KATHMANDU UNIVERSITY
Second Internal Examination
Set B

Level : B.E. (CE/Spring) | Course: ENVE 101 | F.M. :20
Year : I/II | Time: 45 mins | Date: 2025/02/04

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A) Circle the most appropriate option. **[10]**

1. The solid waste generated from city of 50,000 at the rate of 2 kg/capita/day is forwarded to a landfill of an area 50 m^2. If the daily waste covers 4 m depth of the landfill, the typical density of solid waste is..... kg/m^3.

   a. 5000 (b) 500 c. 1000 d. 50

2. Silver treatment is an example of _____

   a. Filtration b. Aeration c. Screening (d) Disinfection

3. The sewer that unloads the sewage at the point of treatment is called _____sewers.

   (a.) outfall b. branch c. laterals d. sub-Mains

4. The solid waste generated from city of 50,000 at the rate of 2 kg/capita/day is forwarded to a landfill of an area 50 m^2. If the daily waste covers 4 m depth of the landfill, the typical density of solid waste is..... kg/m^3.

   e. 5000 (f.) 500 g. 1000 h. 50

5. _____the water from a household with urine, faeces, or food waste

   ✓ (a.) Black water b. Leachate c. Gray water (d.) Night soil ✗

6. is a filtration device based on centrifugal force used to remove particles like smoke and fine dust from flowing gas

   a. Electrostatic precipitators
   b. Air Volume Sampler
   (c.) Cyclones
   d. Bag filter

7. If water is to be transported from a lower elevation to a higher elevation on the hill, required additional unit or chamber is _____.

   (a.) Pumping unit
   b. Digital meter unit
   c. Control Valve and Sensors
   d. Break Pressure Tank

8. Full form of EIA

   a. Environmental Information Assessment
   b. Environmental Impact Analysis
   c. Ecological Impact Assessment
   (d.) Environmental Impact Assessment

9. Two examples of degradable waste a. food waste b. faeces

B) Numericals **[10]**

1. What sound power level results from combining the following three levels: 50 dB, 75 dB, and 85 dB?
2. Estimate the total moisture content (MC), and density of the waste sample.

Components	% by mass	DC %	Density kg/m^3
Food waste	50	35	290
Paper	25	95	85
Cardboard	10	94	40
Plastics	15	96	60

CamScanner