



UTTARAKHAND OPEN UNIVERSITY, HALDWANI (NAINITAL)  
उत्तराखण्ड मुक्त विश्वविद्यालय, हल्द्वानी (नैनीताल)

**POST GRADUATE DIPLOMA IN GEO INFORMATICS  
ASSIGNMENT**

*Last Date of Submission: 15 May, 2012*

**Course Title: DIP & Mapping**

**Course Code: PGDGIS-04**

**Year: 2011-12**

**Maximum Marks: 40 Marks**

**Section 'A'**

**Section 'A' contains 08 short answer type questions of 5 marks each. Learners are required to answer 4 questions only. Answers of short answer-type questions must be restricted to 250 words approximately.**

1. What is DIP?
2. Explain Multispectral Image
3. Discuss on Image Classification
4. Discuss DEM
5. Explain basic methods use in DIP.
6. Discuss basic information and specifications of aerial photographs.
7. Discuss digital image data formats, Image data storage and retrieval.
8. Discuss principle and procedure of Image registration.

**Section 'B'**

**Section 'B' contains 04 long answer-type questions of 10 marks each. Learners are required to answer 02 questions only.**

1. Give an overview of Image enhancement Techniques.
2. Explain concept of the following multi image manipulation:
  - a. Addition
  - b. Subtraction
  - c. Band rationing
3. Discuss the significance of geological mapping of rocks & structure and their hydrological properties in groundwater exploration.

4. Discuss advantage, disadvantage and limitations of Pattern recognition and image classification.

