Session #6: Homework Problems

Problem #1

For a proton which has been subjected to an accelerating potential (V) of 15 Volts, determine its deBroglie wavelength.

Problem #2

Electrons are accelerated by a potential of 10 Volts.

- (a) Determine their velocity.
- (b) Determine their deBroglie wavelength (λ_p) .
- (c) Will these electrons, on interaction with hydrogen atoms, be able to excite the ground state electrons in hydrogen?

3.091SC Introduction to Solid State Chemistry Fall 2009

For information about citing these materials or our Terms of Use, visit: http://ocw.mit.edu/terms.