Remote Sensing Techniques (Optional)

Subject Ref No : GEO 428

No. of Credits : 04 No. of Periods per Week : 04 Assignment/Sessionals: 20 Semester Exam : 80

Unit I: Remote sensing and computer application in mapping; Digital mapping; Geographic Information System (GIS).

10 Periods and 15 marks for this unit.

Unit II: Air photos and photogrammetry; Elements of photographic system; types, scales and Ground coverage, resolution, radiometric characteristics.

There is 10 periods and 15 marks are allotted for this unit.

Unit III: Satellite Remote Sensing: Platforms, LANDSAT, SPOT, NOAAAHRR, RADARSAT IRS, INSAT, Principle and Geometry of scanners and CCD arrays. Orbital Characteristics and data products- MSS, TM, LISS I and II, SPOTPLA and MLA SLAR.

There shall be 10 periods and 15 marks allotment of this unit.

Unit IV: Image processing; types of imagery, techniques of visual interpretation, Ground verification, transfer of interpreted them tic information to base maps – digital processing.

10 periods and 15 marks for this unit.

Unit V: Applications Techniques

Air photo and image interpretations and mapping land use and land cover, and evolution, resources. Integration of Remote sensing and GIS remote sensing and hazard management, remote sensing and environmental management.

20 periods and 20 marks for this unit.