

2055

B.A./B.Sc. (General) Fourth Semester
Industrial Chemistry
Paper – B: Pollution

Time allowed: 3 Hours

Max. Marks: 75

NOTE: Attempt five questions in all, including Question No. 1 which is compulsory and selecting one question from each Unit.

X-X-X

1. Attempt the following.

- (a) What is aerobic digestion?
- (b) Write the functions of a gauze.
- (c) What is urban waste?
- (d) Tell various types of air pollutants.
- (e) Define least count.
- (f) Write SI and CGS units of density.
- (g) Tell in brief about biosphere.
- (h) What do you mean by Flora and Fauna?
- (i) Give any two points for industrial safety.
- (j) What is water pollution?

(10x1.5)

UNIT-I

2. (a) Discuss Nitrogen cycle in detail.

(b) Explain pollution evaluation methods.

(8,7)

3. Write notes on the following:-

(a) Pesticide pollution

(b) Sewage analysis

(7,8)

UNIT-II

4. (a) Explain Principle and instrumentation of aerobic treatment of effluent water.

(b) Explain adsorption process.

(9,6)

P.T.O.

5. Write notes on the following:-

- (a) Electrostatic precipitator
- (b) Bag Filter

(8,7)

UNIT-III

6. (a) Explain any two methods for solid waste management.
(b) Describe measurement, accuracy and precision.

(9,6)

7. Discuss in brief about the following.

- (a) HPLC
- (b) Ion chromatography

(8,7)

UNIT-IV

8. Explain construction and working of following thermometers.

- (a) Resistance thermometer
- (b) Pressure spring thermometer

(7,8)

9. Write notes on the following:-

- (a) Macleod gauges
- (b) Pirani gauges

(8,7)

x-x-x