## CERTIFICATE IN SOLID WASTES TREATMENT TECHNIQUES

(CSWATT)

## Term-End Examination June, 2023

## BWA-003 : SOLID WASTES PROCESSING AND TREATMENT TECHNIQUES

Time: 3 Hours Maximum Marks: 70

Note: (i) Attempt any five questions.

- (ii) All questions carry equal marks.
- 1. (a) Discuss the advantages and disadvantages of dry and wet fermentation.
  - (b) Describe the working of burn barrel incinerator. 7+7=14
- 2. (a) Explain in detail the working of counter current gasifier.
  - (b) Describe the stages of gas and residue treatment in brief. 7+7=14
- 3. Explain physical treatment of wastes in detail.

- 4. (a) Describe the working and waste generation of coal based power plant.
  - (b) Explain the Pyrolysis process. 7+7=14
- 5. (a) Explain the significance of Mechanical Biological Treatment (MBT).
  - (b) Discuss the recycling process of any two types of wastes. 7+7=14
- 6 (a) Discuss the advantages and limitations of composting.
  - (b) Explain any *one* method of methane production from wastes. 7+7=14
- 7. Write short notes on any *four* of the following:

 $3.5 \times 4 = 14$ 

- (a) Biomedical waste
- (b) Advance thermal treatment
- (c) Flue gas treatment
- (d) Handling and storage of Ash
- (e) Processing of wastes
- (f) Aerobic Mechanical Biological Treatment (MBT)