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GEOGRAPHY

( Major )

Paper : 4.1

( Forms and Processes in Geomorphology )

Full Marks : 60

Time : 3 hours

*The figures in the margin indicate full marks  
for the questions*

1. Choose the correct answer : 1×7=7

(a) Which of the following is not an exogenic process?

(i) Weathering

(ii) Nappe formation

(iii) Mass wasting

(iv) Erosion

- (b) The younger alluvial plain of the northern Brahmaputra valley is located between
- (i) piedmont zone and older alluvial surfaces
  - (ii) piedmont zone and floodplain zone
  - (iii) piedmont zone and foothills zone
  - (iv) foothills zone and floodplain zone
- (c) Chemical weathering processes are mostly dominant in
- (i) semi-arid region
  - (ii) arid region
  - (iii) tropical humid region
  - (iv) Mediterranean region
- (d) The Tapi river valley is a
- (i) synclinal valley
  - (ii) rift valley
  - (iii) strike valley
  - (iv) fault-line valley
- (e) In which part of river course the natural levee develops?
- (i) Hilly part
  - (ii) Foothills part
  - (iii) Piedmont zone
  - (iv) Floodplain zone

- (f) Watershed separates two
- (i) hill ranges
  - (ii) river systems
  - (iii) different order of streams
  - (iv) river channels
- (g) Loktak lake in Manipur is formed by
- (i) tectonic causes
  - (ii) erosional processes
  - (iii) depositional processes
  - (iv) anthropogenic activity

2. Answer the following in brief : 2×4=8
- (a) What do you mean by erosion?
  - (b) What do you mean by diastrophic force?
  - (c) Why does the river channel in the lower course tend to be wider than in the upper course?
  - (d) State the difference between hazard and disaster.
3. Write short notes on any three of the following : 5×3=15
- (a) Mass wasting
  - (b) Landslide as a geomorphic hazard
  - (c) Floodplain
  - (d) River basin
  - (e) Processes of oxbow lake formation

4. Answer the following : 10×3=30

- (a) Define the term 'channel pattern' and present a classification of river channels. Mention the characteristics of each of the channel patterns. 2+2+6=10

Or

What is drainage pattern? Describe different drainage patterns. 2+8=10

- (b) Define weathering. Describe different types of physical weathering processes. 2+8=10

Or

Describe the erosional landforms produced by river. 10

- (c) Discuss the effects of flood in the Brahmaputra valley. 10

Or

What is meant by geomorphic hazard management? Discuss the management strategies required to be adopted in mitigating flood hazard. 3+7=10

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