

SAFETY DATA SHEET

This safety data sheet was created pursuant to the requirements of: Regulation (EC) No. 1907/2006 as amended by Regulation (EU) No. 2020/878, and Regulation (EC) No. 1272/2008

SDS #: A-10732 234 Toner Black, Cyan, Magenta, vellow

Issuing Date 11-Oct-2025 Revision date 16-Oct-2025

Revision Number 1

European Version Only

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Product Name 234 Toner for Lexmark C792, Lexmark CS796, Lexmark X792, Lexmark XS795,

Lexmark XS796, Lexmark XS798

Part no. 24B5831, 24B5835, 24B6022, 3067343, 47B1089, 47B1234, C792A1KG, C792A4KG,

C792X1KG, C792X2KG, C792X4KG, X792X1KG, X792X2KG, X792X4KG, 24B5828, 24B5832, 24B6018, 3067344, 47B1231, 47B1235, C792A1CG, C792A4CG, C792X1CG, C792X2CG, C792X4CG, X792X1CG, X792X2CG, X792X4CG, 24B5829, 24B5833, 24B6019, 3067346, 47B1232, 47B1236, C792A1MG, C792A4MG, C792X1MG, C792X2MG, C792X4MG, X792X1MG, X792X2MG, X792X4MG, 24B5830, 24B5834, 24B6021, 3067347, 47B1233, 47B1237, C792A1YG, C792A4YG, C792X1YG, C792X2YG,

C792X4YG, X792X1YG, X792X2YG, X792X4YG

Other means of identification

Pure substance/mixture Mixture

Colour Black, Cyan, Magenta, yellow

1.2. Relevant identified uses of the substance or mixture and uses advised against

Recommended use Printing

Uses advised against No information available

1.3. Details of the supplier of the safety data sheet

Importer

Lexmark International Technology Sarl ICC Building, Bloc A

20 route de Pré-Bois, 1215 Geneva 15, Switzerland

For further information, please contact

Contact Point Manager, Environment, Health, Safety & Sustainability

E-mail address adam.toth@lexmark.com

Non-Emergency Telephone Number +41 227107050

For the most current document https://www.lexmark.com/en_us/supplies-and-parts/printer-supplies-finder/material-safety-d

ata-sheets.html

1.4. Emergency telephone number

Emergency Telephone +44 1273 289451

Emergency Telephone - §45 - (EC)1	272/2008
Europe	112

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No. 1272/2008 [CLP]

This mixture is classified as not hazardous according to regulation (EC) 1272/2008 [CLP]

2.2. Label elements

This mixture is classified as not hazardous according to regulation (EC) 1272/2008 [CLP]

Hazard statements

This mixture is classified as not hazardous according to regulation (EC) 1272/2008 [CLP]. EUH210 - Safety data sheet available on request.

2.3. Other hazards

Other hazards May form explosible dust-air mixture if dispersed.

PBT & vPvB The components in this formulation do not meet the criteria for classification as PBT or

vPvB.

Endocrine Disruptor Information This product does not contain any known or suspected endocrine disruptors.

SECTION 3: Composition/information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Chemical name	Weight-%	CAS No.	EC No (EU Index No)	Classification according to Regulation (EC) No. 1272/2008 [CLP]	REACH registration number
Styrene-acrylate polymer	75-85	Proprietary			
Carbon black	0-10	1333-86-4	215-609-9		
Yellow Pigment	0-10	Proprietary	Listed		
Magenta pigment	0-10	Proprietary	Listed		
Cyan Pigment	0-10	147-14-8	205-685-1		
Titanium dioxide	<1	13463-67-7	236-675-5		

Components marked as "Not Listed" are exempt from registration.

Where no REACH registration number is listed, it is considered confidential to the Only Representative.

Acute Toxicity Estimate

If LD50/LC50 data is not available or does not correspond to the classification category, then the appropriate conversion value from CLP Annex I, Table 3.1.2, is used to calculate the acute toxicity estimate (ATEmix) for classifying a mixture based on its components

Chemical name	Oral LD50 mg/kg	Dermal LD50	Inhalation LC50 - 4	Inhalation LC50 - 4	Inhalation LC50 - 4
		mg/kg	hour - dust/mist - mg/L	hour - vapour - mg/L	hour - gas - ppm
Carbon black	10000	2000	0.0046	No data available	No data available
Magenta pigment	23000	3000	No data available	No data available	No data available
Cyan Pigment	6400	5000	No data available	No data available	No data available
Titanium dioxide	2000	No data available	5.09	No data available	No data available

This product does not contain candidate substances of very high concern at a concentration >=0.1% (Regulation (EC) No. 1907/2006 (REACH), Article 59).

