- (i) Intensification of exploration which may eventually lead to enhanced production;
- (ii) Intensification of work-over operations;
- (iii) Use of enhanced oil recovery techniques;
- (iv) Induction of advanced technology.
- (d). The consumption of (c) and expected petroleum products is increase continuously in a foreseeable future and the short fall is expected to be met through imports. Due changing conditions in the International Oil Market it is not possible; at this stage, to assess the burden on the exchequer from such imports.
 - (e) Some of the steps contemplated are:
 - -waste heat recovery
 - -proper combustion of fuels
 - -proper insulation
 - —development of energy efficient equipment
 - —promoting better driving and maintenance practices
 - —development of efficient stoves
 - -ractification of pump sets.
- (f) The target of production of crude oil for the Seventh Plan is expected to be achieved.

Generation Capacity of Srisailam Hydro Electric Power

- 2357. SHRI V. TULSIRAM: Will the Minister of ENERGY be pleased to state:
- (a) whether Srisailam is the biggest hydro-electric power generating centre in the country;
- (b) if so, the present generating capacity of the project and expected increased capacity;
- (c) whether there is a proposal to instal such more projects in Andhra Pradesh

keeping in view the dire needs of electricity in the State to increase irrigational facilities for the crops; and

(d) the extent to which the project shall meet the requirements of irrigational/industrial requirements of the State?

THE MINISTER OF ENERGY (SHRI VASANT SATHE): (a) Srisailam Hydro Electric Project is not the largest hydroelectric Project in operation in the country at present.

- (b) The present generating capacity is 440 MW. This is expected to go upto 770 MW in 1986-87.
- (c) and (d). There is a proposal to set up the Srisailam Left Bank Power Station with 9×110 MW pump turbine units. The extent of benefits from the project, which is in the State sector, would be known after the project report has been finalised and approved.

Recruitment of Local People by ONGC in Eastern Region

2358. SHRI PARAG CHALIHA: Will the Minister of PETROLEUM AND NATURAL GAS be pleased to state:

- (a) the total number of Class I and Class II Officers in the Oil and Natural Gas Commission presently posted in the Eastern Region of the Commission and the total number of such officers having permanent residences in Assam, Meghalaya, Nagaland and Arunachal Pradesh; and
- (b) whether recruitment for Class III posts in the Oil and Natural Gas Commission which was hitherto done locally has since been stopped?

THE MINISTER OF STATE OF THE MINISTRY OF PETROLEUM AND NATURAL GAS (SHRI CHANDRA SHEKHAR SINGH): (a) The total number of Class I and Class II Officers in the ONGC presently posted in the Eastern Region of the Commission is 1892 and 758, respectively.

Information regarding the total number of such officers having permanent residence in Assam, Meghalaya, Nagaland and Asunachal Pradesh is being ascertained and will be laid on the Table of the House.

(b) No, Sir.

Setting up of Wind Mills and Installation of Soler Pumps

2359. SHRI MAHENDRA SINGH: Will the Minister of ENERGY be pleased to state:

- (a) whether different State Governments have submitted schemes for setting up wind mills and installation of solar pumps with a view to conserving the sources of energy by diversifying to non-conventional energy sources;
- (b) if so, the details of the schemes indicating their cost and the extent of reduction in pressure on conventional sources of energy like hydro-electric and thermal power and petroleum sought to be effected thereby; and
- (c) whether Central aid has been sought by the State Governments for these schemes and if so, Government's reaction thereto?

THE MINISTER OF ENERGY (SHRI VASANT SATHE): (a) to (c). Under a Centrally sponsored scheme of the Ministry of Water Resources, based upon requests received, central assistance as 50% share of subsidy for installation of solar photovoltaic pumps and windmills was released to the following States during 1982-83 to 1984-85:

Total amount released (Rs. in lakhs)

1. Gujarat	5.00
2. Karnataka	4.74
3. Madhya Pradesh	1.44
4. Orissa	2.63
5. Tripura	1.97
6. Uttar Pradesh	6.231

Further, under the demonstration programme of the Department of Non-Conventional Energy Sources being implemented in different States, over 300 solar

photovoltaic pumps and 1,300 windmills have so far been supplied. This programme has been implemented mainly as an initiative of the Central Government.

Solar photovoltaic pumps and windmills serve as useful devices for pumping water for micro-irrigation and drinking water supply, and in certain areas they already compare favourably with diesel for electric pumpsets.

Exploration in Deeper Waters by West Germau Firms

2360. SHRI BANWARI LAL PUROHIT: Will the Minister of PETROLEUM AND NATURAL GAS be pleased to state:

- (a) whether West Germany has offered the latest technologies to the Oil and Natural Gas Commission for conducting exploration in deeper waters;
- (b) if so, full details of the West German firm which will conduct exploration in deeper waters;
- (c) whether any other firm of West Germany had also been conducting such task earlier; and
- (d) if so, the details thereof and also the details of the agreement with the West German firm?

THE MINISTER OF STATE OF THE MINISTRY OF PETROLEUM AND NATURAL GAS (SHRI CHANDRA SHEKHAR SINGH): (a) No, Sir.

- (b) Does not arise.
- (c) and (d). In 1978, M/s. Prakala Seismos Company of West Germany under an agreement had carried out seismic surveys in the Krishna-Godavari Offshore area in the East Coast. The area covered was Nizampatnam base to Puri; total coverage was 4520 line Kms. with 24 Fold CDP surverys.

Agreement with this company was signed on 25-1-1978 to carry out surveys over a period of six months. The work was completed by them.