

PPSC Chemistry Part I Physical Chemistry Online Test

Sr	Questions	Answers Choice
1	The units of coefficient of viscosity are.	A. $\text{kg m}^{-1} \text{s}^{-1}$ B. $\text{gm}^{-1}, \text{s}^{-1}$ C. $\text{kgm}^{-1}, \text{min}^{-1}$ D. None of the above
2	Which of the following device is used to measure the surface tension.	A. Polarimeter B. Viscometer C. Refractometer D. Stalagnameter
3	The rise of a liquid in capillary tube is due to.	A. Osmosis B. Diffusion C. Surface tension D. Viscosity
4	The units of surface tension in SI system are	A. Joule m^{-1} B. Newton m^{-1} C. Erg cm^{-1} D. Dynes cm^{-2}
5	At higher altitudes, the boiling point of water is lowered because.	A. Atmospheric pressure is low B. Temperature is low at high altitude C. Atmospheric pressure increase D. None of the above
6	Which of the following liquids has lowest vapour pressure at 25 °C	A. Benzene B. Chloroform C. Ether D. H ₂ O
7	A drop of a liquid acquires spherical shape because of.	A. Its viscous nature B. Capillary action C. The tendency to acquire minimum surface are D. Its shape
8	Which of the following property of liquids concern with the interval resistance to its flow.	A. Refractive index B. Viscosity C. Optical activity D. Dipole moment
9	The vapour pressure of a liquid	A. Always increase's with temperature B. Always decreases with temperature C. Is independent of temperature D. Increase up to the boiling point
10	Which of the following molecules has the lowest average speed at 273 K.	A. CO ₂ B. CO C. CH ₄ D. O ₂
11	Which of the following equations is the most general equation of state.	A. Vander Waal's equation B. Dielectric equation C. Clausius equation D. Kamberling Onnes equation
12	The velocity possessed by maximum fraction of molecules at a given temperature is called.	A. Average velocity B. Root mean square velocity C. Most probable velocity D. None of the above
13	The vibration degrees of freedom for a linear and non linear poly atomic molecule of seven atoms each are respectively	A. 30 and 29 B. 30 and 32 C. 28 and 29 D. None of above
14	An Ideal gas is one which obeys all the gas law at.	A. Low pressure B. High Pressure C. Low and High temperature D. All condition of pressure and temperature

15	The temperature of a gas below which only the gas cools when allowed to expand is known as.	A. Inversion temperature B. Ideal temperature C. Critical temperature D. Joule Thomson temperature
16	The reciprocal of the coefficient of viscosity is called.	A. Density B. Specific gravity C. Fluidity D. Conductance
17	The number of coordinates required to specify the position of all the atoms in a molecule is called number of degrees of freedom. The vibrational degrees of freedom of a linear molecule containing N atoms are	A. $2N-5$ B. $2N-6$ C. $3N-5$ D. $N-6$
18	The value of compressibility factor (z) = pV/nRT for an ideal gas is equal to.	A. R B. 1 C. 2 D. 3
19	At extremely low pressures, the van der Waals equations for one mole may be written as.	A. $PV = RT + Pb$ B. $PV = RT$ C. $PV = RT - a/V$ D. $(P + a)(V - b) = RT$
20	A gas obeying the van Waals equation will closely resemble an ideal gas if	A. The parameters 'a' and 'b' are small B. 'a' is small but 'b' is large C. 'a' is large but 'b' is small D. None of the above