

**GOVERNMENT OF INDIA
ATOMIC ENERGY
LOK SABHA**

UNSTARRED QUESTION NO:1723
ANSWERED ON:03.12.2014
PRODUCTION OF ELECTRICITY
Jardosh Smt. Darshana Vikram

Will the Minister of ATOMIC ENERGY be pleased to state:

- (a) the details of targets of electricity production set by the Department of Atomic Energy from nuclear resources during the next five years;
- (b) whether the country has sufficient nuclear fuel reserves/supply chain to optimally utilise existing/proposed plants in next five years and if not, the efforts made by the Government to fill up the gap;
- (c) the number, capacity and current status of installation of new nuclear power stations during the next five years, location-wise; and
- (d) whether the Department is in touch with State Governments to sort out issues relating to land etc. for early installation of new plants and if so, the details thereof?

Answer

THE MINISTER OF STATE FOR PERSONNEL, PUBLIC GRIEVANCES & PENSIONS AND PRIME MINISTER'S OFFICE
(DR.JITENDRA SINGH):

(a) The targets of electricity production are set Five year plan wise. The target of electricity generation from nuclear power in the XII Five Year Plan period (2012-17) is 241748 Million Units. The target of electricity generation beyond the XII Five Year Plan period is yet to be finalised.

(b) At present, out of the total capacity of 4780 MW, a capacity 1940 MW is under International Atomic Energy Agency (IAEA) Safeguards and entitled to use imported fuel. Of this, 100 MW Capacity (RAPS unit-1) is under extended shutdown for techno-economic assessment for continued operation. In addition, Kudankulam-1(1000 MW), which was connected to the grid in October 2013 also uses imported uranium.

The fuel supply for reactors under IAEA safeguards & using imported fuel is sufficient to operate them at their rated capacity. The remaining capacity of 2840 MW fuelled by indigenous uranium operates at lower than rated power due to inadequate supply of indigenous uranium. The government has made efforts to augment indigenous uranium supply by opening of new mines and processing facilities.

In respect of the nuclear power reactors to be set up with international cooperation, in the commercial contracts will include necessary provisions to ensure fuel supply for the entire lifetime of the reactors.

In respect of indigenous reactors planned to be set up, the fuel supply will be ensured from indigenous and imported sources. Decisions on use of indigenous / imported fuel in respect of new indigenous reactors will be taken by the government at an appropriate time.

(c) The XII Five Year Plan proposals envisage start of work of nineteen (19) new nuclear power reactors with a total capacity of 17400 MW. This includes two Fast Breeder Reactors of capacity 2 x 500 MW located at Kalpakkam, Tamil- Nadu and one Advanced Heavy Water Reactor (AHWR) of capacity 300 MW. The details are as under:

Project	Location	Capacity (MW)	Status
GHAVP 1&2	Gorakhpur Haryana	2 x 700	Project was accorded financial sanction for Rs.20594 crore , Environmental clearance obtained. Procurement of Long delivery critical equipment initiated . Site infrastructure works in progress. Start of construction (First Pour Concrete) Scheduled in 2015.
Chutka	Chutka, Madhya Pradesh	2 x 700	Pre-project activities (Land acquisition, obtaining statutory clearances, site investigations) in progress. Public Hearing completed.

Atomic Power Project

(CMAPP
1&2)
MahiBanswara, Mahians ara, 2 x 700 Pre-project activities (Land acquisition,
1&2 Rajasthan obtaining statutory clearances, site
investigations) in progress. ToRs for EIA
studies for Env. Clearance approved.
Kaiga 5&6 Kaiga, 2 x 700 Land available, other pre-project activities
Karnataka initiated.
KKNPP 3&4 Kudankulam, 2 x 1000 Project was accorded financial sanction for
Tamilnadu Rs.39,849 crore , statutory clearances obtained.
Site made ready. General Framework Agreement
signed with Atomstroy export of Russia . Units
expected for launch in 2016 after completion
of various steps specified in GFA.
JNPP 1&2 Jaitapur, 2 x 1650 Land acquired, Environmental and CRZ clearances
Maharashtra obtained, Site infrastructure and investigation
works in progress. Discussions with M/s Areva,
France to arrive at project proposal in progress.
Kovvada, 1&2 Kovvada, 2 x 1500 Pre-project activities (Land acquisition,
Andhra obtaining statutory clearances, site
Pradesh investigations) in progress. Discussions with
GE Hitachi Nuclear Energy (GEH) to arrive at
project proposal are in progress.
Chhaya Mithi Chhaya Mithi 2 x 1100 Public Hearing completed. Pre-project activities
Virdi 1&2 Virdi, (Land acquisition, obtaining statutory clearances,
Gujarat site investigations) in progress. Preliminary
contract for sharing technology details signed
with Westinghouse Electric Company (WEC),
discussions to arrive at project proposal are
in progress.
FBR 1&2 Kalapakkam 2 x 500 Detailed Project Report under preparation.
AHWR Yet to be 1 x 300 The detailed engineering of major structures/
decided systems/components (SSCs) of AHWR is being
carried out which includes preparation of
technical documents and specifications for
design, 3D CAD modeling, 2D layout drawings
and stress & seismic analysis of SSCs. Standing
Site Selection Committee is examining the issue
associated with siting of AHWR at candidate site.

(d) Yes Sir. Regular interactions are held with the respective State Government at various levels in respect of land acquisition, Resettlement and Rehabilitation (R&R) packages and their implementation and other related areas for faster implementation of the projects.