

1. Write the electron configuration for Ni and Sn, without using the noble gas abbreviation.

Ni

Sn

2a. Explain why the electrons in main level 4 generally have more energy than those in the main energy 3 level.

b. Look at the order of electrons filling sublevels chart on your reference handout. Record the order of the first eight sublevels that will fill with electrons

3. Write the electron configurations for the following elements, **using the noble gas abbreviation**.

Ni

Al

Sn

U

Bi

Pb

Br

Rn

Xe

Sr

4. a. Write one way in which the Modern Quantum Mechanical Model (MQMM) is similar to the Bohr model.

b. How is the MQMM different from the Bohr model?

5. Write the electron configurations for the following elements. **OK to use the noble gas abbreviation**.

V

As

I

Mg

Pu

B

N

Pt

Ba

Hg

Po

Am