Name:

Enrolment No:



Semester: IV

UPES

End Semester Examination, May 2024

Course: Green Transition & Smart Infrastructure

Program: BBA GES Time : 03 hrs.
Course Code: OGET2007P Max. Marks: 100

Instructions:

SECTION A 10Qx2M=20Marks (Answer All Question)

S. No.		Marks	CO
Q 1	Complete the abbreviations 1. UNFCC 1. UNDP	2	CO1
Q 2	Name 2 technologies that can be used for Smart Grid implementation	2	CO1
Q 3	Give names to types of Solar panels available in market	2	CO1
Q 4	Name 2 Bilateral Financing agencies	2	CO1
Q 5	What is IoT?	2	CO1
Q 6	What is a pilot project?	2	CO1
Q 7	What is Smart city?	2	CO1
Q 8	For finding installment amount what Excel function can we use.	2	CO1
Q 9	What is Grey Hydrogen?	2	CO1
Q 10	What is MTOE?	2	CO1
	SECTION B		
	4Qx5M=20 Marks		
Q 1	What is the difference in Senior Debt and Subordinate Debt?	5	CO2
Q 2	What is the significance of Smart City projects in India	5	CO2
Q 3	Explain the data value chain.	5	CO2
Q 4	Explain AMI under Smart Grid.	5	CO2
	SECTION-C 3Qx10M=30 Marks		1
Q 1	Analyze the steps by which Economic Evaluation of Solar Rooftop PV is being done	10	CO3
Q 2	Analyze the Sustainability provisions for over 3000 square meter Residential area.	10	CO3
Q 3	Analyze the role of government institutions in Sustainable Development projects	10	CO3

SECTION-D					
2Qx15M= 30 Marks					

Brief:

- Tacoma, Washington, is studying ways to increase building material reuse through deconstruction and salvage, following the city council's unanimous approval of a resolution on March 19.
- The resolution directs the city manager to propose options to increase these efforts in Tacoma and to estimate costs. By May 22, the city's Infrastructure, Planning and Sustainability Committee must review the options.
- Reusing building materials will help Tacoma balance its desire for growth with its climate goals, Council Member Kristina Walker said at the March city council meeting. "Most cities find that demolition results in the loss of tens of thousands of tons of reusable items worth millions of dollars," she said.

Businesses and nonprofits have been doing building deconstruction and salvage for years, but its a relatively new space for cities. Pittsburgh, Milwaukee and San Antonio are among the cities developing initiatives to reuse and recycle parts of old buildings being torn down. In 2016, Portland, Oregon, became the first U.S. city with a deconstruction ordinance, requiring buildings constructed before 1916 to be deconstructed rather than demolished. A 2020 amendment to the rule raised the year-built threshold from 1916 to 1940.

A City of Tacoma news release differentiates between deconstruction and salvage. "Deconstruction refers to the systematic disassembly of buildings to maximize the reuse of materials, while salvage is the removal of valuable or useful surface level materials for reuse," the release says.

The city pointed to numerous deconstruction benefits in the news release. Aside from avoiding the greenhouse gas emissions produced when new materials are created, the practice could increase the likelihood of discovering materials containing dangerous substances like lead and asbestos. That discovery would allow for safe removal and disposal of the materials. The city also says deconstruction could limit air pollution created during demolition and that reusing historic building materials could help create "visual continuity" in neighborhoods.

CO4

	But as with many products, it is easier and cheaper to throw out building materials than to recycle and reuse them, Tacoma Deputy Mayor John Hines said at the city council meeting. He said the city would need to incentivize deconstruction to make it a realistic option. The city manager's study will look at ways to make it easier for the community to access credible salvage assessments that determine which building materials can be reused, Walker said. It will also look at strategies to lower deconstruction costs or shorten timelines. The study will also include ways the city can assist with deconstruction-related workforce development and options for where salvaged and deconstructed materials can be stored. Deconstruction still faces critics in Tacoma. It might take up to two weeks to deconstruct a building compared with the two-day process of demolition, Evan Mann, the president of the Master Builders Association of Pierce County, where Tacoma is located, told local newspaper The News Tribune. He added that certain salvaged materials, like deteriorated lumber, aren't likely to be used by builders and the process of deconstructing buildings could put contractors in more direct contact with hazardous contaminants. At the March city council meeting, local lawmakers clarified that no deconstruction and salvage rule has been developed yet. "This is not the end," Tacoma Mayor Victoria Woodards said. "This is merely just the beginning."		
Q1	How can Deconstruction and Salvage help in reduction of GHG Emission?	15	CO4
Q 2	What learning India can get from above case study?	15	CO4