INTRODUCTION TO REDOX CHEMISTRY

Complete the sentences below.

1) Oxidation occurs when a substance _____ electrons and _____ in oxidation state.

2) Reduction occurs when a substance _____electrons and _____in oxidation state.

Determine and then write the oxidation state of the underlined element in the space provided. You must include the "+" or "-" sign in front of the oxidation number.

Example:

$\underline{\mathbf{Cr}}_2O_7^{2-}$ Oxidation State: +6

3) $\underline{\mathbf{S}}O_2$ Oxidation State: _____

4) $H\underline{\mathbf{N}}O_3$ Oxidation State: _____

5) $\underline{\mathbf{Cr}}O_4^{2-}$ Oxidation State: _____

6) $Na\underline{\mathbf{Cl}}O_3$ Oxidation State: _____

7) $\underline{\mathbf{Mn}}O_2$ Oxidation State: _____

8) $\underline{\mathbf{V}}O_4^{3-}$ Oxidation State: _____

9) $\underline{\mathbf{Mn}}O_4^{2-}$ Oxidation State: _____

10) $\underline{\mathbf{Cr}}_2O_3$ Oxidation State: _____