

PPSC Chemistry Full Book Test

Sr	Questions	Answers Choice
1	In terms of number of phases (p) components (C) and degree of freedom (F) the phase rule is expressed as.	A. $P + C = F + 2$ B. $F = P + C - 2$ C. $P + F = C + 2$ D. $P - F = C = 2$
2	The number of phases of mixtures of four gases enclosed in a container is	A. 1 B. 4 C. 4-1 D. zero
3	30 mL of an acid solution is neutralized by 15 mL of 0.2 N base. The strength of acid solution is.	A. 0.1 N B. 0.15 N C. 0.3 N D. 0.4 N
4	The normality of 2.3 M H_2SO_4 solution is.	A. 0.46 N B. 0.23 N C. 2.3 N D. 4.6 N
5	Which of the following solution has highest normality.	A. 1 N H_2PO_4 B. 0.5 N H_2SO_4 C. 6 g NaOH per 100 cm ³ D. 4 g NaOH PER 1000 cm ³
6	Which of the following expression is correct.	A. $C = n/RT$ B. $C = RT/n$ C. $RT = Cn$ D. $Cn = 1/RT$
7	At the some temperature 0.1 M solution of urea is isotonic with.	A. 0.1 M glucose solution B. 0.1 M NaCl solution C. 0.1 M urea solution D. 0.1 M $BaCl_2$ solution
8	Sea water is converted into fresh water bases upon the phenomenon of.	A. Plasmolysis B. Sedimentation C. Diffusion D. Osmosis E. Reverse osmosis
9	The flow of solvent into a solution when two are separated by a semi -permeable membrane is called.	A. Mixing B. Effusion C. Diffusion D. Osmosis
10	Which of the following solution would have the largest depression in freezing point.	A. 1% glucose B. 1 % KCl C. 1 % $AlCl_3$ D. 1 % $BaCl_2$
11	Which of the following solution would exhibit abnormal colligative proportions.	A. 0.1 M NaCl B. 0.1 M urea C. 0.1 M sucrose D. 0.1 M glucose
12	The osmotic pressure of a solution with definite composition.	A. Varies directly as the volume and temperature. B. Various inversely as the temperature. C. Varies inversely as the volume and directly as the temperature. D. None of the above
13	The relative lowering of vapour pressure of a solution on the addition of non -volatile solute.	A. Is equal to the mole fraction of solute B. Is equal to the sum of the mole fraction of the solute and solvent C. Depends upon the nature of the solute D. Depends upon the mole fraction of the solvent
		A. Vapour pressure lowering

14	Iso-osmotic solutions are those which have the same.	B. Osmotic pressure C. Molality D. Boiling point elevation
15	The freezing point of a solvent	A. Will increase on adding a solute B. Will decrease on adding a solute C. Will not change on adding solute D. None of the above
16	The temperature at which the vapour pressure becomes equal to external pressure is called.	A. Saturation point B. Critical temperature C. Consolute temperature D. Boiling point
17	Which of the following properties does not depend upon the number of solute particles.	A. Elevation in B.P. B. Osmotic pressure C. Depression in F.P. D. Boiling point of the solvent
18	Which of the following is not a colligative property.	A. Elevation of B.P. B. Depression in F.P. C. Viscosity D. Osmotic pressure
19	For dilute solutions colligative properties depend on.	A. The number of the particles of the solute and nature of solvent. B. The number of the solute particles and on their nature C. The number of the solute particles and nature of solute and solvent D. The number of the solute particles and irrespective of the nature of the solute and solvent.
20	According to Henry's Law, the mole fraction of a gas (x) dissolved in a solvent is related to the pressure of the gas.	A. $x = k/p$ B. $x = p/k$ C. $x = k$ D. $p = k/x$
21	The law which relates the solubility of a gas to its pressure is called.	A. Raoult's law B. Nernst law C. Ostwald's law D. Henry's law
22	The temperature at which two conjugate solutions change into one homogeneous solution is called.	A. Azeotrope B. Conjugate temperature C. Consolute temperature D. Transition temperature
23	Which of the following system has low as well as upper consolute temperature.	A. Nicotine - water B. Aniline -water C. Triethylamine -water D. Phenol -water
24	Which of the following is not correct criteria for an ideal solution.	A. Enthalpy of mixing = 0 B. Volume of mixing = 0 C. Free energy of mixing = 0 D. Obeys Raoult's law
25	Solution with components which obeys Raoult's over the entire composition range are said to be.	A. Real solution B. Regular solutions C. Dilute solutions D. Ideal Solution
26	Which of the following solutions of sulphuric acid will exactly neutralize 25 mL. of 0.2 M NaOH	A. 12.5 mL of 0.1 M solution B. 24 mL OF 0.1 m Solution C. 50 mL of 0.1 M solution D. None of the above
27	The molarity of a 500 mL solution containing 4 g NaOH	A. 0.1 B. 0.2 C. 0.3 D. 0.4
28	How much amount of NaOH is required to prepare 100 mL of 1 N solution.	A. 80 g B. 4 g C. 40 g D. zero
29	One ppm solution of NaOH Contain 1000 mg of the solute per how much of the volume of the solution.	A. 1000 mL B. 100 mL C. 10 mL D. 1 mL
30	The number of formula weight of the solute dissolved per dm ³ of the solution is called.	A. Mole fraction B. Normality C. Formality D. Molality