SECTION 4: First aid measures

4.1. Description of first aid measures

General advice For external use only. Get medical attention if irritation or other symptoms occur. Show this

safety data sheet to the doctor in attendance.

Inhalation Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

Skin contact Wash skin with soap and water.

Ingestion Rinse mouth.

4.2. Most important symptoms and effects, both acute and delayed

Symptoms Dust irritates eyes and air passages.

Effects of Exposure No information available.

4.3. Indication of any immediate medical attention and special treatment needed

Note to doctors Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable Extinguishing MediaUse water spray or fog; do not use straight streams.

Unsuitable extinguishing media Do not scatter spilled material with high pressure water streams.

5.2. Special hazards arising from the substance or mixture

Specific hazards arising from the Fine of

chemical

Fine dust dispersed in air may ignite.

Hazardous combustion products Hazardous decomposition products due to incomplete combustion. Carbon dioxide (CO2).

Nitrogen oxides (NOx).

5.3. Advice for firefighters

Special protective equipment and precautions for fire-fighters

In case of fire: Wear self-contained breathing apparatus. Use personal protection equipment.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Personal precautions Avoid generation of dust. Ensure adequate ventilation.

6.2. Environmental precautions

Environmental precautions See Section 12 for additional Ecological Information.

6.3. Methods and material for containment and cleaning up

Methods for containment Prevent further leakage or spillage if safe to do so. Prevent dust cloud.

Methods for cleaning upTake up mechanically, placing in appropriate containers for disposal.

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

6.4. Reference to other sections

Reference to other sections See section 8 for more information. See section 13 for more information.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling Ensure adequate ventilation. Avoid generation of dust.

General hygiene considerations Handle in accordance with good industrial hygiene and safety practice.

7.2. Conditions for safe storage, including any incompatibilities

Storage Conditions Keep container tightly closed in a dry and well-ventilated place.

Storage class (TRGS 510) Not determined.

7.3. Specific end use(s)

Specific use(s)

See section 1 for more information.

Risk Management Methods (RMM) The information required is contained in this Safety Data Sheet.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure Limits

