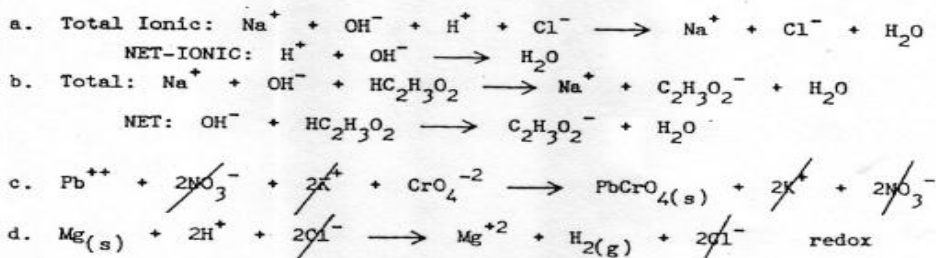


Rules for Writing Net-IONIC Equations

1. STRONG ELECTROLYTES ARE WRITTEN IN THEIR IONIC FORM ($M^{++} + 2X^{-}$)
 - a. soluble salts
 - b. strong acids: HCl, HNO₃, H₂SO₄, HClO₄, HBr, HI
 - c. strong, soluble bases: NaOH, Ba(OH)₂, KOH
2. WEAK ELECTROLYTES ARE WRITTEN IN THEIR MOLECULAR FORM (MZ_2)
 - a. weak acids: e.g. HC₂H₃O₂, H₂CO₃, HCN, H₃PO₄
 - b. weak bases: NH₄OH
3. ADDITIONAL SUBSTANCES WRITTEN IN THEIR MOLECULAR FORM
 - a. insoluble substances: e.g. AgCl(s) * NOTE (s) after formula
 - b. non-electrolytes: e.g. H₂O
 - c. gases: e.g. CO₂
 - d. complex ions: e.g. Ag(NH₃)₂⁺
4. Equations must be balanced, both in atoms and in electrical charge.
5. The Net-Ionic equation should include only those substances that have undergone a chemical change. Do not include spectator ions.

EXAMPLES:



PRACTICE:

- a. addition of hydrochloric acid to a soln. of sodium acetate
- b. addition of ammonium hydroxide to acetic acid
- c. addition of hydrochloric acid to a solution of AgNO₃
- d. sulfuric acid is added to a solution of barium chloride - (BaSO₄ is insoluble.)

ANSWERS: NET-IONIC

