



SAFETY DATA SHEET

This safety data sheet was created pursuant to the requirements of:
WHS Regulations

Revision date 23-Apr-2026

Revision Number 1.02

Section 1: Identification: Product identifier and chemical identity

Product identifier

Product Name ICH/USP Oral Target Elements Standard D

Product Code(s) 5190-9769

Other means of identification

Proper shipping name Corrosive liquid, acidic, inorganic, n.o.s. (Nitric acid, Hydrofluoric Acid)

Chemical name

Substance Name

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Reagents and Standards for Analytical Chemical Laboratory Use. This product is for research and development only.

Uses advised against Do not use outside of recommended applications.

Banned and/or restricted This product contains one or more substance(s) subject to prohibition, authorisation or restriction. Verify that requirements related to using, handling, and storing substances subject to prohibition, authorisation or restriction are met.

Chemicals of Security Concern This product contains one or more substance(s) listed on the voluntary National Code of Practice for Chemicals of Security Concern.

Details of manufacturer or importer

Supplier

Agilent Technologies Australia Pty Ltd
679 Springvale Road
Mulgrave
Victoria 3170, Australia

1800 802 402

For further information, please contact

Contact Point Product Safety Department

E-mail address pdl-msds_author@agilent.com

Emergency telephone number

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Emergency telephone number CHEMTREC®: +(61)-290372994

Section 2: Hazard(s) identification

Classification of the substance or mixture

Corrosive to metals	Category 1
Skin corrosion/irritation	Category 2
Serious eye damage/eye irritation	Category 1
Hazardous to the aquatic environment - acute	Category 1
Hazardous to the aquatic environment - chronic	Category 1

Label elements

Corrosion
Environment



Signal word

DANGER

Hazard statements

May be corrosive to metals.
Causes skin irritation.
Causes serious eye damage.
Very toxic to aquatic life with long lasting effects.

Precautionary Statements - Prevention

Wash face, hands and any exposed skin thoroughly after handling.
Avoid release to the environment.
Keep only in original packaging.
Wear protective gloves, protective clothing, eye protection and face protection.

Precautionary Statements - Response

Specific treatment (see supplemental first aid instructions on this label).
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
Immediately call a POISONS INFORMATION CENTRE or doctor.
IF ON SKIN: Wash with plenty of water and soap.
If skin irritation occurs: Get medical advice/attention.
Take off contaminated clothing and wash it before reuse.
Collect spillage.
Absorb spillage to prevent material damage.

Precautionary Statements - Storage

Store in corrosion resistant container with a resistant inner liner.

Precautionary Statements - Disposal

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Dispose of contents and container in accordance with local, regional, national, and international regulations as applicable.

Other hazards which do not result in classification

May be harmful if swallowed.

May be harmful in contact with skin.

Section 3: Composition/information on ingredients

Chemical name	CAS No.	Weight-%
Nitric acid	7697-37-2	0 - 10%
Chromic nitrate nonahydrate	7789-02-8	0 - 10%
Copper	7440-50-8	0 - 10%
Barium nitrate	10022-31-8	0 - 10%
Antimony	7440-36-0	0 - 10%
Hydrofluoric Acid	7664-39-3	0 - 10%
Non-hazardous ingredients	Proprietary	Balance

Additional information

The concentration of the acid stated in this SDS is calculated as an absolute mass concentration (%w/v). This is less than the acid concentration stated on the product label and COA, which reflects a percent value of the commercially available concentrated aqueous form of the acid.

Section 4: First aid measures**Description of first aid measures**

General advice	Show this safety data sheet to the doctor in attendance. Immediate medical attention is required.
Emergency telephone number	Poisons Information Centre, Australia: 13 11 26 Poisons Information Centre, New Zealand: 0800 764 766
Inhalation	Remove to fresh air. Get medical attention immediately if symptoms occur.
Eye contact	Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Keep eye wide open while rinsing. Do not rub affected area. Get immediate medical attention.
Skin contact	Wash off immediately with soap and plenty of water for at least 15 minutes. Get medical attention if irritation develops and persists.
Ingestion	Rinse mouth. Never give anything by mouth to an unconscious person. Do NOT induce vomiting. Call a doctor.
Self-protection of the first aider	Avoid contact with skin, eyes or clothing. Wear personal protective clothing (see section 8).

