

Comparison of Bond Types

Name _____

Period _____

For each bond type, write out the answers for the following characteristics. Complete the following table on a separate piece of paper.

Comparison FORMATION	Covalent Bonds *****	Ionic Bonds *****	Metallic Bonds *****
1. Types of atoms	a)	b)	c)
2. Valence electron distribution in the bond	a)	b)	c)
3. Electronegativity Difference	a)	b)	c)
4. Atom Examples	a)	b)	c)
5. Draw model/illustration			
CHARACTERISTICS	*****	*****	*****
6. Bond Strength	a)	b)	c)
7. Structure	a)	b)	c)
PROPERTIES OF COMPOUNDS	//////////	//////////	//////////
8. Type of Compound	a)	b)	c)
9. Melting point	a)	b)	c)
10. Boiling point	a)	b)	c)
11. Malleability	a)	b)	c)
12. Ductility	a)	b)	c)
13. Conductivity	a)	b)	c)

Chemical Names and Formulas

For each of the following problems: a) identify the compound as ionic or covalent. b) write out the correct name and chemical formula.

- 14. MgCl_2
- 15. V^{3+} and PO_4^{3-}
- 16. NCl_5
- 17. tricarbon hexafluoride
- 18. SnSO_4

- 17. silver nitrate
- 18. ammonium sulfide
- 19. diphosphorus tetraoxide
- 20. Pb^{4+} and As^{3-}
- 21. heptasulfur octabromide