Chemical name	European	Union	Austria	Belgium	Bulg	aria	Croatia
Carbon black	-		-	TWA: 3 mg/m ³	-		TWA: 3.5 mg/m ³ STEL: 7 mg/m ³
Cyan Pigment	-		TWA: 1 mg/m ³ TWA: 0.1 mg/m ³ STEL 4 mg/m ³ STEL 0.4 mg/m ³	-	-		-
Titanium dioxide	1		TWA: 5 mg/m ³ STEL 10 mg/m ³	TWA: 10 mg/m ³	TWA: 10.	0 mg/m ³	TWA: 10 mg/m ³ TWA: 4 mg/m ³
Chemical name	Cypru	IS	Czech Republic	Denmark	Esto		Finland
Carbon black	-		TWA: 2.0 mg/m ³	TWA: 3.5 mg/m ³ STEL: 7 mg/m ³	TWA: 3	mg/m³	TWA: 3.5 mg/m ³ STEL: 7 mg/m ³
Cyan Pigment	-		-	-	-		TWA: 0.02 mg/m ³
Titanium dioxide	-		-	TWA: 6 mg/m ³ STEL: 12 mg/m ³	TWA: 5		-
Chemical name	Franc		Germany TRGS	Germany DFG	Gree		Hungary
Carbon black	TWA: 3.5	mg/m³	-	-	TWA: 3.5 STEL: 7	5 mg/m³ mg/m³	TWA: 3 mg/m ³
Cyan Pigment	-		TWA: 0.2 mg/m ³ TWA: 0.045 mg/m ³	-	-		TWA: 0.1 mg/m³ STEL: 0.2 mg/m³
Titanium dioxide	TWA: 10 i	mg/m³	TWA: 10 mg/m ³ TWA: 1.25 mg/m ³	TWA: 0.3 mg/m ³ Peak: 2.4 mg/m ³	TWA: 10 TWA: 5		-
Chemical name	Irelan	id	Italy MDLPS	Italy AIDII	Latv		Lithuania
Carbon black	TWA: 3 n STEL: 15		-	TWA: 3 mg/m ³	-		-
Cyan Pigment	-		-	TWA: 1 mg/m ³	TWA: 5		TWA: 5 mg/m ³
Titanium dioxide	TWA: 10 i TWA: 4 n STEL: 30 STEL: 12	ng/m³ mg/m³	-	TWA: 10 mg/m ³	TWA: 10) mg/m³	TWA: 5 mg/m ³
Chemical name	Luxembourg		Malta	Netherlands	Norv	vay	Poland
Carbon black	-		-	-	TWA: 3.5 STEL: 7	mg/m³	TWA: 4 mg/m ³
Titanium dioxide	-		-	-	TWA: 5 STEL: 10) mg/m³	TWA: 10 mg/m ³ STEL: 30 mg/m ³
Chemical name	Portug		Romania	Slovakia	Slove	enia	Spain
Carbon black	TWA: 3 n	ng/m³	-	TWA: 2 mg/m ³ TWA: 10 mg/m ³ Ceiling: 10 mg/m ³	-		TWA: 3.5 mg/m ³
Cyan Pigment			-	-			TWA: 0.01 mg/m ³
Titanium dioxide	TWA: 10 i	mg/m³	TWA: 10 mg/m ³ STEL: 15 mg/m ³	TWA: 5 mg/m ³	-		TWA: 10 mg/m ³
Chemical name			Sweden	Switzerlan	nd	Un	ited Kingdom
	Styrene-acrylate polymer		-	S+			-
Carbon black		1	NGV: 3 mg/m ³	-		S	/A: 3.5 mg/m³ 「EL: 7 mg/m³
Cyan Pigment			-			NA: 1 mg/m³ 「EL: 2 mg/m³	
Titanium dioxide)	1	NGV: 5 mg/m³	TWA: 3 mg/ TWA: 10 mg			VA: 10 mg/m³ VA: 4 mg/m³

	STEL: 30 mg/m ³
	STEL: 12 mg/m ³

Biological occupational exposure limits

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies.

Derived No Effect Level (DNEL) - Workers

Chemical name	Oral	Dermal	Inhalation
Carbon black	-	-	1 mg/m³ [4] [6]
Magenta pigment	-	42 mg/kg bw/day [4] [6]	147 mg/m³ [4] [6]
			3 mg/m³ [5] [6]
Cyan Pigment	-	4.67 mg/kg bw/day [4] [6]	16.4 mg/m³ [4] [6]

Notes

[4] Systemic health effects.[5] Local health effects.[6] Long term.

[7] Short term.

Derived No Effect Level (DNEL) - General Public

Chemical name	Oral	Dermal	Inhalation
Carbon black	-	-	0.06 mg/m³ [4] [6]
Magenta pigment	25 mg/kg bw/day [4] [6]	-	-
Cyan Pigment	1.67 mg/kg bw/day [4] [6]	-	2.9 mg/m³ [4] [6]

Notes

[4] Systemic health effects.

[6] Long term.

Predicted No Effect Concentration (PNEC)

	Chemical name	Freshwater	Freshwater (intermittent release)	Marine water	Marine water (intermittent release)	Air
Ī	Carbon black	50 mg/L	-	-	-	-
Ī	Cyan Pigment	0.1 mg/L	-	10 μg/L	-	-

Chemical name	Freshwater sediment	Marine sediment	Sewage treatment	Soil	Food chain
Cyan Pigment	-	-	1000 mg/L	-	-

8.2. Exposure controls

Engineering controls None under normal use conditions.

Personal protective equipment

Revision date 16-Oct-2025

Eye/face protection No special protective equipment required.

Hand protection No special protective equipment required.

No special protective equipment required. Skin and body protection

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

None known

None known

Thermal hazards None under normal processing.

General hygiene considerations Handle in accordance with good industrial hygiene and safety practice.

