

2024
SRMUJ
1st Semester Examination
M.Sc.
GEOGRAPHY
GEO-102
Geotectonics & Geomorphology

Full Marks: 40

Time: 2 Hours

The figures in the margin indicate full marks. Candidates are required to give their answers in their own words as far as practicable.

1. Answer any four from the following questions:

2×4

- a) What is the half-life of an isotope?
- b) What is meant by Molasses basin?
- c) What is Reynold Number?
- d) Define 'geomorphic threshold'.
- e) What is the significance of 'Coulomb-Terzaghi shear strength equation'?
- f) How are pluvial lakes formed during Pleistocene glaciations?

2. Answer any four from the following questions:

8×4

- a) Describe the different tectonic zones of the Himalayas mentioning their geological significance.
- b) Discuss the role of Neo-tectonics in shaping contemporary landforms with examples from the Great Plains of India.
- c) Explain the process-form relationship in periglacial regions.
- d) Describe the various parameters of channel geometry highlighting their role in controlling flow hydraulics of a river.
- e) What are the geomorphic consequences of construction of large dam on fluvial systems?
- f) How do lithological variations influence the geomorphology of the Chotanagpur Plateau?