

GOVERNMENT OF INDIA
MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE

LOKSABHA
UNSTARRED QUESTION NO.3618
TO BE ANSWERED ON 08.08.2022

Light Detection and Ranging based Survey

3618. SHRIMATI POONAM MAHAJAN:
MS. DEBASREE CHAUDHURI:

Will the Minister of ENVIRONMENT, FOREST AND CLIMATE CHANGE be pleased to state:

- (a) whether the Government has released the Detailed Project Reports of Light Detection and Ranging (LIDAR) based survey of forest areas in different States especially in Maharashtra and Uttar Pradesh;
- (b) if so, the details thereof along with the number of States to be covered;
- (c) whether it is also a fact that all State Governments have been asked to work to make this project successful and if so, the response of the State Governments thereto; and
- (d) whether use of LIDAR technology will help augment water and fodder in jungle areas thereby reducing human animal conflict and if so, the details thereof?

ANSWER

MINISTER OF STATE IN THE MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE
(SHRI ASHWINI KUMAR CHOUBEY)

- (a)&(b) Ministry of Environment, Forest and Climate Change has commissioned a project for survey of degraded forest area in about 10000 ha each in 26 States/UTs including Maharashtra and Uttar Pradesh, using LiDAR technology and preparation of Detailed Project Reports(DPRs) for Soil Moisture Conservation (SMC) works. 25 DPRs pertaining to Assam, Bihar, Chhattisgarh, Goa, Jharkhand, Madhya Pradesh, Maharashtra, Manipur, Nagaland, Tripura, Gujarat, Rajasthan, Odisha, Mizoram, Himachal Pradesh, Karnataka, Tamil Nadu, Andhra Pradesh, Telangana, Punjab, Kerala, Uttar Pradesh, Uttarakhand, Haryana and West Bengal States have been finalized so far. One DPR pertaining to Jammu and Kashmir could not be taken up due to problem in getting flying permission for LiDAR Survey from M/o Defence and hence has been dropped.
- (c) All participating States have been advised to implement the DPRs with funds available with them, such as State Plan Funds, State Fund under Compensatory Afforestation Fund, Centrally Sponsored Scheme (CSS) *etc.*
- (d) The DPRs have been prepared using LiDAR technology in which 3-D (three dimensional) DEM (Digital Elevation Model), is prepared based on survey of vegetation, streams and water catchments. The DPRs recommend different types of soil and water conservation structures such as Anicut, Gabion, Gully Plug, Mini percolation tank, Percolation Tank, Field bund, Sunken pond, Farm pond,

Plantations of trees including fodder plants etc. Appropriate soil and water conservation structures at specific locations help in catching and retention of rain water and prevent stream run off which helps in ground water recharge and greater surface water availability for wild animals and for regeneration of trees and grasses. It also prevents soil erosion, thus reducing further degradation of the area. The resultant improved regeneration and enhanced fodder availability in forest areas encourages wild animals to remain inside forest and not to enter the adjoining areas in search of food and fodder, thereby reducing human-animal conflict out of such wild animals.
