

END OF SEMESTER EXAMINATIONS, APRIL / MAY - 2019
SKILL BASED PAPER: INDUSTRIAL CHEMISTRY
SUBJECT CODE: 13UECH01

MAJOR : B.Sc., (Chemistry)
 TIME : 3 HOURS

SEMESTER : VI
 MAX.MARKS : 75

SECTION - A (10 X 1 = 10)

Answer ALL the Questions:

1. How is Nylon 6,6 Prepared?
2. Mention any two important properties of wool and silk.
3. Write any three machinery used in dyeing process.
4. What are chromophore? Give any two examples.
5. Write any two differences between soaps and detergents.
6. What are anti-knocking agents? Give any two examples.
7. What are the raw material needed for the manufacture of Glass?
8. Define the term "Glazing of Ceramics".
9. How is fountain pen ink Prepared?
10. List out any four synthetic rubber.

SECTION - B (5 X 4 = 20)

Answer ALL the Questions:

11. a) Explain the synthesis, properties and uses of Rayon.
(OR)
b) Describe the structure and properties of cotton.
12. a) Explain about the roller printing.
(OR)
b) What are Indigo dyes? How are they synthesis and isolated? Explain its applications on cotton fabric.
13. a) How is petroleum formed? Give its chemical composition. Explain its properties.
(OR)
b) Write a short note on preparation of Toilet soap and Transparent Soap.
14. a) What are refractories? How are they classified? Give suitable examples. Mention the characteristics of a good refractory materials.
(OR)
b) What are enamels? How is it manufactured? Mention its uses.
15. a) How is natural rubber manufactured from rubber latex? Give its disadvantages.
(OR)
b) What do you mean by perfumes? How are they categorized? Give examples. Explain their uses.

SECTION - C (5 X 9 = 45)

Answer ALL the Questions:

16. a) (i) Define the term fibre. How are they classified? Give suitable examples. (4)
(ii) Illustrate the synthesis, properties and uses of Dacron. (5)
(OR)
b) Describe the sequence of processing of textile fibres.
17. a) (i) Distinguish between printing and Dyeing. (2)
(ii) Explain the functions of Jiger dyeing and Jet dyeing machines. (7)
(OR)
b) (i) What are dyes? How are they classified based on chemical structure and mode of applications? (6)
Give suitable examples.
(ii) Write a short note on Natural dyes and its advantages.
18. a) Define the term: "Cracking". How synthetic petrol are manufactured by catalytic cracking and thermal cracking method?
(OR)
b) How Soaps and detergents are manufactured on large scale?
19. a) How is Glass manufactured? Explain in detail.
(OR)
b) How is Ceramics manufactured? Explain in detail.
20. a) Write a short note on (i) Compounding of rubber (ii) Vulcanization of rubber.
(OR)
b) How can you prepare
(i) Synthetic perfumes
(ii) Safety matches
(iii) Naphthalene balls
(iv) Gumpaste
(v) Natural Perfumes.
