

XI-BM

Chemistry

Marks - 25

1.n.6

Ln-a-b

I Choose the best answer (5x1=5)

1. The value of the gas constant R is
a) $0.082 \text{ dm}^3 \text{ atm mol}^{-1} \text{ K}^{-1}$ b) $0.987 \text{ cal mol}^{-1} \text{ K}^{-1}$ c) $8.3 \text{ J mol}^{-1} \text{ K}^{-1}$
d) $8 \text{ erg mol}^{-1} \text{ K}^{-1}$
2. Maximum deviation from ideal gas is expected from
a) $\text{CH}_4(g)$, b) $\text{NH}_3(g)$, c) $\text{H}_2(g)$, d) $\text{N}_2(g)$
3. Use of hot air balloon in sports & meteorological observation is an application of
a) Boyle's law b) Newton's law c) Kelvin's law
d) Brown's law
4. The units of Van der Waals constants 'b' & 'a' respectively
a) mol L^{-1} & L atm mol^{-2}
b) mol L^{-1} & L atm mol^{-2} c) $\text{mol}^{-1} \text{ L}^{-1}$ & $\text{L}^2 \text{ atm mol}^{-2}$ d) none of these
5. If temperature & volume of an ideal gas is increased to twice its values, the initial pressure P becomes
a) $4P$ b) $2P$ c) P d) $3P$