

GHS Classification

ID735

Methyl acetate

CAS 79-20-9

Date Classified: Mar. 23, 2006 (Environmental Hazards: Feb. 10, 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	-	-	-	Liquid (GHS definition)
3 Flammable aerosols	Not applicable	-	-	-	Not aerosol products
4 Oxidizing gases	Not applicable	-	-	-	Liquid (GHS definition)
5 Gases under pressure	Not applicable	-	-	-	Liquid (GHS definition)
6 Flammable liquids	Category 2	Flame	Danger	Highly flammable liquid and vapour	Flash point: -10degC(<23degC), Boiling point: 56.9degC(>35degC)
7 Flammable solids	Not applicable	-	-	-	Liquid (GHS definition)
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 classified	-	-	-	Flash point: 455degC (ICSC, 1997)
10 Pyrophoric solids	Not applicable	-	-	-	Liquid (GHS definition)
11 Self-heating substances and mixtures	Classification not possible	-	-	-	Test methods applicable to liquid substances are not available
12 Substances and mixtures, which in contact with water, emit flammable gases	Not applicable	-	-	-	The chemical structure of the substance does not contain metals or metalloids(B, Si, P, Ge, As, Se, Sn, Sb, Te, Bi, Po, At).
13 Oxidizing liquids	Not applicable	-	-	-	Organic compounds containing oxygen (but not chlorine and fluorine) chemically bonded only to carbon (but not to other elements).
14 Oxidizing solids	Not applicable	-	-	-	Liquid (GHS definition)
15 Organic peroxides	Not applicable	-	-	-	Organic compounds containing no -O-O- structure
16 Corrosive to metals	Classification not possible	-	-	-	No data available

Health Hazards

Hazard class	Classification	symbol	signal word	hazard statement	Rational for the classification
1 Acute toxicity (oral)	Not classified	-	-	-	SPECIES: Rat ENDPOINT: LD50 VALUE: > 5000 mg/kg REFERENCE SOURCE: DFGOT vol.18 (2002) SPECIES: Rat ENDPOINT: LD50 VALUE: 6482 mg/kg REFERENCE SOURCE: EU-RAR (2003)
1 Acute toxicity (dermal)	Not classified	-	-	-	Based on rat LD50 >5000mg/kg (DFGOTvol.18 (2002)), it was set as the outside of Category.
1 Acute toxicity (inhalation: gas)	Not applicable	-	-	-	Liquid (GHS definition)
1 Acute toxicity (inhalation: vapour)	Not classified	-	-	-	Based on the descriptions that 6/6 survival with 16000ppm/4h, 6/6 death with 32000ppm (DFGOTvol.18 (2002)) and rat LC50 >16170ppm/4h (EU-RAR (2003)), it was classified as out of Category
1 Acute toxicity (inhalation: dust, mist)	Classification not possible	-	-	-	No data available
2 Skin corrosion / irritation	Not classified	-	-	-	Based on the descriptions that it has no stimulation with application on humans (EU-RAR (2003)),(DFGOTvol.18 (2002)) and that it has no stimulation on rabbits (EU-RAR (2003)), it was classified as out of Category.
3 Serious eye damage / eye irritation	Category 2B	-	Warning	Causes eye irritation	According to studies that there was eye irritation by exposure to vapors to humans (EU-RAR (2003)), severe irritation (a stimulus of a cornea and the iris, redness of a conjunctiva, dropsy, bleeding) was accepted by the test of the rabbit, and the recovery on less than the 7th was also observed (EU-RAR (2003)). And it was segmented into 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: Since there is no data, it cannot be classified. Skin sensitization: It was put outside of the Category because a statement says that sensitization was not identified in a maximization test conducted by volunteers(EU-RAR (DFGOTvol.18 (2002)) (2003)).
5 Germ cell mutagenicity	Not classified	-	-	-	There was a statement that it gave negative result in the rat micronucleus test (erythrocyte) (EU-RAR (2003)), and we classified it as Out Of Category according to the technical guideline.

6	Carcinogenicity	Classification not possible	-	-	-	Classification not possible due to lack of data and reports
7	Toxic to reproduction	Classification not possible	-	-	-	Classification not possible due to lack of data
8	Specific target organs/systemic toxicity following single exposure	Category 1 (nervous system); Category 3 (respiratory tract irritation)	Health hazard	Danger	cause damage to organs (nervous system); May cause respiratory irritation or may cause drowsiness and dizziness (respiratory tract irritation)	It is classified into Category 3 (respiratory irritation) by the statement of the stimulativeness of a respiratory tract and the pharynx in humans (PATTY (5th, 2002), DFGOTvol.18 (2002), ACGIH (2001), EU-RAR(2003)). There are dizziness, vertigo, headache, an unstable walk, vision disappearance of both eyes, withering of an optic nerve, scotoma expansion of a left eye, the tunnel vision of a right eye, and the anesthesia action (EU-RAR (2003)) to occupational exposure in humans , it is classified into Category 1 (nervous systems).
9	Specific target organs/systemic toxicity following repeated exposure	Classification not possible	-	-	-	Since data is insufficient, it cannot be classified. (The adverse effects in the animal studies was seen by exposure concentration higher than a guidance value.)
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)	Not classified	-	-	-	It carried out the outside of Category from 72-hour EC50>120mg/L of algae (Green algae) (EU-RAR, 2003).
11 Hazardous to the aquatic environment (chronic)	Not classified	-	-	-	Since not water-insoluble (aqueous solubility =2.43*105mg/L (PHYSROP Database, 2005)) and acute toxicity is low.