

Titration \Rightarrow Neutralization

Add A to B pH \downarrow
OR
Add B to A pH \uparrow

PROCESS

pH = 7 and pOH = 7
 $[H^+] = [OH^-] = 1 \times 10^{-7}$

Moles Acid = Moles Base

#H nMl = #OH nMl

Apr 27-9:27 AM

Acid

H⁺

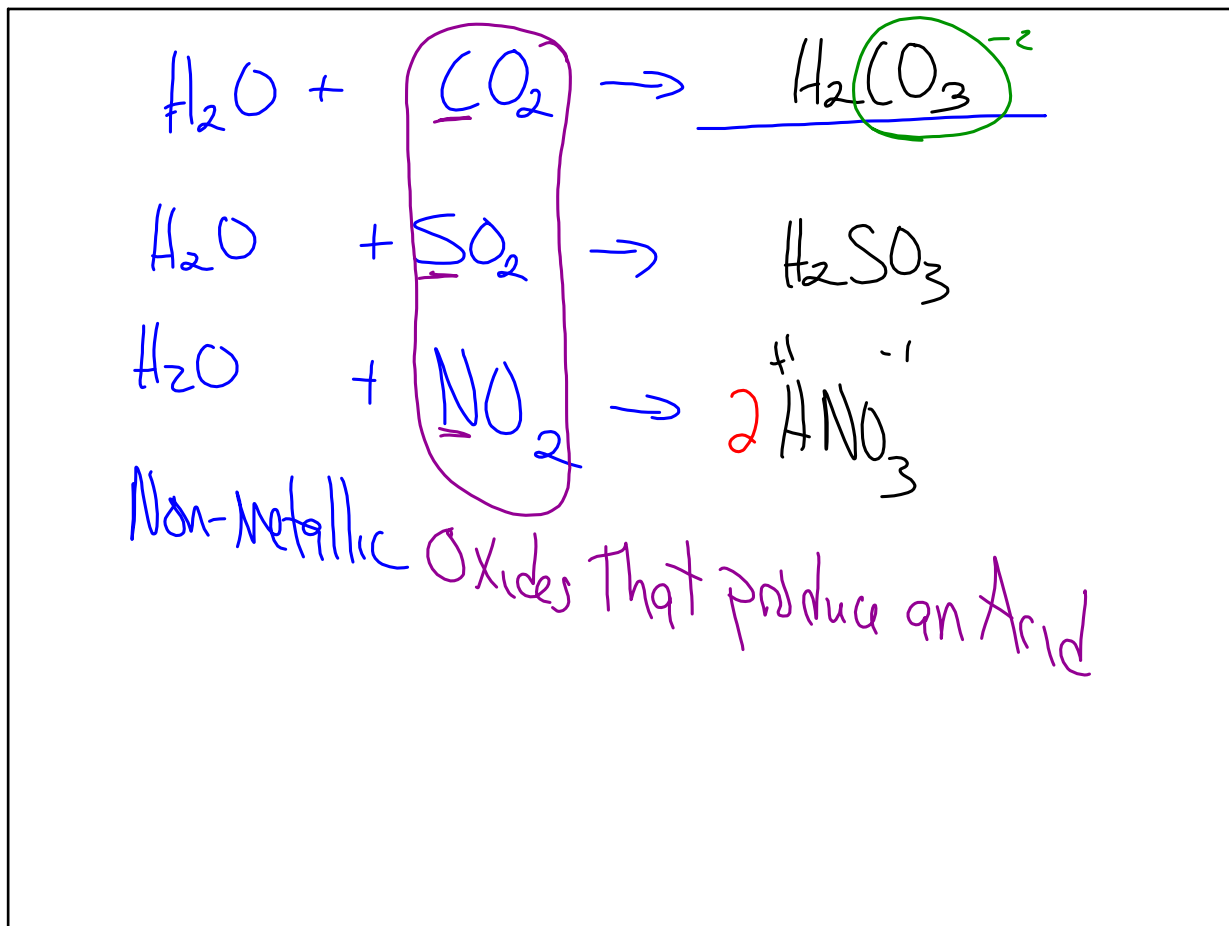
Non-Metal (NM oxide)

