland blocks, 26 shallow water blocks and 12 deep water blocks-beyond 400 m iso-bath) were offered. By the bid closing date of 18.8.1999, a total of 45 bids for 27 blocks (4 onland blocks, 16 shallow water blocks and 7 deepwater blocks—beyond 400 m iso-bath) were received from both foreign and Indian companies including public sector undertakings. Out of these, 25 blocks (2 onland blocks, 16 shallow water blocks and 7 deep water blocks-beyond 400 m iso-bath) have been awarded. Bids for 2 blocks were rejected.

The steps being taken by the National Oil Companies for taking up enhanced exploration activities are as under:

#### Oil and Natural Gas Corporation

ONGC in the IX Plan has envisaged to give a deliberate impetus to exploration in thrust areas identified by it, particularly deepwater areas, effective reservoir management and acquisition of exploratory acreages abroad through its subsidiary ONGC-VL.

During the IX Plan, ONGC plans to drill 7 wells in the East and West Coast deepwater areas. In the first two years of the IX Plan ONGC has already drilled two wells in these areas with its own upgraded drillship Sagar Vijay. Efforts to acquire state of the art technology regarding deep-water exploration and production through strategic alliances and/or joint venture are in line.

With the major producing fields entering declining phase and the new discoveries not being of substantial size ONGC plans to achieve these targets with better reservoir management as outlined below:

To improve the well working efficiency, continuous workover jobs are being carried out *viz*. application/optimisation of artificial lift system, water/gas shut-off jobs in high water-cut/high GOR wells, adoption of new techniques *e.g.* drilling of multilateral wells, application of gels/polymers for profile modification etc.

Research and development efforts are in progress for technological advances and breakthrough for increasing recoverable component of hydrocarbons and for maximising ultimate recovery.

The Enhanced Oil Recovery (EOR) schemes are under field scale implementation/planned for field implementation *viz.* polymer flood in Sanand, in-situ combustion in Balol and Santhal to improve the recovery as well as the country's oil production. In addition to this the ongoing in-situ combustion pilot in bechraji field, is under commissioning.

The producing fields are reviewed at a regular interval/ need base with the availability of more data mid course correction such as in-fill drilling, optimisation of production/ injection system are implemented.

Additional development of Bombay High, Heera, Wasna & Sough Kadi and implementation of exploitation schemes of marginal fields like B-55 are under implementation/planned for implementation.

To augment its indigenous efforts ONGC through its subsidiary ONGC-VL is on continuous look out for exploration acreages and producing properties in foreign countries. At present ONGC-VL is pursuing such properties in Kazakhstan, Iraq and Russia. It already has a large gas discovery in Vietnam offshore to its credit as a result of its efforts in the past.

#### Oil India Limited

As a part of the measures for intensifying the exploratory efforts during the IX Plan period, OIL has carried out review of its exploratory efforts and has planned further improvement in the physical input for its exploratory programme. The major thrust areas identified by OIL for exploration during IX Plan period are:

- (i) to probe for deeper prospect in the South Bank of River Brahmaputra in Assam.
- (ii) To carry out exploratory drilling in the North Bank of river Brahmaputra in Assam.
- (iii) Survey in the Brahmaputra river bed.

- (iv) Exploratory drilling in Ganga Basin in Uttar Pradesh.
- (v) Exploratory work in Saurashtra offshore based on the studies of Geo-scientific data, which is presently being carried out.
- (vi) Detailed/semi-detailed seismic survey and exploratory drilling for identification of stratigraphic and deeper prospects in the less explored areas of the Jaisalmer basin in Rajasthan.
- (vii) Exploratory activities are being carried out/planned through Joint Venture efforts in selected blocks in Rajasthan and in the Belt of Schuppen in Assam-Arakan Basin.

OIL is on look out for acreage in other countries. It has already ventured overseas by taking participating interest of 20% in Oman Block-IV in the Sultanate of Oman along with M/s. TOTAL of France.

There is ongoing effort in OIL for better Reservoir Management. Pressure Management Projects are on in its Assam Fields.

The present position of exploration/exploitation of CBM and Gas hydrates is as given below:—

#### Coal Bed Methane (CBM)

The policy for exploration and exploitation of CBM was approved by Government in July, 1997. CBM operation in this country is being undertaken for the first time and will take some time before potential of CBM at commercial level is known. The terms and conditions of CBM require consultation with the State Governments. While West Bengal Government has given their consent, Government of Bihar, Madhya Pradesh and Gujarat have not consented and have given their objection. The policy will be implemented after consultation with State Governments are completed. ONGC has undertaken R&D projects in West Bengal and Bihar for CBM operations. Ministry of Coal is also undertaking R&D project in West Bengal under UNDP funding.

