

STELLA MARIS COLLEGE (AUTONOMOUS) CHENNAI-86
(For candidates admitted during the academic year 2023 – 2024)

B.Voc. DEGREE EXAMINATION - NOVEMBER 2024
SUSTAINABLE ENERGY MANAGEMENT
THIRD SEMESTER

COURSE : MAJOR CORE
PAPER : WASTE MANAGEMENT
SUBJECT CODE : 23VS/VM/WM36
TIME : 6 HOURS

MAX. MARKS: 100
(Theory: 50 Marks + Practical: 50 Marks)

SECTION A			
Q. No.	Answer all the Questions:	(5 x 2 = 10)	CO KL
1.	Give any two sources of solid waste.		CO1 K1
2.	Define Waste audit.		CO1 K1
3.	Quote the types of incinerators.		CO1 K1
4.	What is hazard?		CO1 K1
5.	What do you mean by recycling?		CO1 K1
SECTION B			
Q. No.	Answer all the Questions:	(4 x 3 = 12)	CO KL
6.	(a) Indicate waste and draw a block diagram on classification of waste. (or) (b) Relate the different types of Land fill.		CO2 K2 CO2 K2
7.	(a) Indicate the benefits of Vermicomposting. (or) (b) Demonstrate the trench sanitary landfilling method of handling waste management.		CO2 K2 CO2 K2
8.	(a) Explain Aerobic decomposition stage of waste management. (or) (b) Tabulate the waste management policy rules with action plan.		CO3 K3 CO3 K3
9.	(a) Explain the importance of source reduction of waste. (or) (b) List out the disadvantages of various hazardous waste.		CO3 K3 CO3 K3
SECTION C			
Q. No.	Answer all the Questions:		CO KL
10.	(a) Investigate the measures to mitigate environmental effects of incineration. (or) (b) Investigate the measurement of BOD and COD importance in wastewater treatment with its benefits.		CO4 K4 CO4 K4
11.	(a) Discuss the chemical characteristics of residential solid waste. (or) (b) Discuss on waste minimization techniques.		CO4 K5 CO4 K5

Q. No.	SECTION D (4 x 5= 20)	CO	KL
12.	Answer any TWO: (a) Compose the ideas on the effects of chemical and pharmaceutical waste. (b) Describe your idea on waste treatment based on their environmental and economic benefits. (c) Explain the energy generation from different types of food wastes. (d) Discuss the potential impact of waste on environment and human health.	CO5	K5
		CO5	K5
		CO5	K5
		CO5	K5
13.	Answer any TWO: (a) Compose your idea on waste treatment based on their physical and chemical characteristics. (b) Defend the food waste with its effects, causes and solutions. (c) Describe MSW based on their origin and type. (d) Explain the methodology of waste audit.	CO5	K6
		CO5	K6
		CO5	K6
		CO5	K6
