Appendix 1
HAZARD CLASSIFICATIONS

HEALTH HAZARDS

Criteria for determining whether a chemical is classified as a health hazard are detailed in Appendix A to 29 CFR 1910.1200. Always read the SDS for any chemical you use to familiarize yourself with its hazards and proper handling.

Acute Toxicity refers to those adverse effects occurring following oral or dermal administration of a single dose or multiple doses given within 24 hours, or an inhalation exposure of 4 hours.

Skin Corrosion / Irritation
1. Corrosion is irreversible damage to the skin.
2. Irritation is reversible damage to the skin.

Serious Eye Damage / Irritation
1. Eye damage refers to tissue damage of the eye or serious decay of vision.
2. Eye irritation refers to changes to the eye that are reversible within 21 days of the exposure.

Respiratory or Skin Sensitization
1. Respiratory sensitization refers to a chemical that will lead to hypersensitivity of the airways following inhalation.
2. Skin sensitization refers to a chemical that will lead to an allergic response following skin contact.

Germ Cell Mutagenicity is defined as a permanent change in the amount or structure of the genetic material in a cell.

Carcinogenicity: a substance or mixture which will induce cancer or increase its incidence. There are three categories for carcinogens:
1A: substances which are known to have carcinogenic potential for humans
1B: substances which are presumed to have carcinogenic potential for humans
1C: substances which are suspected human carcinogens
A list of chemicals that are classified as carcinogens by the National Toxicity Program is given in Appendix 10, as are the thirteen chemicals listed by OSHA as carcinogens.

Reproductive Toxicity:
Reproductive toxicity includes adverse effects on sexual function in adult males and females, as well as adverse effects on development of the offspring. There are two categories for reproductive toxicants:
1. Known or presumed human reproductive toxicant
2. Suspected human reproductive toxicant

Specific Target Organ Toxicity, Single Exposure refers to a specific, non-lethal target organ toxicity arising from a single exposure to a chemical.

Specific Target Organ Toxicity, Repeated or Prolonged Exposure refers to specific target organ toxicity arising from repeated exposure to a substance or mixture.

Aspiration Hazard refers to the entry of a liquid or solid into the trachea and lower respiratory system. Simple asphyxiant
A simple asphyxiant (as defined in 29 CFR 1910.1200(c)) is a substance or mixture that displaces oxygen in the ambient atmosphere, and can thus cause oxygen deprivation in those who are exposed, leading to unconsciousness and death.

**PHYSICAL HAZARDS**

Criteria for determining whether a chemical is classified as a physical hazard are detailed in Appendix B to 29 CFR 1910.1200.

**Explosive** is a solid or liquid chemical which is in itself capable by chemical reaction of producing gas at such a temperature and pressure and at such a speed as to cause damage to the surroundings.

**Flammable Gas** refers to a gas having a flammable range with air at 20°C (68°F) and a standard pressure of 101.3 kPa (14.7 psi).

**Flammable Aerosols** refers to any non-refillable receptacle containing a gas compressed, liquefied or dissolved under pressure and fitted with a release device allowing the contents to be sprayed as a gas, foam, paste, powder or liquid.

**Oxidizing Gases** refers to any gas which may, usually by providing oxygen, cause or contribute to the combustion of other material above and beyond what air does.

**Pressurized Gases** refers to gases which are contained in a receptacle at a pressure of 200 kPa (29 psi) or more, or which are liquefied or liquefied and refrigerated.

**Flammable Liquids** refers to liquids having a flash point of not more than 93°C (199.4°F). Flash point refers to the minimum temperature at which a liquid gives off vapor in sufficient concentration to form an ignitable mixture with air.

**Flammable Solids** refers to a solid which is readily combustible or which may cause or contribute to fire through friction.

**Self- Reactive Chemicals** refers to thermally unstable liquid or solid chemicals liable to undergo a strongly exothermic decomposition even without oxygen.

**Pyrophoric Liquids** refers to a liquid which is liable to ignite within five minutes after coming into contact with air.

**Pyrophoric Solids** refers to a solid which is liable to ignite within five minutes after coming into contact with air.

**Self- Heating Chemicals** refers to a large amount of solid or liquid chemical (excluding pyrophoric liquids or solids) which, by reaction with air and without an energy supply, is able to self-heat with hours or days.

**Chemicals Emitting Flammable Gases when in Contact with Water**

**Oxidizing Liquids** refers to a liquid which, generally by yielding oxygen, causes or contributes to the combustion of other materials.

**Oxidizing Solids** refers to a solid which, generally by yielding oxygen, causes or contributes to the combustion of other materials.

**Organic Peroxides** refers to a liquid or solid that is derivative of hydrogen peroxide.

- Organic peroxides are thermally unstable chemicals and may undergo exothermic self-accelerating decomposition.
- They are liable to explosive decomposition, burn rapidly, be sensitive to impact or friction and react dangerously with other substances.

**Corrosive to Metals** refers to a chemical that can materially damage, or even destroy, metals.