Name:		
<b>Enrolment No:</b>		



Semester: I

Time 03 hrs.

## UNIVERSITY OF PETROLEUM AND ENERGY STUDIES Online End Semester Theory Examination, January 2021

Course: Pharmaceutical Analysis I

Program: B. Pharm. Course Code: BP102T

02T Max. Marks: 75

**Instructions:** 

## **SECTION A**

		SECTION A	
S. No.	CO	Multiple Choice Questions or Objective type Questions	Marks
Q1	CO3	Write an example of pM indicator	1
Q2	CO3	Perchloric acid is standardized by (Benzoic acid, Tartaric acid, Potassium Hydrogen Pthalate, Oxalic acid)	1
Q3	CO4	Mohr's titration is a type of (Direct/Residual) method in precipitation titrations	1
Q4	CO4	Define Ostwald Ripening	1
Q5	CO4	Metal-indicator complex should be stronger than metal-EDTA complex. True/False	1
Q6	CO4	Give primary standard for EDTA (Zinc, NaCl, oxalic acid, Potassium Hydrogen Pthalate)	1
Q7	CO5	Give any example of reference electrode	1
Q8	CO1	Write the reaction involved in the limit test of iron	1
Q9	CO4	Mixed crystal, Occlusion and surface adsorption are terms related to (Coprecipitates/ Post Precipitates)	1
Q10	CO4	Water determination is commonly done using titration	1
Q11	CO2	Which color does phenolphthalein produce at acidic pH	1
Q12	CO1	What do you mean by term hygroscopic	1
Q13	CO1	Which of the following is not a primary standard a. Sodium Hydroxide b. Zinc c. NaOH d. Potassium hydrogen pthalate	1
Q14	CO3	Indicator used in Mohr's titration	1
Q15	CO5	Define conductance	1
Q16	CO1	How will you prepare 10% w/v solution of paracetamol	1
Q17	CO1	Give equivalent weight for H <sub>3</sub> PO <sub>4</sub>	1
Q18	CO3	Name one protogenic solvent	1
	1		

Q19	CO5	Give primary standard for HCl	1
Q20	CO1	Write one example of determinate error	1
		SECTION B	
		Long Answers (Answer 2 out of 3) 2x10	20
Q1	CO2	a. Discuss titration of strong acid and strong base with titration curve.	10
Q2	CO4	Give principle of complexometric titrations. Write the procedure for the preparation and standardisation of 1M disodium EDTA	10
Q3	CO1	<ul><li>a. Define accuracy and precision</li><li>b. Define term assay</li><li>c. Write about different methods to reduce errors.</li></ul>	10
1		SECTION C	
		Short Answers (Answer 7 out of 9) 7X5	35
Q1	CO1	Write about scope of pharmaceutical analysis	5
Q2	CO2	Write about non aqueous titration of weak acid by giving a suitable example	5
Q3	CO5	Classify two types of electrodes use din potentiometric titration (with one example each.	5
Q4	CO4	Explain Diazotization titration	5
Q5	CO5	Write the principle of conductometric titration with the help of titration curves	5
Q6	CO5	Explain end point determination in potassium dichromate titrations.	5
Q7	CO4	Write one line each about direct, indirect and adsorption method of precipitation titrations	5
Q8	CO1	How will you prepare 0.01M NaOH solution (1L). Also, comment on the accuracy of concentration of prepared NaOH solution.	5
Q9	CO1	Explain normality, molarity and parts per million	5
		Total	75