राज्य सरकारों तथा संघ राज्य क्षेत्र प्रशासनों से एकवित की जा रही है।

(ग) भारत रक्षा तथा ग्रान्तरिक स्रक्षा नियमों के प्रधीन जांच-पडताल तथा विचारण के लिए लम्बित पडे मामलों पर पूर्निवचार करने भीर भ्रायिक भ्रपराधियों तथा हिंसक कार्यों के दोषी व्यक्तियों े मामलों को छोडकर सभी मामलों को वापस लेने के लिए राज्य सरकारों संघ राज्य क्षेत्र प्रशासनों को प्रनदंश दिये गये हैं। इन प्रनदेशों में बे व्यक्ति भी शामिल हैं जिन्हें न्यायालयों द्वारा भारत रक्षा तथा ग्रान्तरिक सुरक्षा नियमों के विभिन्न उपबन्धों के भ्रधीन सजा दी गई है ग्रीर राज्य सरकारों संघ राज्य क्षेत्र प्रशासनों को उपर्यक्त दोनों श्रेणियों के कैदियों के मामलों, श्रयात् आर्थिक अपराधियों और हिंसक कार्यों के दोषी व्यक्तियों को छोड कर ऐसे सभी कैदियों की सजाएं जो उनके द्वारा काटी नहीं गई हैं माफ करने की सलाह दी गई है।

## Geo-Thermal Power Sources

136. SHRI P. RAJAGOPAL NAIDU: Will the Minister of ENERGY be pleased to state:

- (a) whether there are any Geo-Thermal Power sources in our country; and
- (b) whether the Government are utilising the sources?

THE MINISTER OF ENERGY (SHRIP. RAMACHANDRAN): (a) Geothermal manifestations in the form of hot springs occur in several parts of the country. The most important among these are located in Northwestern Himalayas and along the West Coast.

(b) Investigations are at present in progress in promising areas in the North-Western Himalayas and along the West Coast to establish the geo-

thermal energy potential and examinethe feasibility of utilising it for power generation. Some experiments relating to utilisation of geo-thermal energy from some investigation holes have been tried for uses other than power generation, like refining borax and sulphur.

## Utilisation of Solar Energy

137. SHRI P. RAJAGOPAL NAIDU: Will the Minister of ENERGY bepleased to state:

- (a) whether any research is being conducted regarding utilisation of solar energy; and
  - (b) if so, the results thereof?

THE MINISTER OF ENERGY (SHRI P. RAMACHANDRAN): (a) and (b). Yes. Sir. Research activities are directed towards developing (i) thermal uses of solar energy; and (ii) direct conversion into electricity. The thermal uses of solar energy require devising of collector systems and using this energy directly or by converting into mechanical energy. Considerable progress has been made in developing flat plate collectors which enable solar energy to be utilised at low and medim temperatures. Work is continuing on improving the collection system by evolving appropriate selective coatings and on reducing the cost of collection. Priorities have also been laid down for the end-use of such energy and the main items are as follows:

- (i) pumping for irrigation purposes;
- (ii) drying of agricultural products;
- (iii) cooling for food preservation;
- (iv) desalination of salt and brackish. water;
- (v) water heating and space heating;
- (vi) air-conditioning.

Work on developing suitable systems for these items has been undertaken. As yet, the only item which is near commercial viability is that for water and space heating. In addition, a pilot project has also been taken up for using the thermal energy collected through flat plate collectors for generating electricity, using the conventional technology. The plant is expected to be commissioned by the end of 1977.

Technical feasibility of directly converting solar energy into electricity, using solar cells, has been established but the systems are costly and not economically viable. Work is continuing for improving technology and reducing costs.

## National Consumer Protection Council

- 138. SHRI P. RAJAGOPAL NAIDU: Will the Minister of CIVIL SUP-PLIES AND COOPERATION be pleased to state:
- (a) whether there is a National Consumer Protection Council in the country;
  - (b) if so, its activities; and
- (c) whether it is having branches in the States?

THE MINISTER OF COMMERCE AND CIVIL SUPPLIES & COOPERA-TION (SHRI MOHAN DHARIA): (a) and (b). A decision has been taken to set up a National Consumer Protection Council to build up and foster consumer movement in the country. The activities envisaged for this apex body include tendering of advice to the Central Government on matters related to production, supplies and distribution of essential commodities; examination of consumer grievances and initiation of remedial action; bringing to the notice of the concerned agencies problems relating to trade practices or prices of specified commodities; collecting and disseminating information relating to consumer matters; assisting State Governments and Union Territories in development of the consumer movement in their areas and providing assistance, including financial assistance, to organisations and associations formed for the welfare of the consumers.

(c) The composition of the Council is in the process of being finalised. The Council will then decide the modality of its operations including the establishment of branches.

## Launching of Satellite

139. SHRI P. RAJAGOPAL NAIDU:

DR. MURLI MANOHAR JOSHI:

Will the Minister of SPACE be pleased to state:

- (a) whether Government propose to launch a satellite in the near future;
- (b) if so, the main feature thereof; and
- (c) the time by which it is expected to be launched?

THE PRIME MINISTER (SHRI MORARJI DESAI): (a) and (c). It is proposed to launch two satellites in the near future viz., Satellite for Earth Observation which will be launched sometime in 1978 and the Rohini Satellite which will be launched in 1979.

(b) The Satellite for Earth Observation is essentially a modification of Aryabhata, having more complex payload, data handling and control system. This satellite will weigh slightly over 400 Kgs. and will carry two television cameras and microwave radiometers payloads. This would enable photography and remote sensing of gross features, which will be applicable to forestry, study of bio masses, hydrological features, etc.

The Rohini Satellite, which will be launched with the use of Indian made satellite launch vehicle, will weigh approximately 40 Kgs. This satellite will essentially carry technological payloads to monitor the performance of the launch vehicle.