# Gas Hydrates

Tapping of Gas hydrates, as a possible source of energy, is a relatively new area. Only Research activities are under way at present in some parts of the world to develop technology to exploit gas from gas hydrates. Doing this on a commercial scale will take some more time. In India, the Government has already chalked out a plan to carry out R&D work in this area.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

# Recommendation (Sl. No. 16, Para No. 2.17)

There are cases of adulteration in supply/distribution of petroleum products. The most common malpractices being mixing of Naphtha with petrol, and kerosene with diesel and petrol. According to the Ministry of Petroleum and Natural Gas this is due to major price differences between these petroleum products. In this context, the Secretary, Petroleum assured the Committee to probe the matter thoroughly and apprise the Committee. The Committee, would await the outcome of such study and proposed action by the Government on the issues emerging out of the probe/enquiry.

# Reply of the Government

In their recommendation the Committee has stated that these area cases of adulteration in supply/distribution of petroleum products and the most common malpractices being mixing of naphtha and petrol, and kerosene with diesel and petrol.

In regard to checking adulteration/malpractices, the Government have taken the following actions:

- (i) To detect adulteration various steps like blue dyeing of kerosene (PDS), furfural doping, filter paper test, stock reconciliation, regular and surprise inspection of retail outlets by Industry teams and by mobile laboratories etc. are taken by oil companies.
- (ii) The Government has also approved setting up of additional 25 labs for ensuring the quality control of petroleum products.
- (iii) The Government has issued amended Motor Spirit and High Speed Diesel (Regulation on Supply and Distribution and Prevention of Malpractices) Order, 1998 to effectively check adulteration and malpractices of MS/HSD by plugging the loopholes.

(iv) The Revised marketing Discipline Guidelines (RMDG) came into effect from 12.5.1998. The punishment for adulteration was made more stringent by including imposition of monetary fines on erring retail outlet dealers. Delhi High Court had stayed the operation of above guidelines and Marketing Discipline Guidelines, 1995 and 1998 (MDG). It may be stated that in the recent judgement, Delhi High Court dismissed the petitions filed by Delhi Petrol Dealer Association and Federation of All India Petroleum Traders challenging MDG 95 and RMDG 98.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

# Recommendation (Sl. No. 18, Para No. 2.19)

The Committee feel that safety aspects in remote areas like North Eastern areas do not have enough safeguard to meet any casualty or disaster. The Committee would like the Ministry to examine this earnestly with a view to have adequate and effective safety system in such areas.

# Reply of the Government

Oil Industry Safety Directorate has a specific role to recommend safe practices for the oil industry starting from oil exploration & drilling upto marketing of products. In search of excellence towards safety, OISD has developed 65 standards relating to layouts, operation, maintenance, inspection, external safety audit fire fighting, occupational health, emergency preparedness plan etc. These standards are implemented on self-regulatory basis by the public sector oil companies. In addition to that, oil companies comply with various statutory requirements pertaining to handling of various emergencies in petroleum installations. A on-site disaster management plan provides the measures to contain and minimise the threats due to spillage of petroleum products during storage & handling within the premises, release or escape of flammable/toxic gases, fire, explosion etc. The necessary preventive and protective steps are taken in line with the statutory requirements, nature & causes of consequences of hazards, hazards analysis etc. The off-site disaster management plan is prepared by the concerned authority i.e. District Collector etc. after obtaining the requisite information from the industry to take care of any emergency.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### **CHAPTER IV**

# RECOMMENDATIONS IN RESPECT OF WHICH REPLIES OF GOVERNMENT HAVE NOT BEEN ACCEPTED BY THE COMMITTEE

#### Recommendation (Sl. No. 3, Para No. 2.4)

The Committee regret to note that out of 9th Plan outlay of about Rs. 78,400 crores, the estimated expenditure during the first 3 years of the plan will be about Rs. 34,000 crores which is much less than 50% of the approved plan outlay. The actual expenditure during first year of the Plan (1997-98) was Rs. 10141 crores (i.e. about 1/8th). During second year of the Plan (1998-99), the outlay was revised downwards from Rs. 15389 crores to Rs. 12381 crores (i.e. less than 1/6th). The outlay for 3rd year (1999-2000) has been further reduced to Rs. 12123 crores (i.e. much less than 1/6th). The Committee wonder that with non-utilisation of plan funds, how the Government would be able to achieve the objectives and targets set for various activities. The Committee, therefore, urge upon the Government to review the overall policy planning regarding exploration and production strategy in particular with a view to accelerating production of indigenous crude oil/gas in the country. They also emphasise that during remaining period of the 9th Plan, balance outlay should be utilised fully with view to achieve the targets of the Plan and implement the policy regarding the thrust areas of the Plan.

