

GOVERNMENT OF INDIA
DEPARTMENT OF ATOMIC ENERGY
LOK SABHA
UNSTARRED QUESTION NO.1920
TO BE ANSWERED ON 07.03.2018

INCIDENTS OF RADIATION EXPOSURE

1920. SHRIS.P. MUDDAHANUME GOWDA:
SHRI B.V. NAIK:

Will the PRIME MINISTER be pleased to state:

- (a) whether the cases of nuclear radiation exposure to local population and to scientists/employees working in different nuclear plants across the country have been reported;
- (b) if so, the details thereof during each of the last three years and the current year;
- (c) the remedial measures taken/proposed to be taken by the Government in this regard;
- (d) whether wide use of nuclear energy is proving to be a boon in the fields like medical treatment and agriculture and if so, the details thereof; and
- (e) the steps taken by the Government to expedite the completion of nuclear power projects?

ANSWER

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

- (a) No, Sir. The doses received by the local populations living near different Nuclear Power Plants (NPPs) across the country are extremely small percentages (less than 10%) of the limit prescribed by the Atomic Energy Regulatory Board (AERB). These are periodically assessed and estimated by Environmental Survey Laboratories (ESLs) of Bhabha Atomic Research Centre (BARC) established at all NPPs by carrying out survey of radioactivity levels in various environmental matrices. As regards the doses received by occupational workers/scientists and employees working with radiation in the nuclear facilities, by following stringent work practices, it is ensured that the dose does not exceed the prescribed dose limits set by AERB.
- (b)&(c) Not applicable in view of answer to (a) above.

(d) Yes, Sir. Nuclear energy is widely used in the fields of medical treatment (both diagnostic and therapeutic) and agriculture. To name a few, following are the uses of radioisotopes/nuclear energy:-

(i) These radiopharmaceuticals are most commonly injected into the bloodstream to diagnose and determine the severity of or treat a variety of diseases, including many types of cancers, heart disease, gastrointestinal, endocrine, neurological disorders and other abnormalities within the body.

(ii) Radiation and radioisotopes are used in agricultural research to induce genetic variability in crop plants to develop improved varieties of seeds. For food conservation, BARC has developed food irradiation technology; currently 15 plants are working in the country.

(e) Close monitoring by senior level committee, frequent follow-up with vendors, resolution of likely constraints in advance, providing financial assistance to vendors facing financial problem and re-sequencing of construction activities are some of the steps taken by the Department to expedite completion of nuclear power projects.
