D 121004 **(Pages : 6)** **Name.....................................**

Reg. No................................

FOURTH SEMESTER M.A. DEGREE (REGULAR/SUPPLEMENTARY) EXAMINATION, APRIL 2025

(CBCSS)

Economics

ECO 4E 04—ENVIRONMENTAL ECONOMICS

(2019 Admission onwards)

Time : Three Hours Maximum : 30 Weightage

Part A

Answer **all** *questions.*

Each bunch of **five** *questions carries a weightage of* 1.

1. The Article "The Tragedy of the Commons" is associated with :

   (A) Garret Hardin. (B) Ronald Coase.

   (C) Charles Kolsted. (C) A. C. Pigou.

2. Which among the following is a problem that can arise with common property resources ?

   (A) Overuse. (B) Underuse.

   (C) Pollution. (D) All of the above.

3. Which among the following is a 'use value' of the environment ?

   (A) The value of a forest for providing timber.

   (B) The value of a lake for recreation.

   (C) The value of a wetland for flood control.

   (D) All of the above.

Turn over

4. Which among the following is NOT a key principle of sustainable development ?

   (A) Intergenerational equity.

   (B) Intragenerational equity.

   (C) Economic growth.

   (D) Environmental protection.

5. What is meant by "Our Common Future" ?

   (A) A novel by a renowned environmentalist.

   (B) An international treaty on climate change.

   (C) A report by the Brundtland Commission on sustainable development.

   (D) A documentary on environmental conservation.

6. Key principles outlined in the Stockholm Declaration were :

   (A) The responsibility to protect the environment for future generations.

   (B) The separation of human and natural environments.

   (C) The right to unrestricted resource extraction.

   (D) The prioritization of economic growth over environmental protection.

7. Marginal external cost is equal to :

   (A) Marginal social cost minus the marginal private cost.

   (B) Marginal social cost - marginal social benefit.

   (C) Marginal private cost plus the marginal social cost.

   (D) Marginal private cost minus marginal social benefit.

8. What is a Pigouvian tax ?

   (A) A tax on luxury goods.

   (B) A tax imposed on harmful activities to internalize external costs.

   (C) A tax on income to fund government programs.

   (D) A tax on exports to protect domestic industries.

9. What is the second-best theory in environmental economics ?

   (A) A theory about market equilibrium.

   (B) A theory about the best possible solutions to environmental problems.

   (C) A theory about suboptimal outcomes in the presence of constraints.

   (D) A theory about the advantages of government intervention.

10. How does the command and control method typically enforce environmental regulations ?

    (A) By offering financial incentives to compliant companies.

    (B) By providing information and education to the public.

    (C) By imposing penalties and fines on non-compliant entities.

    (D) By encouraging voluntary actions without penalties.

11. The hedonic pricing method in environmental economics denotes :

    (A) A method for calculating market equilibrium prices.

    (B) A technique that focuses on maximizing utility for consumers.

    (C) A strategy that relies on government subsidies to promote green products.

    (D) An approach that estimates the value of environmental attributes based on their influence on market prices.

12. How does the Contingent Valuation Method handle non-use values of environmental resources ?

    (A) It ignores non-use values and focuses solely on use values.

    (B) It relies on market prices to estimate non-use values.

    (C) It uses stated preferences to estimate both use and non-use values.

    (D) It only considers non-use values when calculating willingness to pay.

13. What does the term "Agenda 21" refer to in the context of the Rio Conference ?

    (A) A comprehensive plan of action for sustainable development

    (B) The conference schedule and timetable.

    (C) A list of participants in the conference.

    (D) A declaration of global peace and security.

14. What is the discount rate used for in cost-benefit analysis ?

    (A) To calculate only the costs of a project.

    (B) To convert future costs and benefits into present values.

    (C) To ensure that all environmental benefits are considered.

    (D) To adjust for inflation without affecting costs and benefits.

15. How does the aversion behaviour approach contribute to decision-making in environmental policy ?

    (A) It offers a comprehensive model for predicting environmental outcomes.

    (B) It focuses solely on punitive measures to prevent negative environmental outcomes.

    (C) It provides insights into how individuals value avoiding environmental harm.

    (D) It advocates for market-based solutions to environmental problems.

(15 × 1/5 = 3 weightage)

Part B (Very Short Answer Questions)

Answer any **five** *questions.*

Each question carries a weightage of 1.

16. Polluter pays principle.
17. Non-use value of the environment.
18. Sink function of the environment.
19. Marginal External Cost.
20. Pollution subsidies.
21. Economic incentives for environment management.
22. Environmental federation.
23. Weak complementarity.

(5 × 1 = 5 weightage)

Part C (Short Answer Questions)

Answer any **seven** *questions.*

Each question carries a weightage of 2.

24. What is the primary cause of ozone depletion, and how do human activities contribute to this phenomenon ?
25. Explain the role of market failures and externalities in highlighting the need for environmental economics as a framework for policy analysis.
26. How can contingent valuation studies provide insights into the non-use values of the environment ?
27. How does the concept of the "double dividend" relate to Pigouvian taxes, and what are the potential economic benefits that can result from their implementation ?
28. How does legal liability serve as an economic instrument to deter environmentally harmful behaviour by holding individuals, businesses, and industries accountable for their actions ?
29. Explain the basic steps involved in conducting a cost-benefit analysis for an environmental project.
30. How does the operational meaning of sustainability empower organizations to make environmentally responsible decisions ?
31. Explain how economic activities and decisions impact the environment, and vice versa ?
32. What is the command and control method in environmental regulation, and how does it differ from market-based approaches ?
33. What is the hedonic pricing method, and how does it contribute to estimating the economic value of environmental attributes and amenities ?

(7 × 2 = 14 weightage)

Part D (Essay Questions)

Answer any **two** *questions.*

Each question carries a weightage of 4.

34. What are the indirect methods of environmental valuation, and how do they help estimate the economic value of environmental resources and ecosystem services ?

35. What is sustainable development, and how does it balance the needs of the present with the well being of future generations ?

36. What is the Coase Theorem, and how does it propose that efficient outcomes can be achieved through negotiation and bargaining among parties with conflicting property rights and externalities ?

37. How might the introduction of tradable pollution permits create economic incentives for industries to reduce pollution levels while fostering efficient resource allocation ?

(2 × 4 = 8 weightage)