#### Reply of the Government

The E&P targets of IX Plan were based on the experience gained during VIII Plan and expected increase in the private sector participating in exploration and production. The thrust of IX Plan has been on improving quality of exploration by NOCs for enhanced success rather than on total quantity of exploratory inputs. However, ONGC & OIL have planned enhanced exploratory inputs and higher reserve accretion targets during the IX Plan.

Estimated investment during first three years of the IX Plan by these companies would be of the order of about US\$ 500 million excluding the participating share of NOCs. This will be additional investment over and above by NOCs.

The enhanced reserves accretion is likely to lead to higher hydrocarbon production in long run.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Comments of the Committee

(Please see Para No. 9 of Chapter I of the Report)

Recommendation (Sl. No. 4, Para No. 2.5)

The Petroleum Secretary informed the Committee that major shortfall in utilisation of plan funds has been on account of delay in taking up exploration work by ONGC, OIL and GAIL (Rs. 500 crores) and delay in taking up implementation of new refinery projects (Rs. 2000 crores). Examination of the related details by the Committee also revealed that on one hand there has been delay in implementation of new refinery projects by PSUs (alongwith their joint venture partners) and on the other hand private sector like Reliance whose Gujarat Refinery's capacity has enhanced their capacity to 27 MT from the initial 12 MMT. Reportedly they are in process of setting up another refinery of mega size. The Committee apprehend that a situation may come, when in the wake of available capacity PSUs may be asked to abandon their projects. The Committee would like to caution the Government about such eventualities. They, therefore, urge upon the Government to expedite the approval (if any) and implementation of projects planned by oil sector PSUs. Also in these circumstances Ministry's contention that PSUs investment shortfall has been made up by private sector does not hold good.

#### Reply of the Government

Government is encouraging PSUs also to implement its expansion proposals or grass-root joint venture proposals. Though a few PSUs project have been delayed due to Environmental clearance or inedequate response from JV Partners but it is also a fact that only two private refineries have made progress in project implementation though 19 number of proposals have been approved by the Government, for domestic Tarrif Area as well as 100% EOU.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Comments of the Committee

(Please see Para No. 9 of Chapter I of the Report)

#### Recommendation (Sl. No. 5, Para No. 2.6)

It also came to the notice of the Committee that Bina Refinery Project is pending approval due to environmental considerations. The Committee recommend that Ministry of Petroleum & Natural Gas should take up the issue with their counterparts in Ministry of Environment at the highest level to sort out the issue. The Committee also recommend that the Government should examine the possibility of waiver of environment clearance of oil sector projects, which have due approval of the Government/Planning Commission. The Committee would await Government specific reply in this regard.

# Reply of the Government

The matter to examine the possibility of waiver of environmental clearance for oil sector project was taken up with Ministry of Environment & Forests. As per the Ministry the environmental clearance for 29 selected activities has been made statutory w.e.f. 27th January 1994 only after taking into account the need for EIA for these projects. The oil sector broadly consists of the following categories of industrial operations.:-

Exploration and production of oil and gas.

Transportation and storage of crude oil and petroleum products.

Refining of crude oil to produce finished products.

The environmental impact of each project depends not only on the location of the project but also on the process and operations involved in this industry. There are also possibilities of severe risk if proper mitigation measures are not taken in the early stages of the project. The production of oil/gas involves disposal of waste material and storage and transfer of the crude oil/gas through the pipeline. The pipeline if it passes through ecologically sensitive areas(s)/thickly populated area, comprehensive environmental management measures need to be taken. Oil refineries and related industrial complexes because of the very hazardous nature of the chemicals and operations involved, necessitate a detailed environmental examination in order to facilitate integration of suitable remedial measures. Hence, Ministry of Environment & Forests has not accepted the view that the oil sector be exempted from the purview of environmental clearance.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Comments of the Committee

(Please see Para No. 10 of Chapter I of the Report)

