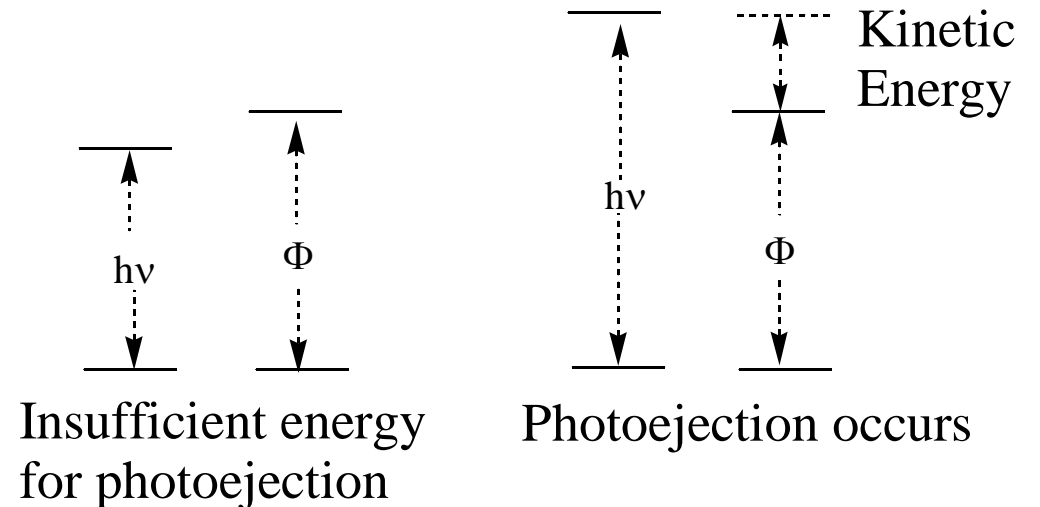
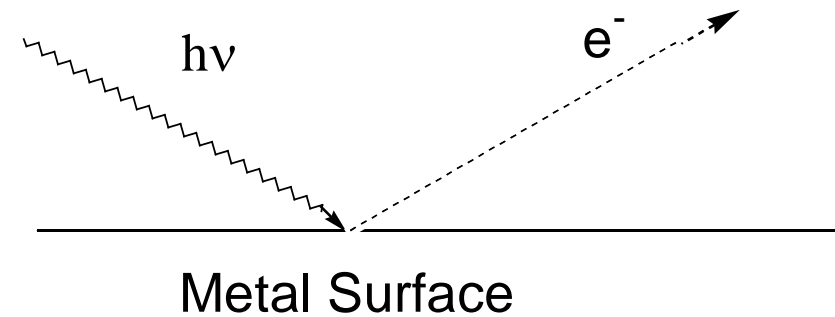


# Photoelectric Effect

- Electrons are ejected from a metal surface by absorption of a photon.
- Depends on frequency, not on intensity.
- Threshold frequency corresponds to  $h\nu_0 = \Phi$
- $\Phi$  is the work function. It is essentially equal to the ionization potential of the metal.



$$h\nu = \frac{1}{2}mv^2 + \Phi$$