

**DPP-01**

1. KO₂ finds use in oxygen cylinders used for space and submarines. The fact(s) related to such use of KO₂ is/are

(A) it produces O ₂	(B) it produces O ₃
(C) it absorbs CO ₂	(D) it absorbs both CO and CO ₂
2. Which of the following compounds are paramagnetic in nature?

(A) KO ₂	(B) K ₂ O ₂	(C) Na ₂ O ₂	(D) RbO ₂
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3. The order of melting point of chlorides of alkali metals is

(A) LiCl > NaCl > KCl < CsCl	(B) LiCl > NaCl > KCl > CsCl
(C) NaCl > KCl > CsCl > LiCl	(D) LiCl > NaCl > CsCl > KCl
4. Sodium metal is highly reactive and cannot be stored under

(A) toluene	(B) kerosene oil
(C) alcohol	(D) benzene
5. Which one of the following fluoride of alkali metals has the highest lattice energy?

(A) LiF	(B) CsF	(C) NaF	(D) KF
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6. The correct order of degree of hydration of M⁺ions of alkali metals is

(A) Li ⁺ < K ⁺ < Na ⁺ < Rb ⁺ < Cs ⁺	(B) Li ⁺ < Na ⁺ < K ⁺ < Rb ⁺ < Cs ⁺
(C) Cs ⁺ < Rb ⁺ < K ⁺ < Na ⁺ < Li ⁺	(D) Cs ⁺ < Rb ⁺ < Na ⁺ < K ⁺ < Li ⁺
7. (Milky Cloud) C $\xleftarrow{\text{CO}_2}$ A + Na₂CO₃ \rightarrow B + C
The chemical formulae of A and B are

(A) NaOH and Ca(OH) ₂	(B) Ca(OH) ₂ and NaOH
(C) NaOH and CaO	(D) CaO and Ca(OH) ₂
8. NaOH (Solid) + CO $\xrightarrow{200^\circ\text{C}}$ X; product X is

(A) NaHCO ₃	(B) Na ₂ CO ₃	(C) HCOONa	(D) H ₂ CO ₃
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ANSWER KEY

1. (A) 2. (A, D) 3. (C) 4. (C) 5. (A) 6. (C) 7. (B)
8. (C)