Most important symptoms and effects, both acute and delayed

Symptoms	Burning sensation. May cause blindness. May cause redness and tearing of the eyes. Erythema (skin redness).
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Effects of Exposure No information available.

Indication of any immediate medical attention and special treatment needed

Note to doctors Treat symptomatically.

Section 5: Firefighting measures

Suitable Extinguishing Media

Suitable extinguishing equipment Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

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

Specific hazards arising from the chemical

Specific hazards arising from the chemical No information available.

Special protective actions for firefighters

Special protective equipment and precautions for fire-fighters Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear. Use personal protective equipment.

Hazchem code 2X

Section 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

Personal precautions Avoid contact with skin, eyes or clothing. Ensure adequate ventilation. Use personal protective equipment as required.

Other information Refer to protective measures listed in Sections 7 and 8.

For emergency responders Use personal protection recommended in Section 8.

Environmental precautions

Environmental precautions Prevent further leakage or spillage if safe to do so.

Methods and material for containment and cleaning up

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

Methods for cleaning up Dam up. Soak up with inert absorbent material. Pick up and transfer to properly labelled containers. Clean contaminated surface thoroughly.

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Precautions to prevent secondary hazards

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

Section 7: Handling and storage, including how the chemical may be safely used

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice. Do not breathe dust/fume/gas/mist/vapours/spray. Avoid contact with skin, eyes or clothing. Do not eat, drink or smoke when using this product. Take off contaminated clothing and wash before re-use.

General hygiene considerations Avoid contact with skin, eyes or clothing. Do not eat, drink or smoke when using this product. Wash hands before breaks and after work. Wear suitable gloves and eye/face protection. Regular cleaning of equipment, work area and clothing is recommended.

Conditions for safe storage, including any incompatibilities

Storage Conditions Please refer to the manufacturer's certificate for specific storage and transport temperature conditions. Store only in the original receptacle unless other advice is given on the CoA. Keep containers tightly closed in a dry, cool and well-ventilated place. Protect from moisture. Store locked up. Keep out of the reach of children. Store away from other materials.

Incompatible materials Oxidising agent. Strong acids. Strong bases.

Section 8: Exposure controls and personal protection

Control Parameters

Exposure Limits

Chemical name	Australia	New Zealand	ACGIH TLV
Nitric acid 7697-37-2	TWA: 2 ppm; TWA: 5.2 mg/m ³ ; STEL: 4 ppm; STEL: 10 mg/m ³ ;	TWA: 2 ppm; TWA: 5.2 mg/m ³ ; STEL: 4 ppm; STEL: 10 mg/m ³ ;	TWA: 2 ppm STEL: 4 ppm
Chromic nitrate nonahydrate 7789-02-8	TWA: 0.5 mg/m ³ ;	TWA: 0.5 mg/m ³ ;	-
Copper 7440-50-8	TWA: 1 mg/m ³ ; dust and mist TWA: 0.2 mg/m ³ ; fume	TWA: 0.01 mg/m ³ ; respirable dust	TWA: 0.2 mg/m ³ fume
Barium nitrate 10022-31-8	TWA: 0.5 mg/m ³ ;	TWA: 0.5 mg/m ³ ;	TWA: 0.5 mg/m ³ Ba
Antimony 7440-36-0	TWA: 0.5 mg/m ³ ;	TWA: 0.5 mg/m ³ ;	TWA: 0.5 mg/m ³
Hydrofluoric Acid 7664-39-3	TWA: 2.5 mg/m ³ ; Peak: 3 ppm; Peak: 2.6 mg/m ³ ;	TWA: 2.5 mg/m ³ ; Ceiling: 3 ppm; Ceiling: 2.6 mg/m ³ ;	TWA: 0.5 ppm F Sk* Ceiling: 2 ppm F