Environmental exposure controls Do not allow into any sewer, on the ground or into any body of water.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state Solid

Colour Black, Cyan, Magenta, yellow

Odour Faint.

Odour threshold No information available

Values Remarks • Method Property

Melting point / freezing point Not applicable None known Initial boiling point and boiling rangeNot applicable None known Not flammable None known **Flammability** Flammability Limit in Air None known

Upper flammability or explosive Not applicable

limits

Lower flammability or explosive Not applicable

limits Flash point

Not applicable **Autoignition temperature** None known Not applicable **Decomposition temperature** None known Not applicable None known pН No data available None known pH (as aqueous solution) Kinematic viscosity Not applicable None known Dynamic viscosity Not applicable None known Water solubility nealiaible None known Solubility(ies) No data available None known Partition coefficient Not applicable None known Vapour pressure Not applicable None known None known

Not applicable

Relative density Not applicable **Bulk density**

Liquid Density Not applicable No data available Relative vapour density

Particle characteristics

Particle Size No information available Particle Size Distribution No information available

9.2. Other information

49 - 60 °C / 120 - 140 °F Softening point

VOC content None

9.2.1. Information with regards to physical hazard classes

Explosive properties Fine dust dispersed in air, in sufficient concentrations, and in the presence of an ignition

source is a potential dust explosion hazard

9.2.2. Other safety characteristics

No information available

SECTION 10: Stability and reactivity

10.1. Reactivity

Reactivity No dangerous reaction known under conditions of normal use.

10.2. Chemical stability

Stability Stable under normal conditions.

Explosion data

Sensitivity to mechanical impact None. Sensitivity to static discharge None.

10.3. Possibility of hazardous reactions

Possibility of hazardous reactions
None under normal processing.

10.4. Conditions to avoid

Conditions to avoidGeneration/formation of dust.

10.5. Incompatible materials

Incompatible materialsNone known based on information supplied.

10.6. Hazardous decomposition products

Hazardous decomposition products None known based on information supplied.

SECTION 11: Toxicological information

Note: The toxicity data noted below is based on the test results of similar reprographic materials.

11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

Information on likely routes of exposure

Inhalation No known effects under normal use conditions.

Eye contact No hazard from product as supplied.

Skin contact No hazard from product as supplied.

Ingestion No hazard from product as supplied.

Symptoms related to the physical, chemical and toxicological characteristics

Symptoms None known.

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Acute toxicity Based on available data, the classification criteria are not met.

Numerical measures of toxicity

The following values are calculated based on chapter 3.1 of the GHS document:

ATEmix (oral) 4,565.50 mg/kg

ATEmix (inhalation-gas) 99,999.00 ppm

ATEmix (inhalation-vapour) 99,999.00 mg/l

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Carbon black	> 10000 mg/kg (Rat)	> 2000 mg/kg (Rabbit)	> 4.6 mg/m³ (Rat) 4 h
Magenta pigment	> 23 g/kg (Rat)	> 3000 mg/kg (Rabbit)	> 3.055 mg/L (Rat) 4 h
Cyan Pigment	> 6400 mg/kg (Rat)	> 5000 mg/kg (Rat)	-
Titanium dioxide	> 2000 mg/kg (Rat)	-	> 5.09 mg/L (Rat)4 h

Skin corrosion/irritationBased on available data, the classification criteria are not met.

Serious eye damage/eye irritation Based on available data, the classification criteria are not met.

Respiratory or skin sensitisation Based on available data, the classification criteria are not met.

Germ cell mutagenicity Not mutagenic in AMES Test.

Carcinogenicity

The IARC (International Agency for Research on Cancer) has listed carbon black as "possibly carcinogenic to humans". However, we have has concluded that the presence of carbon black in this mixture does not present a health hazard. The IARC classification is based on studies evaluating pure, "free" carbon black. In contrast, toner is a formulation composed of specially prepared polymer and a small amount of carbon black (or other pigment). In the process of making toner, the small amount of carbon black becomes encapsulated within a matrix. We have performed extensive testing of toner, including a chronic bioassay (test for potential carcinogenicity). Exposure to toner did not produce evidence of cancer in exposed animals. The results were submitted to regulatory agencies and published extensively.

