

Ionic Bonding Quiz

1. An ionic bond is a
 - a. Transfer of electrons
 - b. Pooling of electrons
 - c. Sharing of electrons
 - d. Just losing electrons
2. What holds ionic bonds together is
 - a. Their love
 - b. The periodic table
 - c. Ions with opposite charges
 - d. protons and neutrons
3. An element of calcium(Ca^{2+}) could form an ionic bond with
 - a. Te^{2-}
 - b. K^{1-}
 - c. Mg^{2+}
 - d. Be^{2+}
4. Noble or Inert gases only form ionic bonds with other noble or inert gases.
 - a. True
 - b. False
5. Elements in the periodic table are grouped by
 - a. What state of matter they are
 - b. Their valence electrons
 - c. Their good looks
 - d. Their mass number
6. What are valence electrons
 - a. Fancy electrons
 - b. Electrons on the second level
 - c. Electrons on the first level
 - d. Electrons on the outermost energy level
7. What groups form ionic bonds on the periodic table
 - a. Groups 1 & 7, Groups 2 & 6
 - b. Groups 1 & 18, Groups 4 & 4
 - c. Groups 1 & 17, Groups 2 & 16
 - d. Groups 3 & 5, Groups 4 & 4
8. What do the dots on the Lewis dot diagram represent?
 - a. The number of protons
 - b. The valence electrons
 - c. The atomic number
 - d. The total number of electrons
9. What makes a positive ion?
 - a. Gaining electrons
 - b. Gaining protons
 - c. Losing electrons
 - d. Losing protons
10. How many electrons does an atom need to complete a full ring?
 - a. 2 on the first ring, 8 on the second ring
 - b. 10 total
 - c. 8 on all of the rings
 - d. It just needs one

Matching elements with their ionic charges

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|--------|-------|--------|-------|--------|-------|--------|-------|--------|-------|
| 11. Br | a | 12. In | c | 13. Cs | d | 14. Po | b | 15. Be | e |
| | a. 1- | | b. 2- | | c. 3+ | | d. 1+ | | e. 2+ |

Creating Ionic Bonds (match the element with its likely ionic partner)

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|-------|-------|--------|------|--------|------|--------|-------|--------|-------|
| 16. K | b | 17. At | a | 18. Tl | e | 19. Bi | c | 20. Te | d |
| | a. Rb | | b. I | | c. B | | d. Ba | | e. As |