Status of Environmental Clearance for Refinery Projects

	Bhatinda Refinery	Bina Refinery	Paradip Refinery
No Objection Certificate (NOC) from State Pollution Control Board for Crude Oil Terminal (COT)	Received on 25-5-98	Received on 22-9-95	Received
NOC from State Pollution Control Board for Pipeline	Gujarat—received on 25-5-98 Rajasthan—Received on 7-9-98 Haryana—Received on 11.5.98 Punjab—Received on 18-5-98	MP-received on 16-5-97 Gujarat-received on 22-9-95.	
NOC from State Pollution Control Board for Refinery	Received on 18-8-98	Received on 23-9-95	Received on 10.6.97
NOC from State Pollution Control Board for Power Plant	Received on 18-8-98	Received on 16-6-98	

		Bhatinda Refinery	Bina Refinery	Paradip Refinery
5.	NOC from State Pollution Control Board for Single Point Mooring (SPM) Facilities	Received on 8-9-98	Kandla Port Trust waters-received on 22-9-95 Gujarat Maritime Board waters- received on 30-5-98	Received
<b>6</b> .	Environmental Clearance for Refinery from Ministry of Environment & Forests	Received on 6-11-98	Received on 16-2-95	Received on 24-12-97
	Environmental clearance for Power Plant.	Received on 23-2-99	Received on 16-2-95	Received
	Coastal Regulation Zone (CRZ) clearance for SPM/Submarine Pipeline/COT	Received from Govt. of Gujarat Application under consideration with MOEF	Received on 29-6-98	Received
	Environmental clearance for Crude Oil Pipeline	Yet to be issued and will be issued along with COT	Received on 20-9-95	Received
10.	Clearance under Forest Conservation Act.	NA	In-principle clearance received from MOE&F Final clearance awaited	In principle clearance issued by MOEF on 6-4-99 Final clearance awaited
11.	Wild Life Protection Act clearance	NA	Yet to be received	NA
12.	Any other clearance required/taken.	NA		

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I. dated 4.2.2000]

#### Recommendation (Sl. No. 10, Para No. 2.11)

With the opening up of oil exploration/production to private/multinationals, the national oil companies viz. ONGC/OIL are to compete with others for taking new blocks/basins for exploration. There may be areas where ONGC/OIL must have done some survey/exploratory activities in developing certain fields in the past. On being enquired, Secretary Petroleum deposed before the Committee that ONGC is compensated by making it a partner in the joint venture companies. The Committee desire that wherever the PSUs have done some work and have incurred certain cost in developing these fields, they should be duly compensated in case the same areas are given to private/multinationals companies.

# Reply of the Government

# For exploration blocks

- (i) data packages are priced by NOCs and income flows to NOCs.
- (ii) the objective is to assess hydrocarbon potential of an area in an optimal manner. Once an exploration area is awarded, it is in the interest of Government to see that all relevant data, where ever existed, made available to the contractor for cost effective and efficient exploration, as any expenditure incurred on the project is cost recoverable and the objective of optimal exploration may not be served.
- (iii) As regards discovered fields, the past cost compensation to NOCs has to be seen as a total package and revenue of Government and NOCs from the project and while considering such proposals an overall view needs to be taken including past cost compensation to NOCs with the objective of maximising benefits to the Government.

[Ministry of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Comments of the Committee

(Please see Para No. 13 of Chapter I of the Report)

#### CHAPTER V

# RECOMMENDATIONS IN RESPECT OF WHICH FINAL REPLIES OF GOVERNMENT ARE STILL AWAITED

#### Recommendation (Sl. No. 14, Para No. 2.15)

As against the present refining capacity of 67.55 MMTPA, the total refining capacity is expected to be 113.95 MMTPA by 2001-2002 and 145.75 MMTPA by 2006-07. These estimates are near to the projected demand of petroleum products for the respective periods. As indicated elsewhere in the Report, the Committee again reiterate that the Ministry/concerned oil sector PSUs (including their joint ventures) should plan and take up their respective expansions/new refinery projects at the earliest. Needless to point out that the Government will set target for each project and monitor the progress of the same with a view to complete them within stipulated cost and time schedule.

#### Reply of the Government

Expansion of Koyali, Barauni & Mathura Refineries (IOC) Vizak Refinery (HPCL), Mangalore Refinery (JV) Grass Root Numaligarh Refineries are already in advanced stage of implementation. Expansion of other PSU refineries *viz.* Madras Refinery, Cochin Refinery, Panipat Refinery IOC and installation of grass root Paradip Refinery (JV) IOC will be expedited.

[Minister of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Recommendation (Sl. No. 19, Para No. 2.20)

From various Press Report, the Committee find that the Government is in process of examining the Nitish Sen Gupta Report regarding restructuring of some of the oil sector PSUs viz. MRL, CRL, IBP, BRPL etc. The Committee are dismayed to note that Government have initiated the process of implementing major changes in the oil sector without in any way, keeping them abreast of it. The Committee accordingly recommend that before taking any such major decision the matter should be placed before them for consideration.

