

$$\begin{aligned} \Delta H &= [\Delta H \text{ IF}_7] - [\Delta H(\text{IF}_5) + \Delta H(\text{F}_2)] \\ &= (-941) + (+840 + 0) \\ &= -101 \text{ KJ} \end{aligned}$$

Oct 17-7:35 AM

50°  $\text{H}_2\text{O}$  heat lost = heat gained.  $\text{Fe}$  20°

$$\begin{aligned} m_c \Delta T &= m_c \Delta T \\ (90)(4.18)(50 - T_F) &= \frac{(2633)}{\text{mm}} (0.45)(T_F - 20) \\ 376.2(50 - T_F) &= 118.49(T_F - 20) \end{aligned}$$

Oct 17-8:39 AM

Find The Mass

Fe diameter 4cm

$\frac{7.86g}{cm^3}$

$V = \frac{4}{3} \pi r^3$

$V = \frac{4}{3} \pi (2)^3$

$V = 33.5 cm^3$

$\frac{7.86g Fe}{cm^3} \times 33.5 cm^3 = 263.3g Fe$

Oct 17-8:46 AM

(24) Au H<sub>2</sub>O

$M_c \Delta T = M_c \Delta T$

$M (0.13)(75-27.5) = (150)(4.184)(27.5-25)$

$\rho_{Au} = \frac{19.3g}{cm^3}$

$\frac{cm^3}{19.3g Au} \times 254.09g Au = 13.17 cm^3$

$\sqrt[3]{13.17}$

$\sqrt[3]{13.17} = \text{Vol Sphere}$

$(\frac{1}{3})^{\text{Power root}}$

2.36cm on edge

Oct 17-8:58 AM

Chap 6 - Electronic Structure of THE ATOM

Wave

Amplitude

Frequency - how often

$\frac{\#}{\text{sec}}$

$\frac{1}{\text{sec}}$  or  $\text{sec}^{-1}$

Wavelength (m)

Oct 17-9:07 AM

frequency  $f$   $\times$  wavelength = speed of light.

$f \times \lambda = c$

$\frac{1}{\text{sec}} \times \frac{\text{m}}{1} = 3 \times 10^8 \text{ m/sec}$

$\mu$

Oct 17-9:19 AM

$f \uparrow, f \downarrow$

Radio  
880 AM WCBS AM  
660 AM WFAN

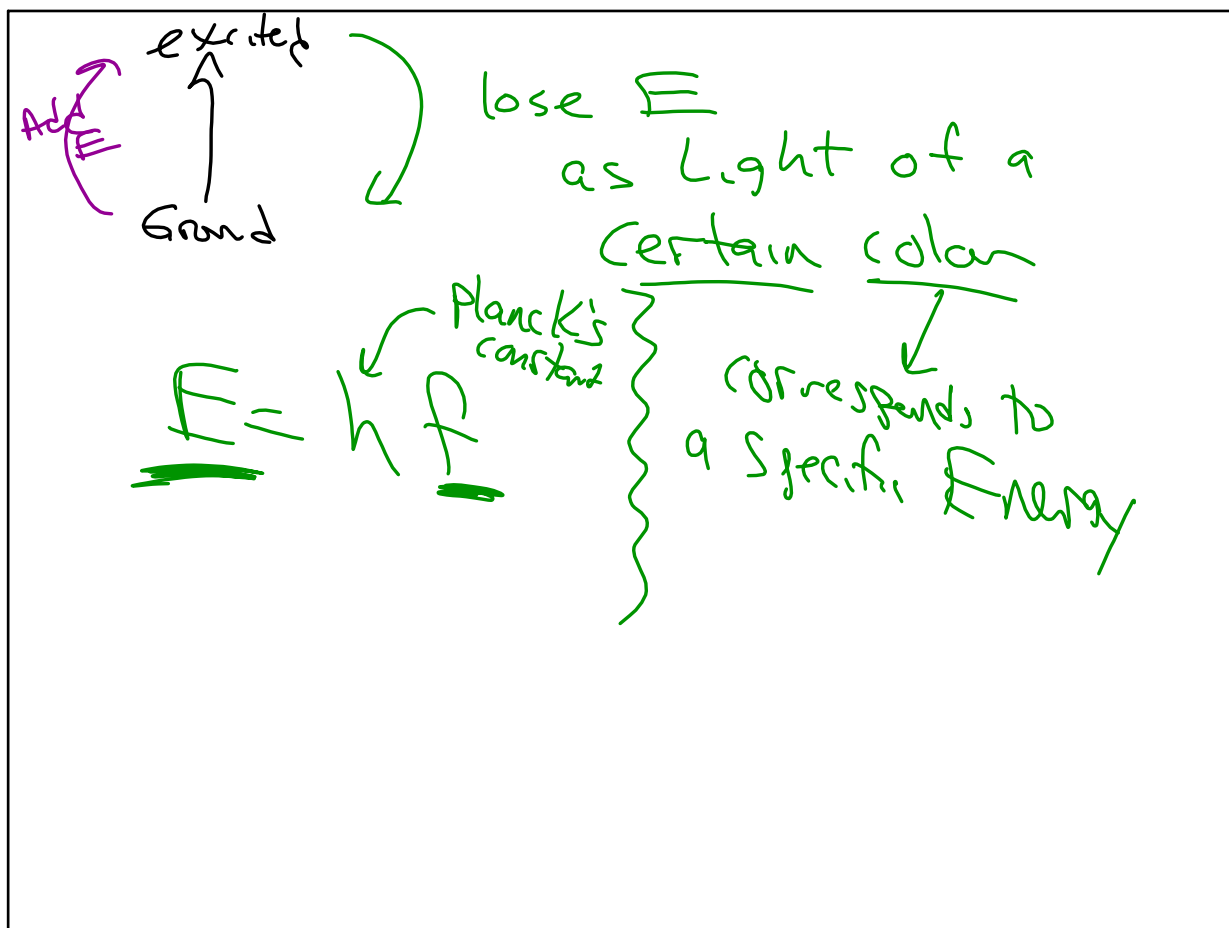
Amplitude Modulation.

Oct 17-9:23 AM

WRKI 95.1

WCBS 101.1

Oct 17-9:26 AM



Oct 17-9:28 AM

$$6 / 15 + 17$$

Oct 17-9:31 AM