GOVERNMENT OF INDIA ATOMIC ENERGY LOK SABHA

UNSTARRED QUESTION NO:5622 ANSWERED ON:07.09.2011 EPR PLANTS FROM AREVA Mirdha Dr. Jyoti

Will the Minister of ATOMIC ENERGY be pleased to state:

- (a) whether the Government is purchasing European Pressurized Reactor (EPR) plants from Areva, hitherto an untried reactor;
- (b) if so, the details of EPR purchased/proposed to be purchased by the Government during the last three years, country and company-wise alongwith the funds spent thereon;
- (c) the time by which these are likely to be made functional and commence power generation;
- (d) whether the Government is aware of the US Nuclear Regulatory Commission's communication to Areva that the company needs to demonstrate the effectiveness of their safety standards;
- (e) if so, the details thereof;
- (f) whether the Government concur with the views of some of the experts that this technology has been plagued with problems, is needlessly expensive and more importantly, yet to prove its efficiency; and
- (g) if so, the details thereof and the action taken/proposed to be taken by the Government in this regard?

Answer

THE MINISTER OF STATE FOR PERSONNEL, PUBLIC GRIEVANCES & PENSIONS AND IN THE PRIME MINISTER'S OFFICE (SHRI V. NARAYANASAMY)

- (a) The EPRs planned to be set up at Jaitapur in Maharashtra are of evolutionary design with several new safety features. The design of these reactors evolved from many years' operational feedback of N4 reactors in operation in France and KONVOI reactors in operation in Germany. Currently EPRs are under construction in Finland, France and China.
- (b) Techno-commercial negotiations between Nuclear Power Corporation of India Limited (NPCIL) and AREVA, France for setting up 2 x 1650 MW EPRs at Jaitapur are in progress.
- (c) At present pre-project activities are in progress at the site. Construction of the first phase is planned during the XII Five Year Plan. The gestation period (from first pour of concrete to commercial operation) of the EPRs is about 66 months.
- (d)&(e) On review by Nuclear Power Corporation of India Limited (NPCIL), it was found that the originally proposed computer systems needed further reinforcement to meet the regulatory requirements. Similar observations were also expressed by other regulators like USNRC (USA), STUK (Finland), HSE (UK), ASN (France). Accordingly, modifications of computer based system for Control & Instrumentation architecture in respect of EPR units to be set up at Jaitapur site will be done to meet all the safety and regulatory requirements of AERB.
- (f)&(g) Atomic Energy Commission (AEC) deputed an expert Committee for assessing the technology and safety aspects of EPRs. The Committee carefully examined these issues and visited the plants under construction in Finland and France. The Committee also had discussion with regulatory authorities in Finland and France. The Committee's report, placed in the AEC meeting, has clarified all doubts regarding safety and efficiency. Discussions between NPCIL and AREVA are in final stages to evolve a business model of shared scope of work so as to arrive at a viable tariff comparable to that of contemporary electricity generating plants in the region.