## Reply of the Government

This Ministry constituted a Committee chaired by Dr. Nitish Sengupta, Director, International Management Institute in October, 1998 with the following terms of reference:

- (i) To study and analyse the emerging scenario in the Petroleum Sector after the year 2001, with specific reference to development and creation of market competitiveness and the viability of stand-alone refineries and marketing company under the conditions of de-regulation/liberalisation and globalisation.
- (ii) To examine the option available and suggest strategic alliance/merger of such oil companies between themselves or otherwise so that we may develop new player(s) on an integrated basis of upstream and downstream activities in the domestic oil sector of marketing and refining, who can stand up to the future competitive conditions and market forces and also operate as viable units with potential for growth.
- (iii) to recommend an action plan having regard to strengths/ weakness of these units and the various oil companies and their Vision Plans to meet the objective indicated in para (ii) above.

The report is under examination.

[Minister of Petroleum and Natural Gas O.M. No. G-25015/1/99-Fin. I, dated 4.2.2000]

#### Comments of the Committee

(Please see Para No. 20 of Chapter I of the Report)

New Delhi; 29 February, 2000 10 Phalguna, 1921 (Saka) MULAYAM SINGH YADAV, Chairman, Standing Committee on Petroleum and Chemicals.

# **APPENDIX-I**

#### **MINUTES**

# STANDING COMMITTEE ON PETROLEUM & CHEMICALS 1999-2000

# Fourth Sitting 28.02.2000

The Committee sat from 1000 hrs. to 1100 hrs.

#### **PRESENT**

Shri Mulayam Singh Yadav — Chairman

# Members

Lok Sabha

- 2. Shri Ashok Argal
- 3. Shri Padam Sen Choudhary
- 4. Shri Dilip Kumar Mansukhlal Gandhi
- 5. Smt. Sheela Gautam
- 6. Shri Shriprakash Jaiswal
- 7. Shri P. Mohan
- 8. Shri Ashok Pradhan
- 9. Shri Ramesh Chand Tomar
- 10. Shri Ratilal Kalidas Varma
- 11. Shri B. Venkateshwarlu

# Rajya Sabha

- 12. Shri Ahmed Patel
- 13. Smt. Basanti Sharma
- 14. Shri H. Hanumanthappa
- 15. Shri Kanak Mal Katara
- 16. Shri Dipankar Mukherjee
- 17. Shri Gaya Singh

#### SECRETARIAT

1. Dr. A. K. Pandey Additional Secretary

2. Shri Brahm Dutt Deputy Secretary

3. Shri J. N. Oberoi Under Secretary

The Committee considered and adopted the following Draft Reports:—

(i) Draft Report on Action Taken by the Government on the recommendations contained in the 10th Report of the Committee on 'Demands for Grants 1999-2000 of Ministry of Petroleum & Natural Gas'

- (ii) \*\*
- (iii) \*\*
- 2. Some Members of the Committee desired that the Committee should undertake a study tour of oil exploration sites such as Bombay High. The Chairman observed that this may be done later.
- 3. The Committee also authorised Chairman to finalise the reports after factual verification from the concerned Ministries and present them to the Parliament.

The Committee then adjourned.

# APPENDIX II

# [Vide Para No. 4 of the Introduction]

Analysis of the Action Taken by Government on the Recommendations contained in the Tenth Report of the Standing Committee on Petroleum and Chemicals (1998-99) (Twelfth Lok Sabha) on 'Demands for Grants 1999-2000' of the Ministry of Petroleum and Natural Gas

I.	Total Number of recommendations	19
II.	Recommendations that have been accepted by the Government ( <i>Vide</i> Recommendation at Sl. Nos. 1, 2, 7, 8, 11, 12, 13, 15 and 17)	9
	Percentage to Total	
III.	Recommendations which the Committee do not desire to pursue in view of Government's reply ( <i>Vide</i> Recommendation at Sl. Nos. 6, 9, 16 and 18)	4
	Percentage to Total	
IV.	Recommendations in respect of which replies of Government have not been accepted by the Committee (Vide Recommendation at	,
	Sl. Nos. 3, 4, 5 and 10)	4
	Percentage to Total	21.05
V.	Recommendations in respect of which final replies of Government are still awaited (Vide Recommendation at Sl. Nos. 14 & 19)	2
	Percentage to Total	