

**PSG COLLEGE OF ARTS & SCIENCE**  
(AUTONOMOUS)

**BSc DEGREE EXAMINATION DECEMBER 2025**  
(Fifth Semester)

Branch - BIOTECHNOLOGY

**ENVIRONMENTAL BIOTECHNOLOGY**

Time: Three Hours

Maximum: 75 Marks

**SECTION-A (10 Marks)**

Answer ALL questions

ALL questions carry EQUAL marks

(10 × 1 = 10)

Module No.	Question No.	Question	K Level	CO
1	1	The Biological Diversity Act in India was enacted in a) 1992      b) 1996      c) 2002      d) 2005	K1	CO4
	2	A foreign chemical substance introduced into an organism that is not naturally produced is known as a) Abiotic      b) Xenobiotics c) Antibiotics      d) None of the above	K2	CO2
2	3	The process of extracting minerals from ores by using microorganisms are called as a) Bioaccumulation      b) Bioventing c) Bioleaching      d) Biomonitoring	K1	CO3
	4	The natural "cleaning" of the forest floor is primarily carried out by a) Herbivores like deer and rabbits b) Carnivores like wolves and foxes c) Decomposers such as fungi and bacteria d) Large scavengers like bears	K2	CO1
3	5	In biomedical waste management, infectious non-sharp waste should be disposed of in which color-coded bag? a) Yellow      b) Red      c) Blue      d) Black	K1	CO4
	6	Which of the following is the most appropriate method for managing biomedical waste? a) Open dumping b) Burning all waste c) Open burning in hospital premises d) Segregation at source and proper treatment	K2	CO4
4	7	Which of the following is a type of biodegradable plastic? a) Polyethylene terephthalate (PET) b) Polylactic acid (PLA) c) Polyvinyl chloride (PVC) d) Polypropylene (PP)	K1	CO3
	8	Which of the following is considered a green textile fiber? a) Nylon      b) Polyester (non-recycled) c) Polyester (recycled)      d) Acrylic	K2	CO3
5	9	Which EPA program specifically focuses on reducing greenhouse gas emissions? a) Clean Water State Revolving Fund b) Energy Star Program c) Federal Reserve Program d) National Park Service	K1	CO4
	10	What is the primary objective of a carbon tax? a) To increase fossil fuel consumption b) To reduce carbon emissions by adding a cost to pollution c) To subsidize coal mining d) To measure economic growth	K2	CO1

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**SECTION - B (35 Marks)**  
**Answer ALL questions**  
**ALL questions carry EQUAL Marks  $(5 \times 7 = 35)$**

Module No.	Question No.	Question	K Level	CO
1	11.a.	Write a short note on metal pollution.	K2	CO1
		(OR)		
2	12.a.	What is bio-mining? Explain it with example.	K3	CO2
		(OR)		
3	12.b.	Discuss about carbon credit.	K3	CO2
	13.a.	Give a brief note on EIA.		
4		(OR)	K5	CO3
	14.a.	How biofilms are prepared by micro-organisms?		
5		(OR)	K4	CO4
	15.a.	Analyze the role of green building concept in view of sustainable development.		
		Elucidate the role of ICUN in environmental protection.		
	15.b.	(OR)		
		Enumerate the Environmental Protection Act.		

**SECTION -C (30 Marks)**  
**Answer ANY THREE questions**  
**ALL questions carry EQUAL Marks  $(3 \times 10 = 30)$**

Module No.	Question No.	Question	K Level	CO
1	16	Illustrate the impact Nuclear pollution with a case study.	K4	CO1
2	17	Justify the role of phytoremediation and bioremediation in eco-restoration.	K6	CO2
3	18	Classify wastes with their impact on environment.	K5	CO1
4	19	How biofuels are produced? Add a note on their role in climate change.	K6	CO3
5	20	Compile the declaration, aim and objectives of human right policies with reference to India.	K4	CO4