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Chemical name	European Union	United Kingdom	Germany DFG
Nitric acid 7697-37-2	STEL: 1 ppm; STEL: 2.6 mg/m ³ ;	STEL: 1 ppm; STEL: 2.6 mg/m ³ ;	-
Chromic nitrate nonahydrate 7789-02-8	-	TWA: 0.5 mg/m ³ ; STEL: 1.5 mg/m ³ ;	-
Copper 7440-50-8	-	TWA: 1 mg/m ³ ; dust and mist TWA: 0.2 mg/m ³ ; fume STEL: 0.6 mg/m ³ ; fume STEL: 2 mg/m ³ ; dust and mist	TWA-MAK: 0.01 mg/m ³ ; I(2); respirable fraction
Barium nitrate 10022-31-8	TWA: 0.5 mg/m ³ ;	TWA: 0.5 mg/m ³ ; STEL: 1.5 mg/m ³ ;	TWA-MAK: 0.5 mg/m ³ ; I(8); i nhalable fraction
Antimony 7440-36-0	-	TWA: 0.5 mg/m ³ ; STEL: 1.5 mg/m ³ ;	-
Hydrofluoric Acid 7664-39-3	TWA: 1.8 ppm; TWA: 1.5 mg/m ³ ; STEL: 3 ppm; STEL: 2.5 mg/m ³ ;	TWA: 1.8 ppm; TWA: 1.5 mg/m ³ ; STEL: 3 ppm; STEL: 2.5 mg/m ³ ;	TWA-MAK: 1 ppm; I(2); TWA-MAK: 0.83 mg/m ³ ; I(2);

Note See section 16 for terms and abbreviations.

Biological occupational exposure limits

Chemical name	Australia	ACGIH	European Union
Hydrofluoric Acid 7664-39-3	-	2 mg/L - urine (Fluoride) - prior to shift 3 mg/L - urine (Fluoride) - end of shift	-

Appropriate engineering controls

Engineering controls Showers
Eyewash stations
Ventilation systems.

Individual protection measures, such as personal protective equipment

Eye/face protection Avoid contact with eyes. Wear safety glasses with side shields (or goggles). Face protection shield. Tight sealing safety goggles.

Skin and body protection Wear suitable protective clothing. Long sleeved clothing.

Hand protection Wear protective Neoprene™ gloves. The protective gloves to be used must comply with the specifications of (EU) 2016/425. Wear suitable gloves.

Respiratory protection Appropriate respiratory protection should be selected and used according to the chemical nature, hazards and use of this product and safety requirements of the local jurisdiction.

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

Thermal hazards No information available.

Section 9: Physical and chemical properties

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Information on basic physical and chemical properties

Appearance	Liquid
Physical state	Liquid
Colour	colourless
Odour	Odourless

<u>Property</u>	<u>Values</u>	<u>Remarks • Method</u>
Melting point / freezing point	No data available	None known
Initial boiling point and boiling range	No data available	None known
Flammability	No data available	None known
Flammability Limit in Air		None known
Upper flammability or explosive limits	No data available	
Lower flammability or explosive limits	No data available	
Flash point	No data available	None known
Auto-ignition temperature	No data available	None known
Decomposition temperature		None known
SADT (°C)	No data available	None known
pH	No data available	None known
pH (as aqueous solution)	No data available	None known
Kinematic viscosity	No data available	None known
Dynamic viscosity	No data available	None known
Water solubility	No data available	None known
Solubility(ies)	No data available	None known
Partition coefficient	No data available	None known
Vapour pressure	No data available	None known
Relative density	No data available	None known
Bulk density	No data available	
Liquid Density	No data available	
Relative vapour density	No data available	None known
Particle characteristics		
Particle Size	No information available	
Particle Size Distribution	No information available	

Other information

Section 10: Stability and reactivity

Reactivity

Reactivity	No information available.
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Chemical stability

Stability	Stable under normal conditions.
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Explosion data

Sensitivity to mechanical impact	None.
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Sensitivity to static discharge None.**Possibility of hazardous reactions****Possibility of hazardous reactions** None under normal processing.**Conditions to avoid****Conditions to avoid** Exposure to air or moisture over prolonged periods.**Incompatible materials****Incompatible materials** Oxidising agent. Strong acids. Strong bases.**Hazardous decomposition products****Hazardous decomposition products** None known based on information supplied.**Section 11: Toxicological information****Information on likely routes of exposure****Product Information**

Inhalation	Specific test data for the substance or mixture is not available.
Eye contact	Specific test data for the substance or mixture is not available. Causes serious eye damage.
Skin contact	Specific test data for the substance or mixture is not available. Causes skin irritation. (based on components). May be harmful in contact with skin.
Ingestion	Specific test data for the substance or mixture is not available. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhoea.

