

化 学 品 安 全 技 术 说 明 书

填表时间 2020-01-06

打印时间 2025-04-20

MSDS标题

HYDROXYLAMINE HYDROCHLORIDE MSDS报告

产品标题

羟基氯化胺;氯化羟胺;氢氯羟胺

CAS号

5470-11-1

化学品及企业标识

PRODUCT NAME

HYDROXYLAMINE HYDROCHLORIDE

NFPA

Flammability	0
Toxicity	2
Body Contact	3
Reactivity	2
Chronic	2
SCALE: Min/Nil=0 Low=1 Moderate=2 High=3 Extreme=4	

PRODUCT USE

Used in organic synthesis, photographic developer, medicine, controlled reduction reactions, non- discolouring short- stopper for synthetic rubbers, antioxidant for fatty acids and soaps.

SYNONYMS

N-H4-Cl-O, N-H4-Cl-O, NH2OH.HCl, "hydroxylamine hydrochloride", "hydroxyammonium chloride", "hydroxylamine chloride", "hydroxylamine chloride (1:1)", "oxammonium hydrochloride"

CANADIAN WHMIS SYMBOLS

EMERGENCY OVERVIEW

RISK

Heating may cause an explosion.

Harmful if swallowed.

May cause SENSITIZATION by skin contact.

Harmful: danger of serious damage to health by prolonged exposure if swallowed.

Irritating to eyes and skin.

Very toxic to aquatic organisms.

POTENTIAL HEALTH EFFECTS

ACUTE HEALTH EFFECTS

SWALLOWED

Accidental ingestion of the material may be harmful; animal experiments indicate that ingestion of less than 150 gram may be fatal or may produce serious damage to the health of the individual. The material can produce chemical burns within the oral cavity and gastrointestinal tract following ingestion. Limited evidence exists that the substance may cause irreversible but non-lethal mutagenic effects following a single exposure. The substance and/or its metabolites may bind to hemoglobin inhibiting normal uptake of oxygen. This condition, known as "methemoglobinemia", is a form of oxygen starvation (anoxia). Symptoms include cyanosis (a bluish discoloration skin and mucous membranes) and breathing difficulties. Symptoms may not be evident until several hours after exposure. At about 15% concentration of blood methemoglobin there is observable cyanosis of the lips, nose and earlobes. Symptoms may be absent although euphoria, flushed face and headache are commonly experienced. At 25-40%, cyanosis is marked but little disability occurs other than that produced on physical exertion. At 40-60%, symptoms include weakness, dizziness, lightheadedness, increasingly severe headache, ataxia, rapid shallow respiration, drowsiness, nausea, vomiting, confusion, lethargy and stupor. Above 60% symptoms include dyspnea, respiratory depression, tachycardia or bradycardia, and convulsions. Levels exceeding 70% may be fatal. Hydroxylamine relaxes the smooth muscle of blood vessels, causing low blood pressure, increased heart rate, circulatory insufficiency and cardiovascular collapse. Large doses produce destruction of blood cells. Bleeding times may be prolonged as platelet clumping is inhibited and there can be purple skin blotches.

EYE

This material can cause eye irritation and damage in some persons. The material can produce chemical burns to the eye following direct contact. Vapors or mists may be extremely irritating.

SKIN

This material can cause inflammation of the skin on contact in some persons. The material can produce chemical burns following direct contact with the skin. Skin contact with the material may damage the health of the individual; systemic effects may result following absorption. Open cuts, abraded or irritated skin should not be exposed to this material. Entry into the blood-stream, through, for example, cuts, abrasions or lesions, may produce systemic injury with harmful effects. Examine the skin prior to the use of the material and ensure that any external damage is suitably protected.

INHALED

Inhalation may produce health damage*. Inhalation of dusts, generated by the material during the course of normal handling, may be damaging to the health of the individual. Persons with impaired respiratory function, airway diseases and conditions such as emphysema or chronic bronchitis, may incur further disability if excessive concentrations of particulate are inhaled.

CHRONIC HEALTH EFFECTS

Harmful: danger of serious damage to health by prolonged exposure if swallowed. Harmful: danger of serious damage to health by prolonged exposure if swallowed. This material can cause serious damage if one is exposed to it for long periods. It can be assumed that it contains a substance which can produce severe defects. This has been demonstrated via both short- and long-term experimentation. Limited evidence suggests that repeated or long-term occupational exposure may produce cumulative health effects involving organs or biochemical systems. There is some evidence that inhaling this product is more likely to cause a sensitization reaction in some persons compared to the general population. Exposure to the material may result in a possible risk of irreversible effects. The material may produce mutagenic effects in man. This concern is raised, generally, on the basis of appropriate studies with similar materials using mammalian somatic cells in vivo. Such findings are often supported by positive results from in vitro mutagenicity studies. Long term exposure to high dust concentrations may cause changes in lung function i.e. pneumoconiosis; caused by particles less than 0.5 micron penetrating and remaining in the lung. Prime symptom is breathlessness; lung shadows show on X-ray.