POST GRADUATE CERTIFICATE IN GEOINFORMATICS (PGCGI)

Term-End Examination June, 2025

MGY-001: INTRODUCTION TO GEOINFORMATICS

Time: 2 Hours Maximum Marks: 50

Note: (i) All questions are compulsory.

- (ii) Internal choices are given in question nos. 2 to 4.
- (iii) Marks of each question are indicated against it.

1. Answer all parts:

- (a) Fill in the blanks with appropriate word(s): 5×1=5
 - (i) sensors operate in the region between 0.3 and 15 μm of electromagnetic spectrum.

(ii) MSS stands for (iii) represents the ratio of distance on map to the actual distance on the ground. (iv) Bandwidth is the highest signal monitor circuit can a display. refers to the way in which (v) data elements are represented and stored in computer records. (b) Match the items given in Column A with the most appropriate one given in Column B: $5 \times 1 = 5$ Column A Column B (i) Accuracy (1) Radar (ii) Line data (2) Vector (iii) Cadastral (3) Atlas maps maps Small scale (iv) **(4)** Land properties maps (v) Active remote (5)Closeness to sensing true value

- 2. Write short notes on any four of the following: $4\times5=20$
 - (a) Geographical Information System
 - (b) Optical Remote Sensing
 - (c) Types of data formats
 - (d) Enterprise GIS
 - (e) Geoinformatics in Landuse Planning
 - (f) Classification of map projections
- Discuss how geoinformatics is useful in natural resource management, giving suitable examples.

Or

- (a) Describe in brief the contour representation for different types of landforms with the help of neat well-labelled diagrams.
- (b) Discuss briefly the *five* sources of raster data obtained from satellite remote sensing.

4. Explain the application of geoinformatics in meteorological studies. 10

Or

- (a) Briefly discuss the comparison between COTS and FOSS. 5
- (b) Write about any five agencies in India which have played significant role in the development of geoinformatics technologies.

