

**B.Sc Semester-4 Examination****CC 205****Env Science****April-2024****Time : 2-30 Hours]****[Max. Marks : 70**

- Instructions:** (1) Draw figures where necessary.  
(2) Show question number against each answer.  
(3) Figures in right are marks.

Q.1 Write a detailed note on physio-chemical characteristics and energy content of coal. (14)

**OR**

Q.1(A) Write a note on nuclear fission reactors. (07)

Q.1(B) Write a note of mining and uses of coal. (07)

Q.2 Write a detailed note on renewable sources of energy. (14)

**OR**

Q.2(A) Explain how wind energy can be harnessed. (07)

Q.2(B) Explain Photovoltaic cells in detail with figure. (07)

Q.3 Write a note on nuclear fission and fusion in detail. (14)

**OR**

Q.3(A) Write down the ways for waste disposal of radioactive ways (07)

Q.3(B) Explain the environmental impact of nuclear waste. (07)

Q.4 Write a note on impact of large scale exploitation of hydro and solar energy sources. (14)

**OR**

Q.4(A) Detail note on emissions of CO<sub>2</sub> in developed countries. (07)

Q.4(B) Explain India's potential from renewable energy. (07)

Q.5 Answer any **seven** out of twelve. (14)

- A. What are non-conventional sources of energy?
- B. Name two hydro power plants of India.
- C. Define hydro-thermal energy.
- D. Write down the types of coal.
- E. Which type of renewable energy is used most in India?
- F. What are short-lived nuclides?
- G. Define solar ponds.
- H. Define net-calorific value.
- I. Name the top states consuming solar energy.
- J. What is India's rank in making energy from renewable sources?
- K. Give examples of wind energy generation.
- L. What is anaerobic digester?