



## **UNIT -3 –NANOMATERIALS**

## PART-A

- 1. Define nanotechnology
- 2. What is a quantum dot?
- 3. What is the sizerange of nanomaterials?
- 4. What are NanoMaterials, Givean Example
- 5. What is the significance of the surface are a to volumeratioin nanomaterials?
- 6. Distinguish between Nano and bulkmaterials
- 7. What are types of nanomaterials?
- 8. Mention the types of approaches to synthesize Nanoparticles
- 9. What are bottom upapproach? Give an example
- 10. What are Top down approach? Give an example
- 11. Name two methods of synthesizing nanoparticles
- 12. What are carbon nanotubes?
- 13. List out the properties of carbon nanotubes
- 14. List out the uses of carbon nanotubes.
- 15. How are nanomaterials used in medicine?

## PART B

- 1. Discuss about the difference between molecules, nanoparticles and bulk materials.
- 2. Discuss the preparation of carbon nanotubes by chemical vapour deposition method.
- 3. List out the properties and uses of CNT.
- 4. Describe the synthesis of nanomaterials by laser ablation and solvothermal process.
- 5. Discuss the various steps involved in synthesis of nanomaterials by sol gel method.
- 6. Identify the applications of nanotechnology in medicine, energy science and electronics.