

School of Basic and Applied Sciences

Chemistry
ETE - Jun 2023

Time : 3 Hours

Marks : 100

Sem IV - C1UB401T / BSCC2101

Green Chemistry

Your answer should be specific to the question asked

Draw neat labeled diagrams wherever necessary

1. Classify the term photocatalyst. Why TiO₂ is used as such a catalyst in green chemistry? K2 CO2 (5)
2. What is the concept of 'Real time monitoring concept' and interpret its importance? K1 CO1 (5)
3. What is the importance of green chemistry and benefits of green chemistry to the society? K1 CO3 (5)
4. Classify the concept of ISD? What are its significant subdivisions? K3 CO4 (10)
5. Explain about the concept of 'Prevention of waste or side product generation'. K3 CO2 (10)

OR

- Classify about the ultrasound assisted Simmon-Smith reaction. K3 CO4 (10)
6. Illustrate the concept of green solvents and what are the advantages of using supercritical solvents and ionic liquids over conventional solvents? K2 CO2 (10)
 7. Classify the various green solvents and list down their properties. K4 CO5 (10)
 8. Analyze the significant properties of environmentally friendly antifoulants, emphasizing their eco-friendly nature and benefits. K4 CO5 (15)

OR

- Explain with suitable examples from day-to-day life explain the significance of zero waste technology. K4 CO6 (15)
9. Develop the green chemistry atom economy concept holds good in comparison to the efficiency of a reaction. K4 CO4 (15)
 10. Analyze the benefits and drawbacks of the ultrasonic synthesis in comparison to conventional synthesis methods in green chemistry. K3 CO5 (15)