

Unique Paper Code : **72182801**

Name of Paper : **Environmental Studies**

Name of Course : **Ability Enhancement Compulsory Course–I (AECC-I)**

Semester : **I**

Duration: **2 hours**

Maximum marks: **75**

Note: Answer *either* in English *or* Hindi. The same medium should be used throughout the paper.

Attempt any *four* questions

All questions carry *equal* marks

1. Using an example of a natural pond and a small aquarium, explain the structure of an aquatic ecosystem. Between the pond and the aquarium, which of the two is a self-sustaining ecosystem? Give reasons in support of your answer.
2. Suppose you visit your native village after about 10 years. The village lies in a semi-arid region and receives rainfall of 500 mm. Traditionally in the farming village, the villagers used to practice mixed cropping of sorghum, pearl millet, pigeon pea, chickpea, and groundnut. But over the last 15 years, they have shifted to paddy (rice) cultivation in over 90% of the farming land. There are three small lakes in the village, but the farmers rely on tube-wells for irrigation. When you took a tour of the village, you found that two of the lakes have dried up while the surface of the third lake is covered with an overgrowth of algae. **Explain the reasons for the condition of the three lakes. Also, suggest measures that the villagers need to adopt to restore these wetlands to their original condition.**

3. You have been invited by the Resident Welfare Association of your housing society to speak on the topic of Noise pollution. The society you live in is very near to an industrial area. In the speech, you decide to focus on the causes of noise pollution, its impact on the residents (focusing on different age groups), and possible ways to tackle this problem through seeking necessary help from the government and the industrial units. **Draft a speech in a minimum of 750 words.**
4. Do you think that local and traditional knowledge that we obtain from communities living in rural and forest areas across India can play a significant role in devising ways to conserve biodiversity and protecting natural resources? **Justify your answer with relevant examples.**
5. Take an example of any environmental issue that is a major concern to residents of the area, where your college is located. Discuss how your college eco-club can collaborate with other student societies, to raise awareness on the particular environmental issue among the residents and help them with the ways to overcome the specific problem.
6. A village in central India lies in between two wildlife sanctuaries. Over the last few months, a leopard entered multiple times in the village. On a few occasions, the leopard injured villagers while on other occasions, the villagers have injured or killed the leopard. **Explain the possible reasons why the leopard is entering into the village despite the risks involved. Also, suggest measures to prevent the leopard from being injured or harmed by the villagers.**