

Physics 325
Quiz 1, January 15 2009

You may use the periodic table in figuring out the following.

1. The nucleus ^{40}K has
how many protons?

how many neutrons?

2. What is the mass number A of the isotope ^6Li ?

What is the atomic number Z of ^6Li ?

3. The Pauli exclusion principle (no two particles of the same type can have identical wave functions)
applies to (choose one):

fermions

bosons

both fermions and bosons

only electrons in atoms