1	
	Which of the following household items is basic?
<b>\</b>	A. baking soda B. grapes
H	C. bananas
	D. water
2	How many protons does an atom of silver contain?
	A. 47 B. 108
A = A	C. 61
	D. 60
3	Which of the following compounds are organic?
	I Na <sub>2</sub> CO <sub>3</sub>
	II CH <sub>3</sub> CH <sub>2</sub> CH <sub>3</sub>
	III CH <sub>3</sub> OH
R	III CH3OH
	A. I and II only
	B. II and III only
	C. I, II, and III D. None of these compounds is organic.
4	An atom is found to have seven valence electrons. To which family of elements in the
	periodic table does this atom belong?
	A. noble gases
15	B. halogens C. alkaline earth metals
	D. alkali metals
5	What is the nucleus of any atom, except hydrogen, made up of?
1	A. only neutrons
D	B. only protons
1	C. equal numbers of electrons and protons  D. neutrons and protons
6	What is the name of the compound Fe <sub>2</sub> O <sub>3</sub> ?
	A. iron(III) oxide B. iron oxide
1	C. iron(II) oxide
	D. iron(II) trioxide
7	. Which of the following is a property of a base?
	A. It has a sour taste.
0	B. It turns litmus paper red.
	C. It tastes bitter.
	D. It has a pH less than 7.

8	What is the name of the compound PbS <sub>2</sub> ?
D	A. lead sulphide B. lead disulphide C. lead(II) sulphide D. lead(IV) sulphide
9 B	Which compound has no covalent bonds?  A. Na <sub>2</sub> SO <sub>4</sub> B. KCl  C. KClO <sub>3</sub> D. CH <sub>3</sub> Cl
10	What is the correct formula for the compound that contains magnesium and phosphate ions?  A. MgPO <sub>4</sub> B. Mg,PO <sub>4</sub> C. Mg,(PO <sub>4</sub> ), D. Mg,(PO <sub>4</sub> ) <sub>2</sub>
11 A	Which name and formula match correctly?  A. magnesium fluoride, MgF <sub>2</sub> B. sodium sulphide, NaS  C. aluminum iodide, Al(IO <sub>3</sub> ) <sub>3</sub> D.iron(II) oxide, FeO <sub>2</sub>
12	Which is the formula for aluminum carbonate?  A. AlC <sub>3</sub> B. AlCO <sub>3</sub> C. Al <sub>2</sub> C <sub>3</sub> D. Al <sub>2</sub> (CO <sub>3</sub> ) <sub>3</sub>
13	Which of the following sets of coefficients will balance the following skeleton equation?  AlCl <sub>3</sub> + K → KCl + Al  A. 1, 2, 1, 2  B. 2, 6, 6, 1  C. 1, 3, 3, 1  D. 1, 2, 3, 1
14	What is the charge on the plutonium atom (Pu) in the compound Pu <sub>2</sub> O <sub>5</sub> ?  A. 3+  B. 4+  C. 5+  D. 6+

15	What are the coefficients, from left to right, that correctly balance the following equation?
	$\underline{\qquad}$ Sn(NO <sub>2</sub> ) <sub>4</sub> + $\underline{\qquad}$ K <sub>3</sub> PO <sub>4</sub> $\rightarrow$ $\underline{\qquad}$ KNO <sub>2</sub> + $\underline{\qquad}$ Sn <sub>3</sub> (PO <sub>4</sub> ) <sub>4</sub>
A	A. 3, 4, 12, 1 B. 3, 3, 6, 1 C. 6, 3, 4, 2 D. 6, 4, 2, 12
16 B	What is the name of PbO <sub>2</sub> ? A. lead(II) dioxide B. lead(IV) oxide C. lead dioxide D. phosphorus boron oxide
17	What is the correct formula for aluminum hydroxide? A. Al <sub>3</sub> OH B. AlOH <sub>3</sub> C. Al(OH) <sub>3</sub> D. Al(OH <sub>3</sub> )
<b>18</b>	. What are substances with a pH above 7 considered to be? A. basic B. acidic C. salty D. neutral
19 A	Which is not a characteristic of acids?  A. bitter taste  B. turn litmus red  C. react with bases to form salts  D. react with active metals to form $H_2$ gas
20	What are the coefficients, from left to right, that correctly balance the following equation?
C	

3.7	
Name:	

21	Write the formula or name of the following compounds.
	(a) iron(III) chlorideFeC(3
	(b) ammonium phosphate (NH4)3 PO4
	(c) dinitrogen trisulphide N2S3
	(d) P,O10 tetraphosphorous deca oxide
	(e) Na, SO, Sodium sulfate

3) Type Combustion 
$$C_4H_8 + 60_2 \rightarrow 4 CO_2 + 4 H_2 O$$

5) Type Decomp 
$$4 \text{ PCl}_3 \rightarrow 4 + 6 \text{ Cl}_2$$