Symptoms related to the physical, chemical and toxicological characteristics**Symptoms** Burning sensation. May cause blindness. May cause redness and tearing of the eyes. Erythema (skin redness).**Acute toxicity** No information available.**Numerical measures of toxicity**

The following ATE values have been calculated for the mixture

ATEmix (oral)	4,681.60 mg/kg
ATEmix (dermal)	5,000.00 mg/kg
ATEmix (inhalation-gas)	99,999.00 ppm
ATEmix (inhalation-vapour)	58.90 mg/L
ATEmix (inhalation-dust/mist)	50.10 mg/L

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Component Information

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Nitric acid	-	-	= 2500 ppm (Rat) 1 h ATE (vapours) = 2.65 mg/L
Chromic nitrate nonahydrate	= 3250 mg/kg (Rat)	-	-
Copper	-	-	> 5.11 mg/L (Rat) 4 h
Barium nitrate	= 300 mg/kg (Rat)	-	> 1.1 mg/L (Rat) 243 min
Antimony	= 7000 mg/kg (Rat)	-	-
Hydrofluoric Acid	-	-	= 0.79 mg/L (Rat) 1 h

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

Skin corrosion/irritation	Classification based on data available for ingredients. Causes skin irritation.
Serious eye damage/eye irritation	Classification based on data available for ingredients. Causes burns. Causes serious eye damage.
Respiratory or skin sensitisation	No information available.
Germ cell mutagenicity	No information available.
Carcinogenicity	Based on available data, the classification criteria are not met.
Reproductive toxicity	No information available.
STOT - single exposure	No information available.
STOT - repeated exposure	No information available.
Aspiration hazard	No information available.

Section 12: Ecological information

Ecotoxicity Very toxic to aquatic life with long lasting effects.

Aquatic ecotoxicity
Component Information

Chemical name	Fish	Crustacea	Algae/aquatic plants	Toxicity to microorganisms
Copper	LC50: 0.0068 - 0.0156mg/L (96h, Pimephales promelas) LC50: <0.3mg/L (96h,	EC50: =0.03mg/L (48h, Daphnia magna)	EC50: 0.031 - 0.054mg/L (96h, Pseudokirchneriella subcapitata)	-

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	Pimephales promelas LC50: =0.2mg/L (96h, Pimephales promelas) LC50: =0.052mg/L (96h, Oncorhynchus mykiss) LC50: =1.25mg/L (96h, Lepomis macrochirus) LC50: =0.3mg/L (96h, Cyprinus carpio) LC50: =0.8mg/L (96h, Cyprinus carpio) LC50: =0.112mg/L (96h, Poecilia reticulata)		EC50: 0.0426 - 0.0535mg/L (72h, Pseudokirchneriella subcapitata)	
Antimony	LC50: >6.2 - 8.3mg/L (96h, Cyprinodon variegatus)	-	-	-
Hydrofluoric Acid	-	EC50: =270mg/L (48h, Daphnia species)	-	-

Terrestrial ecotoxicity No information available.

Persistence and degradability No information available.

Bioaccumulative potential

Chemical name	Partition coefficient	Bioconcentration factor (BCF)	Trophic magnification factor (TMF)
Nitric acid	-2.3	-	-
Hydrofluoric Acid	-1.4	-	-

Mobility in soil No information available.

Other adverse effects No information available.

Endocrine disrupting properties

Section 13: Disposal considerations

Disposal methods

Waste from residues/unused products Dispose of in accordance with local regulations. Dispose of waste in accordance with environmental legislation.

Contaminated packaging Do not re-use empty containers.

