



**SOLUTION**

1. NTA Ans. (1)

ALLEN Ans. (1 or Bonus)

Sol. Bonus (no reaction is given)



$$K = \frac{[B]}{[A]} = \frac{11}{6} \approx 2$$

2. Official Ans. by NTA (1)

Sol.  $\Delta H^\circ > 0$   $T \downarrow$  equation shifts back ward.

$N_2$  is treated as inert gas in this case hence no effect on equilibrium.

3. Official Ans. by NTA (2)

Sol.  $N_2 + 3H_2 \rightleftharpoons 2NH_3 \rightarrow K_C = 64$

