

CHAPTER 15

COMMON CHEMICAL INDUSTRIES IN PAKISTAN

MULTIPLE CHOICE QUESTIONS

- Which component, if present in paper causes brittleness:
(a) Chlorine (b) Cellulose
(c) Sodium hydroxide (d) Lignin
- Which of the following three elements are largely needed for healthy growth of plants:
(a) N, P, S (b) N, P, C
(c) N, P, K (d) N, P, H
- Nitrogen helps in:
(a) Normal growth of plant (b) Protein synthesis
(c) Nucleic acid synthesis (d) All of above
- The nutrients which are required in very small amount for growth of plants are called:
(a) Nitrogenous fertilizers (b) Micronutrients
(c) Macronutrients (d) Surfactants
- Which of the following element is not macro-nutrient:
(a) B (b) Ca
(c) S (d) H
- Which of the following is not micro-nutrient:
(a) Fe (b) Mn
(c) Cu (d) H

7. Which of the following is not calcareous material:
- (a) Lime stone (b) Marine shell
(c) Clay (d) Marble
8. Which is not argillaceous material:
- (a) Lime stone (b) Clay
(c) Slate (d) None
9. The %age of nitrogen in NH_4NO_3 is:
- (a) 33 – 33.5% (b) 30 – 33.5%
(c) 30 – 32.5% (d) 31 – 32%
10. What is the main function of rotary kiln:
- (a) Heating lime stone (b) Heating of clinker
(c) Drying of slurry (d) Preparation of clinker
11. Which of the following process is alkaline:
- (a) Kraft process
(b) Sulphite process
(c) Neutral sulphite semi chemical process (NSSC)
(d) None
12. DAP contains P_2O_5 :
- (a) 48% (b) 38%
(c) 68% (d) 75%
13. Which of the following compounds is present in highest percentage in cement:
- (a) Lime (b) Clay
(c) Na_2O (d) Alumina
14. Which fertilizer is widely used in Pakistan:
- (a) Urea (b) KNO_3
(c) DAP (d) K_2SO_4
15. Which of the following fertilizers, contains 75% nutrient:
- (a) DAP (b) TAP
(c) Urea (d) NH_4NO_3

16. Which of the following is woody material:
- (a) Bamboo (b) Poplar
(c) Bagasse (d) Wheat straw
17. Which of the following is main process in paper industry:
- (a) Screening (b) Bleaching
(c) Digestion (d) Stock preparation
18. Which of the following bleaching agents is largely used for bleaching of pulp, in Pakistan:
- (a) O_2 (b) O_3
(c) ClO_2 (d) Cl_2
19. Micronutrients requirement (per acre) for the normal fertility of soil:
- (a) 4 – 10 g (b) 6 – 200 kg
(c) 6 – 200 g (d) None of above
20. The word paper is derived from reedy plant:
- (a) Papyrus (b) Rose
(c) Acacia (d) Papaya
21. The nutrients which are required in very small amount for growth of plants are called:
- (a) Nitrogenous fertilizers (b) Micronutrient
(c) Macronutrient (d) Surfactants
22. What is clinker:
- (a) Roasted calcareous material
(b) Roasted gypsum
(c) Roasted argillaceous
(d) Roasted calcareous and argillaceous material
23. Which one of the following is woody raw material used for making pulp and paper:
- (a) Eucalyptus (b) Wheat straw
(c) Bagasse (d) Cotton linter
24. Which of the following fertilizer is not useful for paddy rice:
- (a) DAP (b) Ammonium sulphate
(c) Urea (d) Ammonium nitrate

25. Which substance is used as filler or additive in paper making:
- (a) Cellulose (b) Starch
(c) Lime (d) Gypsum salt
26. Phosphorus helps the growth of:
- (a) Root (b) Leave
(c) Stem (d) Seed
27. Rotary kiln has how many zones:
- (a) 2 (b) 3
(c) 4 (d) 5
28. Which element is often present in all fertilizers:
- (a) Nitrogen (b) Carbon
(c) Phosphorus (d) Potassium
29. The %age of nitrogen in urea is:
- (a) 35% (b) 46%
(c) 82% (d) 75%
30. "Rock Phosphate" has composition of:
- (a) CaH_3PO_4 (b) $\text{Ca}(\text{H}_2\text{PO}_4)_2$
(c) $\text{Ca}_3(\text{PO}_4)_2$ (d) CaHPO_4
31. Which one of the following is an organic fertilizers:
- (a) Manure (b) Amonium nitrate
(c) Urea (d) Both (a) and (c)
32. Which of the following cannot be used as phosphatic fertilizer:
- (a) CaH_3PO_4 (b) $(\text{NH}_4)_2\text{HPO}_4$
(c) $\text{Ca}_3(\text{PO}_4)_2$ (d) P_2O_5
33. Cement was introduced by a mason:
- (a) D-H Whore (b) Humphry Davy
(c) Joseph Aspdin (d) F. Wholer
34. The %age gypsum in the cement is:
- (a) 1 – 2% (b) 2 – 3%
(c) 3 – 4% (d) 4 – 5%
35. In the cement manufacture, the digester revolves at R.P.M.
- (a) 2 (b) 2.5
(c) 3.0 (d) 3.5

answers

1.	(d)	2.	(c)	3.	(d)	4.	(b)	5.	(a)
6.	(d)	7.	(c)	8.	(a)	9.	(a)	10.	(d)
11.	(a)	12.	(a)	13.	(a)	14.	(a)	15.	(a)
16.	(b)	17.	(c)	18.	(c)	19.	(c)	20.	(a)
21.	(b)	22.	(d)	23.	(a)	24.	(d)	25.	(d)
26.	(d)	27.	(c)	28.	(a)	29.	(b)	30.	(c)
31.	(d)	32.	(c)	33.	(c)	34.	(d)	35.	(b)