

GEOLOGY

(Paper I)

Time Allowed : Three Hours

Maximum Marks : 300

QUESTION PAPER SPECIFIC INSTRUCTIONS

(Please read each of the following instructions carefully before attempting questions)

There are EIGHT questions divided in two Sections.

Candidate has to attempt FIVE questions in all.

Question Nos. 1 and 5 are compulsory and out of the remaining, any THREE are to be attempted choosing at least ONE question from each Section.

All questions carry equal marks.

Wherever any assumptions are made for answering a question, they must be clearly indicated.

Word limit in questions, wherever specified, should be adhered to.

SECTION 'A'

1. Explain any three of the following in about 200 words each:
 - (a) Causes and products of volcanism
 - (b) Causes and effect of sea level changes
 - (c) Linear and Planar structures, their genetic significance
 - (d) Mid Oceanic ridges and deep sea trenches
2. Describe different fault geometries [?] and their relationship with the principal stresses.
3. Write brief notes on the following:
 - (a) Stress and strain ellipsoid, and rock deformation
 - (b) Superimposed drainage
 - (c) Geomorphic processes and cycles
 - (d) Causes of earthquakes and their seismic response
4. Describe the landforms of the glacial region.

SECTION 'B'

5. Answer any three of the following in about 200 words each:
 - (a) Dharwar Super Group
 - (b) K-T boundary
 - (c) Deccan traps
 - (d) Krol-Tal Sequence
6. Draw a neat full page labelled sketch of a Trilobite and describe its morphology. Give their geological distribution.
7. Write detailed notes on:
 - (a) Evolution of life on the Earth
 - (b) Evolution of the crust of the Earth
 - (c) Palaeogeography of India during Palaeogene period
8. Describe the Mesozoic formation of Kachchha (Kutch) with special reference to its sedimentation and fauna.