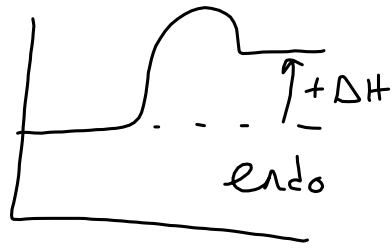


$\textcircled{12} \left| \frac{2.74 \text{ g Al}_2\text{(SO}_4\text{)}_3}{1 \text{ mole Al}_2\text{(SO}_4\text{)}_3} \right| \frac{12 \text{ mole O}}{342 \text{ g Al}_2\text{(SO}_4\text{)}_3} \left| \frac{6 \times 10^{23} \text{ atoms O}}{1 \text{ mole O}} \right.$

$\textcircled{13} M = \frac{\text{moles solute CH}_3\text{OH}}{\text{l soln}} = \frac{11.7 \text{ g CH}_3\text{OH}}{0.23 \text{ l}} \left| \frac{1 \text{ mole CH}_3\text{OH}}{32 \text{ g CH}_3\text{OH}} \right. = \frac{11.7}{8}$

Jan 17-8:14 AM



$n = \text{PFC} \rightarrow \text{Size}$   
 $(n-1) l = \text{Azimuthal} \rightarrow \text{Shape}$   
 $(-l \text{ to } +l) m = \text{Magnetic} \Rightarrow \text{orientation in space}$   
 $s = \text{Spin} \quad +\frac{1}{2}, -\frac{1}{2}$

x, y, z  
axis

Jan 17-8:20 AM

$$\Delta H_{\text{rxn}} = n \sum_{\text{prod}} - n \sum_{\text{react}}$$

$n = \text{mols} - \text{coeff of Bal eqn.}$

$$= \left[ -234.6 + 2(-258.9) \right] - \left[ -986.6 + 2(-100.4) \right]$$

Jan 17-8:24 AM

Actual

$$\Delta T = (K_b \times m) i$$

$\Delta T = 0.52 \frac{^\circ\text{C}}{m}$

% error  $1m + 2m \text{ NaCl} + \text{other}$   
5.5/H

Jan 17-8:30 AM

$\Delta T$

Normal BP

$\text{H}_2\text{O}$

98.4

$\Delta T =$

$1m$   
 $\text{NaCl}$

Jan 17-8:34 AM