B.Sc II Yr (III Semester) Chemistry Practical Examination

Paper III- Quantitative analysis – I

Objective type Question Bank

1. What is meant by quantitative analysis?
2. What is volumetric analysis?
3. What is meant by titration?
4. What is primary standard substance?
5. Define standard solution?
6. Define Molarity?
7. Define Normality?
8. What is standardization?
9. What is an end point?
10. What is an indicator?
11. How do you prepare a standard solution?
12. Give an example for neutralization reaction?
13. Give an example for a Redox reaction?
14. What is the Chemical name of Backing soda?
15. What is the Chemical name of Washing soda?
16. What is the color of methyl orange indicator in basic medium?
17. What is the color of phenolphthalein indicator in basic medium?
18. What is the product of molarity and molecular weight?
19. Calculate the amount of carbonate in 100 ml of 0.05M washing soda solution?
20. What is the nature of antacid?
21. Which indicator is used in the estimation of ferrous ion by Dicrometry?
22. Which indicator is used in Permanganometry?
23. Calculate the molarity of the solution containing 0.315g of oxalic acid in 100 ml?
24. What is the amount of $K_2Cr_2O_7$ is required to prepare 100 ml of 0.02 M solution?
25. What is Iodometry titration?
26. What indicator is used in Iodometry titration?
27. What is the chemical name of Hypo?

28. Why conical flask is kept in dark before the liberation of iodine in Iodometry?

29. What is the color of cuprous iodide?

30. Calculate the molarity of a solution containing 1.24 g of hypo in 100 ml?

PRACTICAL EXAMINATION

Scheme of Evaluation

Experiment : **15** ***Marks***

(Preparation of standard solution and standardization – **08** *Marks* & Estimation – **07** *Marks*)

Objective type questions : **05** ***Marks*** (10 questions, each 1/2 Mark)

Record : **05** ***Marks***

TOTAL **: 25** ***Marks***

****

B.Sc II Yr (III Semester) Chemistry Practical Examination

Paper III- Quantitative analysis – I

Experiment Questions

---

1. Estimate the amount of **Bicarbonate (HCO_3^-)** in given sample of Baking Soda solution. You are provided pure sample of Na_2CO_3 and approximately 0.1M Hydrochloric acid.

2. Estimate the amount of **Carbonate (CO_3^{2-})** in given sample of Washing Soda solution. You are provided pure sample of Na_2CO_3 and approximately 0.1M Hydrochloric acid.

3. Estimate the amount of **Carbonate (CO_3^{2-})** and **Bicarbonate (HCO_3^-)** in given solution. You are provided pure sample of Na_2CO_3 and approximately 0.1M Hydrochloric acid.

4. Estimate the amount of **Alkali content** in given sample of Antacid solution. You are provided pure sample of Na_2CO_3 and approximately 0.1M Hydrochloric acid, 0.1M Sodium Hydroxide solutions.

5. Estimate the amount of **Iron {Fe(II)}** present in given solution. You are provided pure sample of $K_2Cr_2O_7$.

6. Estimate the amount of **Iron {Fe(II)}** present in given solution. You are provided pure sample of $Na_2C_2O_4$ and approximately 0.01M $KMnO_4$ Solution.

7. Estimate the amount of **Copper {Cu(II)}** present in given solution. You are provided pure sample of $K_2Cr_2O_7$ and approximately 0.05M Hypo Solution.

****