

GOVERNMENT OF INDIA
MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE

LOK SABHA
UNSTARRED QUESTION NO. 2394
TO BE ANSWERED ON 18.12.2023

Risk Mapping of Hilly Areas

2394. SHRIMATI PRATIBHA SINGH:

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

- (a) whether the Government is aware of the ecological and environmental problems being faced by the State of Himachal Pradesh;
- (b) if so, the details thereof and the evaluation and its results; and
- (c) the remedial measures being taken by the Government in this regard such as risk mapping to identify areas with high probability of landslides in hilly areas?

ANSWER

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

- (a) and (b) As per information provided by the Wadia Institute of Himalayan Geology (WIHG), Dehradun (an autonomous institute of Department of Science and Technology, Government of India), high to very high landslide susceptible zones cover 25–30% area of Himachal Pradesh. Further, as per information provided by the State Government of Himachal Pradesh, about 32% of the total geographical area of the State fall in Very High Damage Risk Zone (Zone-V) in the Seismic Map of India and the remaining falls in High Damage Risk Zones of earthquake. With regard to floods, these are reported to be isolated in nature and caused mainly by high monsoon rains in the Shiwalik and Lower and Mid Himalayan range; while Higher Hills comprising the districts of Kinnaur, Lahaul and Spiti, Chamba, and Kullu are particularly vulnerable to avalanches as reported by the State Government of Himachal Pradesh.
- (c) Under the National Landslide Susceptibility Mapping (NLSM) Programme, launched in the year 2014-15, the Geological Survey of India (GSI), Ministry of Mines has completed landslide susceptibility mapping of 4.3 lakh sq. km. of landslide prone areas in the country, including approximately 42,093 sq. km. in Himachal Pradesh. For providing suitable remedial measure for landslides, unstable slopes, etc., detailed site-specific landslide investigations are taken up regularly by GSI based on requests from stakeholders concerned.

Besides, the India Meteorological Department (IMD), Ministry of Earth Sciences has brought out a web based online 'Climate Hazard & Vulnerability Atlas of India.' The National Remote Sensing Centre (NRSC), Indian Space Research Organization (ISRO), Department of Space has also published the Landslide Risk Exposure Ranking of different districts of Himachal Pradesh as a part of the Landslide Atlas of India (2023). These databases are made available for use by National and State Disaster Management Authorities for planning and taking appropriate action to tackle various extreme weather events.
