



# PRESIDENCY UNIVERSITY

BENGALURU

Roll No.														
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## End - Term Examinations – MAY 2025

Date: 30-05-2025

Time: 01:00 pm – 04:00 pm

School: SOM-PG	Program: MBA	
Course Code : MBA3048	Course Name: Environmental Sustainability and Value creation	
Semester: IV	Max Marks: 100	Weightage: 50%

CO - Levels	C01	C02	C03	C04	C05
Marks	19	19	31	31	NA

### Instructions:

- (i) Read all questions carefully and answer accordingly.
- (ii) Do not write anything on the question paper other than roll number.

### Part A

Answer ALL the Questions. Each question carries 3marks.

10Q x 3M=30M

1.	Recall the concept of United Nation's Sustainability Development Goals.	3 Marks	L1	C01
2.	Define the concept of sustainability in Business.	3 Marks	L1	C01
3.	List any three sustainability metrics for measurement.	3 Marks	L1	C01
4.	State the role of cost benefit analysis in relation to the environmental valuation methods.	3 Marks	L1	C02
5.	Define hedonic price method and preventive expenditure method.	3 Marks	L1	C02
6.	Recall the cost of inaction with respect to the environmental risk in business.	3 Marks	L1	C02
7.	State the importance of crisis management and communication.	3 Marks	L1	C03
8.	List any three key performance indicators for managing climate risk.	3 Marks	L1	C03
9.	List the relationship between linear and circular economy models.	3 Marks	L1	C04
10.	Define Cradle to Cradle strategy with an example.	3 Marks	L1	C04

## Part B

### Answer the Questions.

**Total Marks 40M**

11.	a.	GreenTech Inc., a leading electronics company, aims to reduce its carbon footprint and transition to sustainable production. The CEO has set ambitious sustainability goals, but mid-level managers and employees are resistant to change due to concerns about costs and operational disruptions. Identify the strategies the CEO can adopt to drive sustainability initiatives.	10 Marks	L2	CO 1
Or					
12.	a.	NovaTech, a mid-sized tech company based in Germany, was traditionally focused on rapid innovation and market growth. However, growing concerns over its carbon footprint and e-waste led to public criticism and internal pressure from employees. Identify the role of leadership in driving sustainability in business.	10 Marks	L2	CO 1
13.	a.	ClearWaters Inc., a water purification and bottling company in South Africa, launched a major sustainability campaign in 2023 to reduce its environmental impact. It installed energy-efficient purification systems, switched to reusable bottles, and funded local river restoration projects. Demonstrate the importance for companies to measure environmental value, and what challenges might they face in doing so?	10 Marks	L3	CO 2
Or					
14.	a.	Patagonia, the outdoor clothing and gear company based in the U.S., has long been recognized as a pioneer in using sustainability as a competitive advantage. Interpret the ways through which Patagonia has used sustainability as a tool for brand differentiation and business growth.	10 Marks	L3	CO 2
15.	a.	AgroFresh Ltd., a large agricultural export company in southern Spain, has been a key supplier of fruits and vegetables to European supermarkets for over two decades. In 2023, a record-breaking heatwave led to a 30% drop in tomato yield, resulting in millions in revenue loss. Explain the economic risk of Agrofresh faces due to climate change.	10 Marks	L3	CO 3
Or					
16.	a.	At delta port, in the past five years, extreme weather events—including typhoons, storm surges, and rising sea levels—have caused port shutdowns, damaged infrastructure, and delayed cargo movement, leading to millions in losses and strained client relationships. Implement a sustainability plan by leveraging technology and cross-sector collaboration for strengthening climate resilience.	10 Marks	L3	CO 3

17.	a.	LoopWear is a fashion startup based in the Netherlands that's redefining how clothes are made, sold, and reused. Disturbed by the fast fashion industry's environmental toll, the founders built a circular and sustainable business model from day one. Sketch the advantages and limitations of circular models in the fashion industry.	10 Marks	L3	CO 4
Or					
18.	a.	SolarPure, a social enterprise based in Kenya, addresses two major challenges in rural communities. This involves access to clean drinking water and reliable electricity. They have contacted Mr. Vatsa, who is a Sustainability Evangelist to suggest suitable strategies. Sketch suitable recommendations that could be provided to the company to integrate environmental, social, and economic value creation.	10 Marks	L3	CO 4

### Part C

**Answer all the Questions. Each question carries 15marks**

**2Q x 15M=30M**

19.	a.	<p>FrostTech, a Canadian company specializing in the production of commercial refrigeration systems, has been affected by shifting climate patterns over the past decade. The company initially thrived in colder regions, where refrigeration systems were in high demand for food storage and retail operations.</p> <p>However, in recent years, rising average temperatures and milder winters have resulted in decreased demand for traditional refrigeration systems in some of their core markets. Simultaneously, extreme weather events, such as severe heatwaves and storms, have put pressure on their existing infrastructure and forced the company to address potential disruptions.</p> <p>In response, FrostTech's leadership team decided to invest in climate resilience. They shifted focus toward developing energy-efficient cooling systems that cater to markets experiencing higher temperatures and increased demand for sustainable cooling solutions. They also adopted green technologies like solar-powered refrigeration units and collaborated with local governments to support climate adaptation efforts.</p> <p>Despite initial costs, the transition has opened up new markets and enhanced their brand reputation as a climate-conscious company. However, FrostTech still faces challenges related to cost, technology development, and regulatory changes in different regions.</p> <p>a. Interpret the climate-related risks FrostTech faced, and how did they affect the business?</p> <p>b. Execute a suitable climate change response for FrostTech which can help the company adapt and open new market opportunities.</p>	15 Marks	L3	CO 3
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20.	a.	<p>When university graduates Maya and Arjun noticed the rising pollution and traffic in their city in the Philippines, they came up with a unique idea: build bicycles using locally sourced bamboo—a fast-growing, renewable material.</p> <p>They launched BambooCycle, a startup that produces lightweight, eco-friendly bicycles while creating jobs in rural areas where bamboo is cultivated. The bikes are handcrafted by trained locals, and the company plants 10 bamboo shoots for every bike sold.</p> <p>Beyond just selling bikes, BambooCycle built a strong brand around sustainability, local empowerment, and low-carbon transport. The company gained popularity among eco-conscious consumers, cyclists, and NGOs promoting green mobility. It also attracted impact investors and partnered with city councils to promote cycling infrastructure.</p> <p>Despite challenges like scaling production and competing with cheaper metal-frame bikes, BambooCycle's eco-entrepreneurial model is helping shift mindsets about sustainable transportation.</p> <p>a) Explain the challenges do eco-entrepreneurs face compared to traditional entrepreneurs?</p> <p>b) Demonstrate the ways through which eco-entrepreneurship contribute to achieving the UN Sustainable Development Goals (SDGs).</p>	15 Marks	L3	CO 4
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