

## Related Problem with Solution :

**Calculate the total number of electrons present in one mole of methane.**

**Ans :**

One mole of methane ( $\text{CH}_4$ ) has molecules =  $6.022 \times 10^{23}$

No. of electrons present in one molecule of  $\text{CH}_4 = 6 + 4 = 10$

No. of electrons present in  $6.022 \times 10^{23}$  molecules of  $\text{CH}_4 = 6.022 \times 10^{23} \times 10$   
 $= 6.022 \times 10^{24}$  electrons