The IARC (International Agency for Research on Cancer) has listed titanium dioxide as "possibly carcinogenic to humans". However, we have concluded that the presence of titanium dioxide in this mixture does not present a health hazard. The IARC classification is based on studies in rats using high concentrations of pure, unbound TiO2 particles of respirable size. Epidemiological studies do not suggest a carcinogenic effects in humans. In addition, the titanium dioxide in this mixture is encapsulated in a matrix or bound to the surface of the toner.

The table below indicates whether each agency has listed any ingredient as a carcinogen.

Chemical name	European Union	
Titanium dioxide	Carc. 2	

Reproductive toxicity

This product does not contain any known or suspected reproductive hazards.

STOT - single exposureBased on available data, the classification criteria are not met.

STOT - repeated exposureBased on available data, the classification criteria are not met.

Aspiration hazardBased on available data, the classification criteria are not met.

11.2. Information on other hazards

11.2.1. Endocrine disrupting properties

Endocrine disrupting properties This mixture does not contain any substance that has endocrine disrupting properties with

respect to humans.

11.2.2. Other information

Other adverse effects Although toner is not an aquatic toxin, microplastics may be a physical hazard to aquatic life

and should not be allowed to enter drains, sewers, or waterways.

SECTION 12: Ecological information

12.1. Toxicity

Ecotoxicity Not considered to be harmful to aquatic life.

12.2. Persistence and degradability

Persistence and degradability Not readily biodegradable.

12.3. Bioaccumulative potential

Bioaccumulation

Chemical name	Partition coefficient
Magenta pigment	2.2
Cyan Pigment	6.6

12.4. Mobility in soil

Mobility in soil The product is insoluble and floats on water.

12.5. Results of PBT and vPvB assessment

PBT and VPVB assessment	The product does not contain any	/ substance(s) classified as PBT of VPVB.
Chemical name		PBT and vPvB assessment
Carbon black		The substance is not PBT / vPvB
Yellow Pigment		The substance is not PBT / vPvB
Magenta pigment		The substance is not PBT / vPvB
Cyan Pigment		The substance is not PBT / vPvB
Titanium dioxide		The substance is not PBT / vPvB

12.6. Endocrine disrupting properties

Endocrine disrupting properties This mixture does not contain any substance that has endocrine disrupting properties with

respect to non-target organisms.

12.7. Other adverse effects

Other adverse effects No information available.

PMT or vPvM properties The product does not contain any substance(s) classified as PMT or vPvM.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Waste from residues/unused

products

Can be landfilled or incinerated, when in compliance with local regulations.

Contaminated packaging

Dispose of contents/containers in accordance with local regulations.

Waste codes / waste designations

according to EWC

08 03 18.

Other information

Although toner is not an aquatic toxin, microplastics may be a physical hazard to aquatic life and should not be allowed to enter drains, sewers, or waterways. Do Not Pour Product

Down the Drain; Do Not Rinse the Container Before Disposal.

SECTION 14: Transport information

IATA

14.1 UN number or ID number Not regulated 14.2 UN proper shipping name Not regulated Not regulated 14.3 Transport hazard class(es) 14.4 Packing group Not regulated 14.5 Environmental hazards Not applicable

14.6 Special precautions for user

Special Provisions None

IMDG

Not regulated 14.1 UN number or ID number 14.2 UN proper shipping name Not regulated 14.3 Transport hazard class(es) Not regulated 14.4 Packing group Not regulated 14.5 Environmental hazards Not applicable

14.6 Special precautions for user

Special Provisions

14.7 Maritime transport in bulk

according to IMO instruments

No information available

RID

14.1 UN number or ID number Not regulated 14.2 UN proper shipping name Not regulated 14.3 Transport hazard class(es) Not regulated 14.4 Packing group Not regulated Not applicable 14.5 Environmental hazards

14.6 Special precautions for user

None

Special Provisions

ADR

14.1 UN number or ID number Not regulated 14.2 UN proper shipping name Not regulated 14.3 Transport hazard class(es) Not regulated 14.4 Packing group Not regulated 14.5 Environmental hazards Not applicable

14.6 Special precautions for user

Special Provisions

None

ADN

14.1 UN number or ID number
14.2 UN proper shipping name
14.3 Transport hazard class(es)
14.4 Packing group
14.5 Environmental hazard
Not regulated
Not regulated
Not regulated
Not regulated
Not applicable

