## 2020

## ENVIRONMENTAL SCIENCE [HONOURS]

Paper: V

Full Marks: 75 Time: 4 Hours

The figures in the right-hand margin indicate full marks.

Candidates are required to give their answers in

their own words as far as practicable.

- 1. Answer any **five** of the following:  $1 \times 5 = 5$ 
  - a) What is vadose zone?
  - b) State main nutrients of soil.
  - c) What is polar-orbiting satellite?
  - d) Define EMP.
  - e) What is pedogenesis?
  - f) What is geo-stationary satellite?
  - g) What is topsoil?
- 2. Answer any **six** of the following:  $2 \times 6 = 12$ 
  - a) What is soil profile?
  - b) What is the use of satellite image?

- c) Give the objectives of environmental quality monitoring?
- d) State the scope of EIA.
- e) How does GIS help in environmental quality monitoring?
- f) How does remote sensing help in sampling for water quality assessment?
- g) What is Soil Pedon?
- h) What is environmental audit concept?
- 3. Answer any **three** of the following:  $6 \times 3 = 18$ 
  - a) What is social forestry? Discuss its importance.
  - b) Describe the process of weathering of rocks.
  - c) Discuss the role of geostationary satellite.
  - d) Discuss the certification audit system.
  - e) Discuss the preparation of Environment management plan.
  - f) Discuss the method of base line data generations.
- 4. Answer any **four** of the following:  $10 \times 4 = 40$

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a) Give an overview on the classification of parent materials of soil.

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- b) Describe the process involved in land use and land cover assessment.
- c) Critically discuss the concept and applications of environmental monitoring.
- d) Discuss the sources of soil pollution and its management.
- e) Critically discuss the concept and application of EIA.
- f) Discuss the sources of surface and ground water pollution and their management.

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