Name: **Enrolment No:**	

UNIVERSITY OF PETROLEUM AND ENERGY STUDIES
End Semester Examination, Dec. 2022

Course: Sustainability & Climate Change — **Semester: V**
Program: BBA (Oil & Gas) — **Time: 03 hrs.**
Course Code: PIPM 2001P — **Max. Marks: 100**

Instructions: Attempt all the questions

SECTION A
10Qx2M=20Marks

S. No.	**Multiple Choice Questions**	**Marks**	**CO**
Q 1	If a climate policy reduces both greenhouse gases and aerosols in our atmosphere, what happens to the temperature of the climate system? a. A reduction in greenhouse gases and aerosols both tend to cool the climate, so the combination will lead to large cooling. b. A reduction in greenhouse gases tends to cool the climate, while a reduction in aerosols tends to warm it, so the final effect will be the difference of these offsetting terms. c. A reduction in greenhouse gases and aerosols both tend to warm the climate, so the combination will lead to large warming. d. A reduction in greenhouse gases tends to warm the climate, while a reduction in aerosols tends to cool it, so the final effect will be the difference of these offsetting terms.	**2**	**CO 1**
Q 2	Keeping warming below the 1.5°C threshold will require a. reducing emissions rapidly, beginning today. b. solar radiation management. c. negative emissions. d. Both a and c e. Both a and b	**2**	**CO 1**
Q 3	What role have private-sector coalitions played for sustainability? (Check all that apply.) A. Coalitions have helped encourage and spread best practices on sustainability. B. Coalitions serve as research and knowledge hubs. C. Coalitions typically have strict, legally binding conditions on sustainability to join, providing strong pressure for companies to conform to the relevant practices. D. Coalitions can act as collective actors, pressuring companies to change their practices or policymakers to tighten regulations.	**2**	**CO 1**
Q 4	One way to geo-engineer a cooler climate is to a. add chlorine to the ocean. b. add sulfur to the stratosphere. c. add oxides of nitrogen to boreal forests.	**2**	**CO 1**

	d. All of the above		
Q 5	What are the two subtypes of physical climate risk? A. Acute and chronic B. Policy and legal C. Sudden and gradual D. Hydrological and climatological	**2**	**CO 1**
Q 6	How is sustainability defined? a. Practices that avoid all use of natural resources, exclusively using recycling b. Meeting current needs without overburdening the natural environment or future generations c. Measures to reduce greenhouse gas emissions d. Compliance with requirements by SASB	**2**	**CO 1**
Q 7	What are the Sustainable Development Goals (SDGs)? a. A set of goals developed by the Business Round- table for businesses to implement sustainable practices b. A set of goals developed by the World Bank to govern financing directed to emerging markets c. A set of goals developed by the Principles for Responsible Investment (PRI) for investors to allocate assets in a sustainable manner d. A set of goals developed and agreed to by the UN and its member countries to shape global policy and private-sector action	**2**	**CO 1**
Q 8	What are the two most common carbon-pricing policies? A. Feed-in tariffs and carbon taxes B. EV purchase subsidies and renewable portfolio standards C. Carbon taxes and cap-and-trade schemes D. Green public procurement and building heating standards	**2**	**CO 1**
Q 9	Which county is responsible for the greatest share of cumulative emissions, and which is responsible for the greatest proportion of current emissions? A. The European Union for cumulative, the United States for current B. The United States for cumulative, China for current C. China for cumulative, India for current D. The United States for both	**2**	**CO 1**
Q 10	What four key parameters does the TCFD recommend firms disclose? a. Adaptive capacity, governance, resilience b. Governance, risk management, strategy, metrics c. Strategy, vulnerability, physical hazards, stranded assets d. Metrics, scores, reputational risk	**2**	**CO 1**
SECTION B **4Qx5M= 20 Marks**			
	Answer the following questions in brief		
Q11	Describe the “Global Sea Level Rise” and its impact on climate change.	**5**	**CO 2**

Q12	Describe the brief History of International Climate Agreements, from Kyoto to Paris.	**5**	**CO 2**
Q13	Describe the health impacts of changing air quality on the people	**5**	**CO 2**
Q14	Differentiate the types of private-sector sustainability and climate investment policies	**5**	**CO 2**
SECTION-C 3Qx10M=30 Marks			
	Answer the following questions in detail		
Q15	Describe how corporations use scenario analysis to set corporate strategies and communicate with stakeholders	**10**	**CO 3**
Q16	Analyze how physical and transition risks can provide opportunities for companies and sectors.	**10**	**CO 3**
Q17	Describe IPCC scenarios, associated representative concentration pathways (RCPs), and shared socioeconomic pathways (SSPs).	**10**	**CO 3**
SECTION-D 2Qx15M= 30 Marks			
	Answer the following questions in detail		
Q18	Analyze the Case Study 'ON USE OF SCENARIOS For TRANSITION RISK: HSBC'. Draw Consolidated transition risk heat map across six high transition risk sectors.	**15**	**CO4**
Q19	Analyze the case 'FROM LAGGARD TO THE FOREFRONT' IEA (2021), Net Zero by 2050: A Roadmap for the Global Energy Sector	**15**	**CO 4**