

MT EDUCARE LTD.

ICSE X

SUBJECT : **CHEMISTRY**

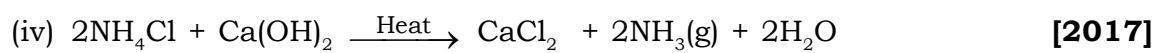
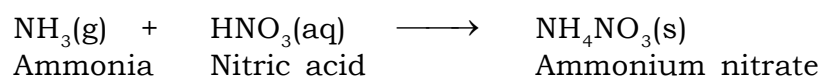
AMMONIA

Assignment Sheet

STEP UP ANSWERSHEET

22. Yellow coloured highly explosive liquid Nitrogen trichloride is given out. [2013]
23. (B) Ammonium nitrite [2013]
24. $3\text{CuO} + 2\text{NH}_3 \longrightarrow 3\text{Cu} + 3\text{H}_2\text{O} + \text{N}_2\uparrow$ [2013]
25. a downward displacement of air [2014]
26. (i) $2\text{NH}_4\text{Cl}(\text{s}) + \text{Ca}(\text{OH})_2(\text{s}) \xrightarrow{\text{u}} \text{CaCl}_2(\text{s}) + 2\text{H}_2\text{O} + 2\text{NH}_3\uparrow$
Ammonium salt slaked lime calcium chloride water Ammonia
- (ii) $\text{NH}_3 + 3\text{Cl}_2 \longrightarrow 3\text{HCl} + \text{NCl}_3$
(excess) (Nitrogen trichloride)
- (iii) $2\text{NH}_3 + \text{H}_2\text{SO}_4 \longrightarrow (\text{NH}_4)_2\text{SO}_4$
Ammonium sulphate [2015]
27. (i) $\text{AlN} + 3\text{H}_2\text{O} \longrightarrow \text{Al}(\text{OH})_3 + \text{NH}_3$
(ii) $8\text{NH}_3(\text{excess}) + 3\text{Cl}_2 \longrightarrow 6\text{NH}_4\text{Cl} + \text{N}_2$
(iii) $2\text{NH}_3 + 3\text{CuO} \longrightarrow 3\text{Cu} + 3\text{H}_2\text{O} + \text{N}_2$ [2016]
28. (i) Ammonia gas
(ii) Nitrogen gas [2016]
29. (i) $3\text{CuO} + 2\text{NH}_3 \longrightarrow 3\text{Cu} + \text{N}_2 + 3\text{H}_2\text{O}$
Copper Oxide Ammonia
- (ii) The equation for catalytic oxidation of ammonia is :
 $4\text{NH}_3 + 5\text{O}_2 \longrightarrow 4\text{NO} + 6\text{H}_2\text{O}$
Ammonia Nitric oxide
Catalyst is a wire mesh consisting of platinum and rhodium.

(iii) Ammonia reacts with nitric acid to produce ammonium nitrate



30. (i) Green or greenish yellow flame is obtained. **[2017]**

31. (C) $\text{Mg}_3\text{N}_2 + \text{H}_2\text{O}$

(D) CaO

(E) Downward displacement of air. **[2017]**

