

# **Land Erosion and Forest Degradation Assessment in the Tehri Dam Catchments Area using Satellite Remote Sensing Technique**

**Year of Starting:** 1989

**Year of Completion:** 1990.

**Funding Agency & Funds Received:** THDC, New Delhi.

## **Objectives:**

- To delineate the critically eroded area in the catchment as on March 1989 through an integrated approach.
- To map the different types of forest showing their crown density.
- To demarcate the major soil units, geology/geomorphology and general landuse pattern.

**Study Area:** Tehri Dam catchments area, Uttaranchal.

**Data used:** Landsat TM, 08 March, 1989.

## **Salient Results:**

- On the basis of the study of slope, lithology, soils, landform, structures, landuse/land cover, drainage density, vegetation type and vegetation density, three levels of erosion intensity, viz. severe, moderate, and slight were identified in the catchment area, and the area under each class was computed. Vegetation classes such as Pine (Chir), Oak (Banj), Deodar and degraded lands were identified and mapped along with their crown density.
- The area under critically eroded area derived from remote sensing techniques were accepted by the State Forest Department (Land Survey Directorate, Dehradun) and accordingly the plans for the treatment of the catchment were prepared by the Forest Department and submitted to the Ministry of Environment and Forest, Government of India.
- Environmental clearance was given to THDC by the MOEF, Govt. of India on the basis of recommendation of the study

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## **Recommendation/Special Achievements:**

- Based on this study, plans were prepared for treatment of the catchment by the State Forest Department.
- Environmental clearance was given to THDC by the MOEF, Govt. of India on the basis of recommendation of the study.

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