14.6 Special precautions for user

Special Provisions None

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

National regulations

France

Occupational Illnesses (R-463-3, France)

Chemical name	French RG number
Carbon black	RG 16,RG 16bis

Switzerland

Ordinance on the Incentive Tax on Volatile Organic Compounds (OVOC) SR 814.018 Not applicable

Storage of Hazardous Material WPO (GSchV) SR 814.201; WPA (GSchG) SR 814.20 SC Non-hazardous material

Not applicable

European Union

Take note of Directive 98/24/EC on the protection of the health and safety of workers from the risks related to chemical agents at work.

Authorisations and/or restrictions on use:

This product does not contain substances subject to authorisation (Regulation (EC) No. 1907/2006 (REACH), Annex XIV) This product does not contain substances subject to restriction (Regulation (EC) No. 1907/2006 (REACH), Annex XVII)

The synthetic polymer microparticles supplied is subject to conditions laid down by entry 78 of Annex XVII to Regulation (EC) No 1907/2006 of the European Parliament and of the Council. Toners and inks are subject to the derogations referred to in Paragraphs 4a and/or 5 (a/b/c) of the Regulation.

Persistent Organic Pollutants

Not applicable

Ozone-depleting substances (ODS) regulation (EC) 1005/2009

Not applicable

EU - Plant Protection Products (1107/2009/EC)

Chemical name	EU - Plant Protection Products (1107/2009/EC)
Carbon black	Plant protection agent

International Inventories

TSCA Complies
DSL/NDSL Complies
EINECS/ELINCS Complies

ENCS
Contact supplier for inventory compliance status
Contact supplier for inventory compliance status
KECL
Contact supplier for inventory compliance status
NZIOC
Contact supplier for inventory compliance status
Contact supplier for inventory compliance status
Contact supplier for inventory compliance status

Legend:

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances

ENCS - Japan Existing and New Chemical Substances

IECSC - China Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances

AllC - Australian Inventory of Industrial Chemicals

NZIoC - New Zealand Inventory of Chemicals

TCSI - Taiwan Chemical Substance Inventory

15.2. Chemical safety assessment

Chemical Safety Report A chemical safety assessment according to regulation (EC) No. 1907/2006 is not required

SECTION 16: Other information

Key or legend to abbreviations and acronyms used in the safety data sheet

Legend

SVHC: Substances of Very High Concern for Authorisation:
PBT: Persistent, Bioaccumulative, and Toxic (PBT) Substances
vPvB: Very Persistent and very Bioaccumulative (vPvB) Substances

STOT: Specific Target Organ Toxicity ATE: Acute Toxicity Estimate LC50: 50% Lethal Concentration

LD50: 50% Lethal Dose

Legend Section 8: Exposure controls/personal protection

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value Sk* Skin designation

+ Sensitisers

Classification procedure	
Classification according to Regulation (EC) No. 1272/2008 [CLP]	Method Used
Acute oral toxicity	Calculation method
Acute dermal toxicity	On basis of test data
Acute inhalation toxicity - gas	Calculation method
Acute inhalation toxicity - vapour	Calculation method
Acute inhalation toxicity - dust/mist	On basis of test data
Skin corrosion/irritation	Calculation method
Serious eye damage/eye irritation	Calculation method
Respiratory sensitisation	Calculation method
Skin sensitisation	Calculation method
Mutagenicity	Calculation method
Carcinogenicity	Calculation method
Reproductive toxicity	Calculation method

STOT - single exposure	Calculation method
STOT - repeated exposure	Calculation method
Acute aquatic toxicity	Calculation method
Chronic aquatic toxicity	Calculation method
Aspiration hazard	Calculation method
Ozone	Calculation method

Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

European Chemicals Agency (ECHA) Committee for Risk Assessment (ECHA_RAC)

European Chemicals Agency (ECHA) (ECHA API)

Environmental Protection Agency

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

National Institute of Technology and Evaluation (NITE)

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

U.S. National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

World Health Organization

Revision date 16-Oct-2025

Revision Note Update to format

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH)

Disclaimer

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

End of Safety Data Sheet