

Chemical Quantities Answer Key

Review

1. Name the following compounds.
 - a. **magnesium bromide**
 - b. **dinitrogen monoxide**
 - c. **aluminum oxide**
 - d. **calcium hydroxide**
 - e. **sodium acetate**
 - f. **carbon tetrachloride**
 - g. **ammonium hydroxide**
 - h. **lead (II) sulfate**
2. Write the correct chemical formulas for these chemical substances.
 - a. **CaCrO₄**
 - b. **FeCl₃**
 - c. **Li₂O**
 - d. **N₂O₅**
 - e. **MgNO₃**
 - f. **Al₂O₃**
 - g. **H₂CO₃**

Mole Conversions

3. **1.20 mol Ag**
4. What is the molar mass of each of the following compounds?
 - a. **141.94 g/mol**
 - b. **149.10 g/mol**
 - c. **338.80 g/mol**
5. **187 g N₂O₅**
6. **0.0452 mol NaCl**

7. **5.434 mol NH₄NO₃**
8. **1.31 x 10²⁴ molecules CH₄**
9. **1.39 x 10²⁵ atoms**

Percent Composition

10. **10.1% C, 0.79% H, 89.10% Cl**
11. **31.28% Sn, 68.72% Cl**
12. What is the percent composition of each of the following?
 - a. **68.42% Cr, 31.58% O**
 - b. **24.42% Ca, 17.07% N, 58.50% O**
13. **447 g Fe**