

Chapter 6 **Photoelectric Effect**

Prannaya Gupta

23rd August 2022

Unless otherwise stated:

Stefan-Boltzmann Constant, $\sigma = 5.670 \times 10^{-8} \text{ W m}^{-2} \text{ K}^{-4}$

Wien's Displacement Constant, $b = 2.898 \times 10^{-3} \text{ m K}$

Boltzmann Constant, $k_{\text{B}} = 1.381 \times 10^{-23} \text{ m}^2 \text{ kg s}^{-2} \text{ K}^{-1}$

Planck's Constant, $h = 6.626 \times 10^{-34} \text{ J s}$

Speed of Light, $c = 3.00 \times 10^8 \text{ m/s}$

1 Discussion Questions

1. Consider a black body of surface area 20.0 cm^2 and a temperature of 5000 K .

2 Practice Questions

1.