

Code: 13A01803

B.Tech IV Year II Semester (R13) Advanced Supplementary Examinations July 2018

REMOTE SENSING & GIS

(Civil Engineering)

Time: 3 hours

Max. Marks: 70

PART – A
(Compulsory Question)

- 1 Answer the following: (10 X 02 = 20 Marks)
- (a) Write short notes on principal point and principal length.
 - (b) Write short notes on parallax.
 - (c) What are the advantages and limitations of remote sensing?
 - (d) Write short notes on Swath and Nadir.
 - (e) What are the limitations of GIS?
 - (f) Write short notes on data capture.
 - (g) Give an overview on data manipulation and analysis.
 - (h) Differentiate between vector data storage and attribute data storage.
 - (i) Define fluvial geomorphology.
 - (j) What is a watershed? Write their characteristics.

PART – B
(Answer all five units, 5 X 10 = 50 Marks)**UNIT – I**

- 2 What are the types of aerial photography? Explain.

OR

- 3 What is fundamental stereoscopy? Explain in detail.

UNIT – II

- 4 What is resolution of a sensor? Describe all sensor resolutions.

OR

- 5 (a) What is orbit of a satellite? Explain geosynchronous and sun-synchronous orbits.
(b) Discuss on the spectral reflectance characteristics of water and vegetation in different spectral bands.

UNIT – III

- 6 Define GIS. Describe the key components of GIS.

OR

- 7 Define spatial data. Explain the types of spatial data.

UNIT – IV

- 8 What do you understand by spatial data and attribute data? How are they integrated to make a GIS?

OR

- 9 What do you understand by geospatial analysis? Why is it required? Mention six basic geospatial analysis techniques.

UNIT – V

- 10 Explain in detail the water resources management and monitoring.

OR

- 11 How impact assessment and monitoring is done for flood and drought? Explain.