Base

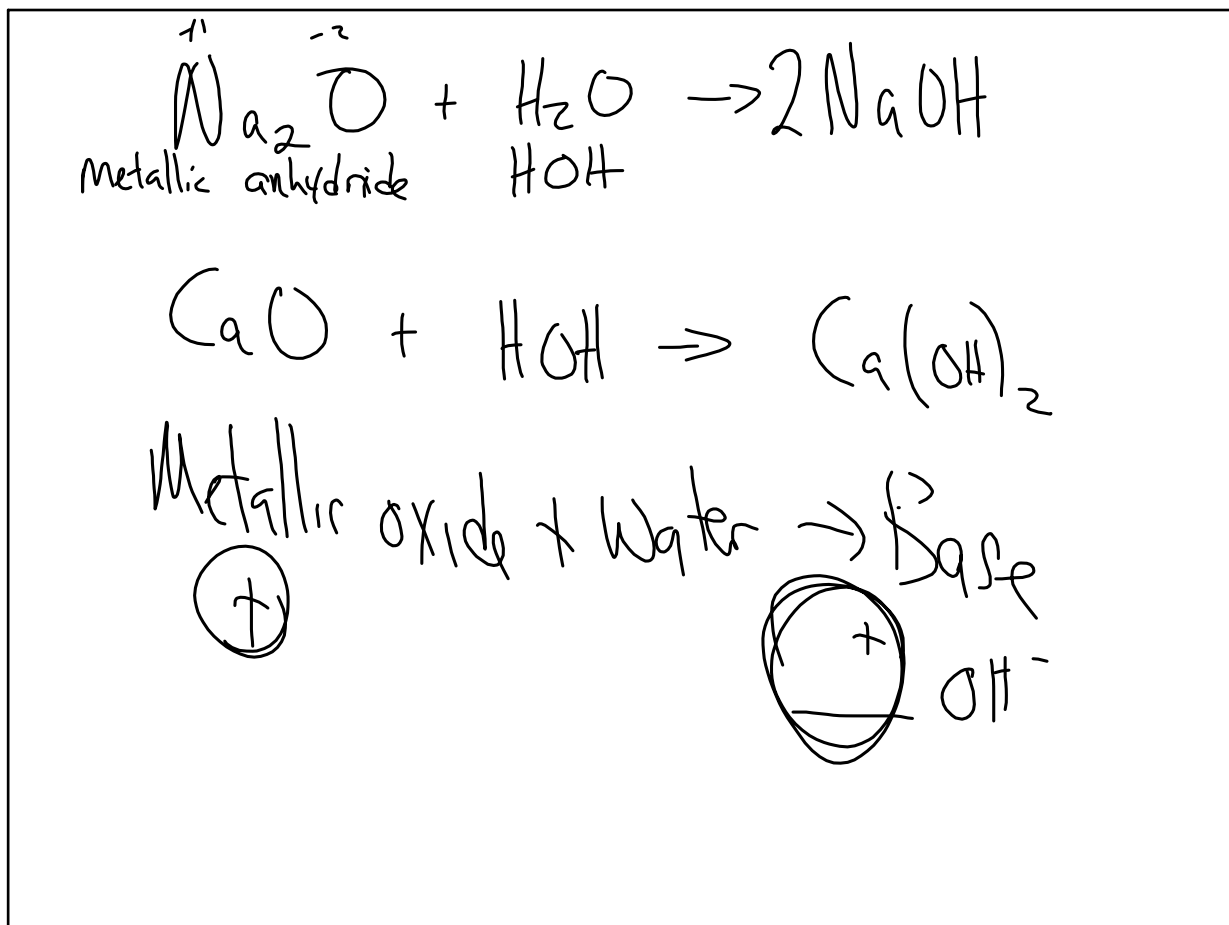
OH⁻

Metallic oxide

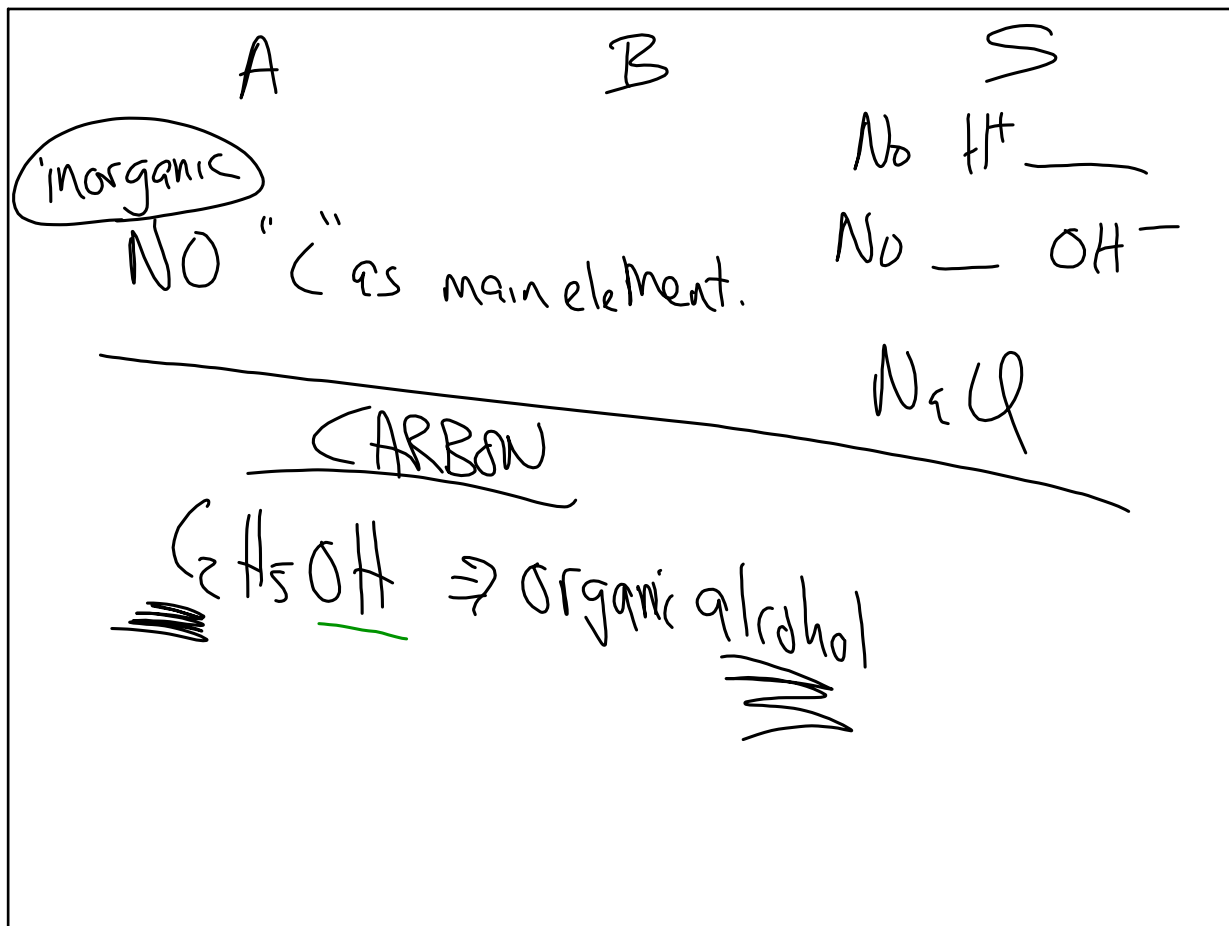
Apr 27-9:37 AM



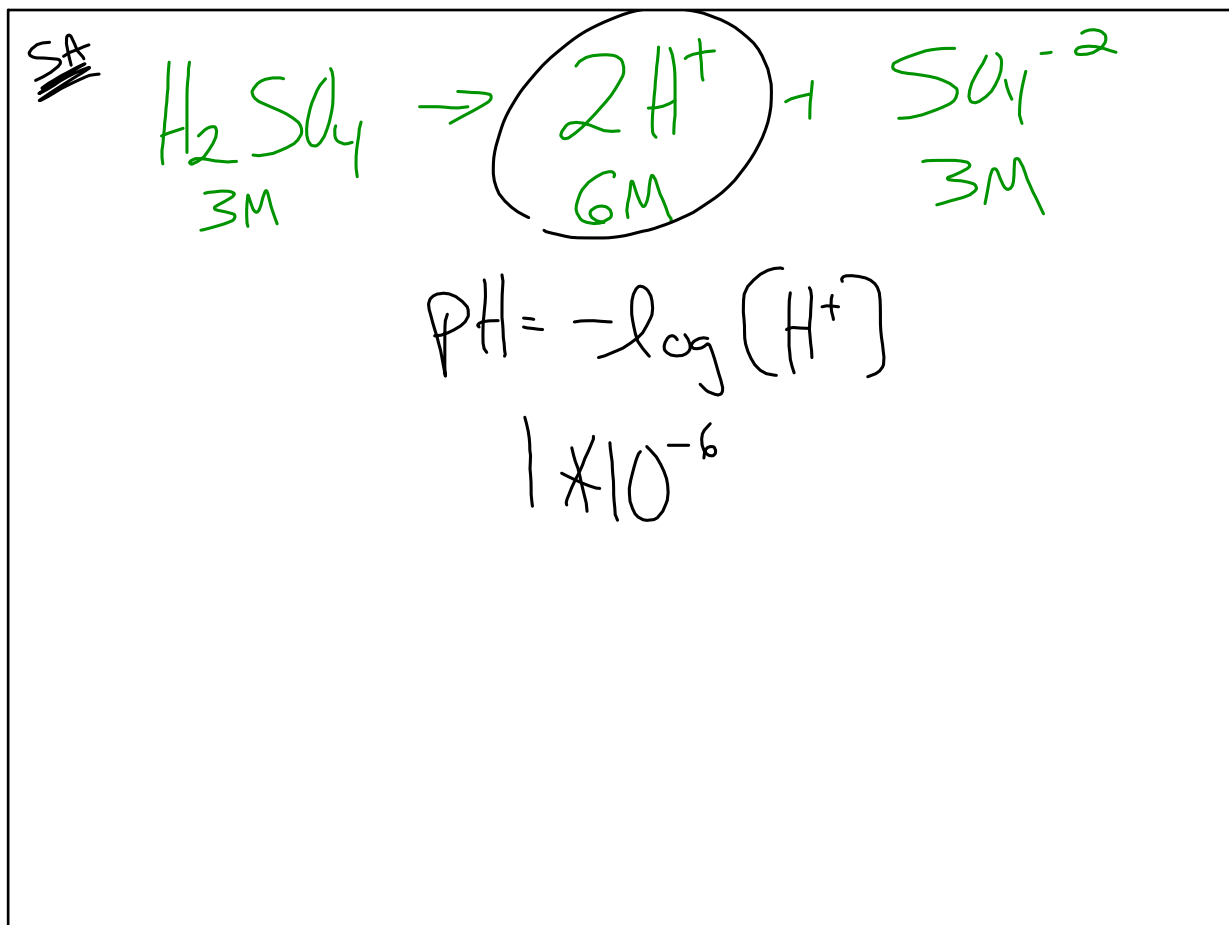
Apr 27-9:40 AM



Apr 27-9:51 AM



Apr 27-9:55 AM



Apr 27-9:58 AM

(WA)

$$\text{H}_2\text{S} \rightarrow 2\text{H}^+ + \text{S}^{2-}$$

I	3M	Q	Q
Δ	-x	+2x	+x
E	3-x	2x	x

$[\text{H}^+] = 2x$

$$K_a = \frac{[\text{H}^+]^2 [\text{S}^{2-}]}{[\text{H}_2\text{S}]} = \frac{(2x)^2 (x)}{3-x} = 1 \times 10^{-9}$$

~~3-x~~

$4x^3 = 3 \times 10^{-9}$

$x = 9.08 \times 10^{-4} = [\text{H}^+]$

18.16×10^{-4}

Apr 27-9:59 AM