- 1. What is the percent composition of ammonium carbonate?
- 2. Determine the percent of iron in ferrous sulfide and ferric sulfide.
- 3. Calculate the mass of chromium in a 5.00 g sample of chromic nitrate.
- 4. If a compound only contains lead and oxygen (as oxide ion only) and contains 13.4% oxygen, what is the formula of the compound?
- 5. A compound contains 29.4% calcium. Is the compound calcium cyanide, calcium sulfate, or calcium iodide?
- 6. What percentage of water is in cobaltous chloride hexahydrate?
- 7. Determine the mass in grams of water that would evaporate from 15.0 g of magnesium sulfate heptahydrate.

## <u>Answers</u>

- 1. 29.2% N, 8.41 % H, 12.5% C, 49.9% O
- 2. 63.5% Fe and 53.7% Fe, respectively
- 3. 1.09 g Cr
- 4. PbO<sub>2</sub>
- 5. CaSO<sub>4</sub>
- 6. 45.4% H<sub>2</sub>O
- 7.  $7.68 \text{ g H}_2\text{O}$