

GHS Classification

ID1296

Copper oxychloride

CAS 1332-40-7

Date Classified: Feb. 20, 2007 (Environmental Hazards: Mar. 31, 2006)

Physical Hazards

Reference Manual: GHS Classification Manual (Feb. 10, 2006)

Hazard class	Classification	symbol	signal word	hazard statement	Rational for the classification
1 Explosives	Not applicable	-	-	-	There are no chemical groups associated with explosive properties present in the molecules.
2 Flammable gases	Not applicable	-	-	-	Solid (GHS definition)
3 Flammable aerosols	Not applicable	-	-	-	Not aerosol products
4 Oxidizing gases	Not applicable	-	-	-	Solid (GHS definition)
5 Gases under pressure	Not applicable	-	-	-	Solid (GHS definition)
6 Flammable liquids	Not applicable	-	-	-	Solid (GHS definition)
7 Flammable solids	Not classified	-	-	-	Non-combustible (BGIA, GESTIS-database on hazardous substances, Accessed in June 2006)
8 Self-reactive substances and mixtures	Not applicable	-	-	-	There are no chemical groups associated with explosive or self-reactive properties present in the molecule.
9 Pyrophoric liquids	Not applicable	-	-	-	Solid (GHS definition)
10 Pyrophoric solids	Not classified	-	-	-	Non-combustible (BGIA, GESTIS-database on hazardous substances, Accessed in June 2006)
11 Self-heating substances and mixtures	Not classified	-	-	-	Non-combustible (BGIA, GESTIS-database on hazardous substances, accessed in June 2006)
12 Substances and mixtures, which in contact with water, emit flammable gases	Not classified	-	-	-	Stable to water (the water solubility is obtained)
13 Oxidizing liquids	Not applicable	-	-	-	Solid (GHS definition)
14 Oxidizing solids	Classification not possible	-	-	-	No data available
15 Organic peroxides	Not applicable	-	-	-	Inorganic compound
16 Corrosive to metals	Classification not possible	-	-	-	Test methods applicable to solid substances are not available. Corrosive to metals (HSDB, 2003)

Health Hazards

Hazard class	Classification	symbol	signal word	hazard statement	Rational for the classification
1 Acute toxicity (oral)	Category 4	Exclamation mark	Warning	Harmful if swallowed	Based on the rat LD50 = 833mg/kg and 1220mg/kg in the oral administration tests (Agricultural Chemical Registration Data, 1979), the substance was classified as Category 4.
1 Acute toxicity (dermal)	Not classified	-	-	-	The result of rat LD50 values >2000mg/kg, >2500mg/kg and >5000mg/kg of the dermal administration test was obtained (Agricultural Chemical Registration Data, 1979). But death was not observed in 5000mg/kg examination for male and female, it was set as the outside of Category.
1 Acute toxicity (inhalation: gas)	Not applicable	-	-	-	Solid (GHS definition)
1 Acute toxicity (inhalation: vapour)	Classification not possible	-	-	-	No data available
1 Acute toxicity (inhalation: dust, mist)	Classification not possible	-	-	-	No data available
2 Skin corrosion / irritation	Not classified	-	-	-	Since irritant effects, such as erythema or dropsy, were not admitted in the skin irritation test using a female rabbits (the additional data for agricultural-chemicals applications for registration, 2006), it was set to outside of category.
3 Serious eye damage / eye irritation	Category 2B	-	Warning	Causes eye irritation	In the eye irritation tests using a doe rabbit, by the Draize method, more than 1 score of blue haze, conjunctival redness, and conjunctival edema are observed in all samples within 48 hours after application, and it recovered within 9 days (the additional data for Agricultural Chemical Registration, 2006). So it was thought that there was mild eye irritation and it was set as Category 2B.
4 Respiratory/skin sensitization	respiratory sensitization: Classification not possible; Skin sensitization: Not possible	(Respiratory sensitization)-; (Skin sensitization)-	(Respiratory sensitization)-; (Skin sensitization)-	(Respiratory sensitization)-; (Skin sensitization)-	Respiratory sensitization: no data available. Skin sensitization: from the result that skin sensitization is negative (the additional data for agricultural-chemicals applications for registration, 2006) by Maximization test using a female guinea pig, it carried out the outside of Category.
5 Germ cell mutagenicity	Not classified	-	-	-	There is the negativity in the in vivo mutagenicity test using a somatic cell (micronucleus test which uses mouse bone marrow cells) (Agricultural Chemical Registration Data, 2004), and in vitro mutagenicity test (reverse mutation test using bacteria) (Agricultural Chemical Registration Data, 1989). So it is classified as the out of the Category.
6 Carcinogenicity	Classification not possible	-	-	-	No data available
7 Toxic to reproduction	Classification not possible	-	-	-	No data available

8	Specific target organs/systemic toxicity following single exposure	Classification not possible	-	-	-	No data. In addition, there is description in ATSDR (draft, 2004) that a copper dusts stimulates respiratory tracts.
9	Specific target organs/systemic toxicity following repeated exposure	Classification not possible	-	-	-	It was presupposed that it could not be classified due to insufficient data since the toxicity to specific organ was not acknowledged in the subacute toxicity study for 90 days using rats and mice (20, 100, 500 or 3000ppm administrations) (Agricultural Chemical Registration Data, 1989).
10	Aspiration hazard	Classification not possible	-	-	-	No data available

Environmental Hazards

Hazard class	Classification	symbol	signal word	hazard statement	Rational for the classification
11 Hazardous to the aquatic environment (acute)	Category 1	Environment	Warning	Very toxic to aquatic life	It was classified into Category 1 from 48-hour EC50=0.105mg/L of Crustacea (Daphnia magna) (Agricultural Chemical Registration Data, 2004).
11 Hazardous to the aquatic environment (chronic)	Category 1	Environment	Warning	Very toxic to aquatic life with long lasting effects	Classified into Category 1, since acute toxicity was Category 1, and it is a metallic compound, behavior in water and bioaccumulative potential are unknown.