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See section 8 for more information

Section 14: Transport information

ADG

UN number or ID number	UN3264
UN proper shipping name	Corrosive liquid, acidic, inorganic, n.o.s.
Transport hazard class(es)	8
Packing group	III
Environmental hazard	Yes
Special Provisions	223, 274
Description	UN3264, Corrosive liquid, acidic, inorganic, n.o.s. (Nitric acid, Hydrofluoric Acid), 8, III
Limited quantity (LQ)	5 L
Hazchem code	2X

IATA

UN number or ID number	UN3264
UN proper shipping name	Corrosive liquid, acidic, inorganic, n.o.s.
Technical Name	Nitric acid, Hydrofluoric Acid
Transport hazard class(es)	8
Packing group	III
Environmental hazards	Yes
Special precautions for user	Special provisions from the regulations relative to the specified mode of transport are noted by numeric code. Refer to the regulations for the full text of special provisions
ERG Code	8L
Special Provisions	A3, A803
Description	UN3264, Corrosive liquid, acidic, inorganic, n.o.s. (Nitric acid, Hydrofluoric Acid), 8, III

IMDG

UN number or ID number	UN3264
UN proper shipping name	Corrosive liquid, acidic, inorganic, n.o.s.
Technical Name	Nitric acid, Hydrofluoric Acid
Transport hazard class(es)	8
Packing group	III
Marine pollutant indicator	M
Marine pollutant name	Copper
Special Provisions	223, 274
EmS-No.	F-A S-B
Description	UN3264, Corrosive liquid, acidic, inorganic, n.o.s.(Nitric acid, Hydrofluoric Acid), 8, III, Marine pollutant

Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code

No information available

Special precautions for user

Special provisions from the regulations relative to the specified mode of transport are noted by numeric code. Refer to the regulations for the full text of special provisions

Section 15: Regulatory information

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

National regulations

Australia

See section 8 for national exposure control parameters

Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP)

Classified as a scheduled poison according to the Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP)

Poison Schedule Number 5

Australian Industrial Chemicals Introduction Scheme (AICIS)

Chemical name	Australian Industrial Chemicals Introduction Scheme (AICIS)	Additional information
Nitric acid - 7697-37-2	Contact supplier for inventory compliance status Present	-
Barium nitrate - 10022-31-8	Present	-
Antimony - 7440-36-0	Present	-
Hydrofluoric Acid - 7664-39-3	Present	Specific information requirement: Obligations to provide information apply. You must tell us within 28 days if the circumstances of your importation or manufacture (introduction) are different to those in our assessment.
Lithium Carbonate - 554-13-2	Present	-

Illicit Drug Precursors/Reagents

This product does not contain any substance(s) on the Illicit Drug Precursors/Reagents list.

Chemicals of Security Concern

This product contains one or more substance(s) listed on the voluntary National Code of Practice for Chemicals of Security Concern.

Chemical name	Chemicals of Security Concern	Additional information
Nitric acid - 7697-37-2	Present High risk	Precursors to homemade explosives

Major hazard (accident/incident planning) regulation

Verify that license requirements are met

Named hazardous chemicals

Chemical name	Threshold quantity (T)
Hydrofluoric Acid - 7664-39-3	50 tonne TQ



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	50 tonne TQ >50% solution Hydrofluoric acid
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National pollutant inventory

Subject to reporting requirement

Chemical name	National pollutant inventory
Nitric acid - 7697-37-2	10 tonne/yr Threshold category 1
Chromic nitrate nonahydrate - 7789-02-8	10 tonne/yr Threshold category 1 2000 tonne/yr Threshold category 2b 60000 MWH Threshold category 2b 20 MW Threshold category 2b
Copper - 7440-50-8	10 tonne/yr Threshold category 1 2000 tonne/yr Threshold category 2b 60000 MWH Threshold category 2b 20 MW Threshold category 2b
Antimony - 7440-36-0	10 tonne/yr Threshold category 1
Hydrofluoric Acid - 7664-39-3	10 tonne/yr Threshold category 1 400 tonne/yr Threshold category 2a 1 tonne/h Threshold category 2a 2000 tonne/yr Threshold category 2b 60000 MWH Threshold category 2b 20 MW Threshold category 2b

Banned and/or restricted

This product contains one or more substance(s) subject to prohibition, authorisation or restriction. Verify that requirements related to using, handling, and storing substances subject to prohibition, authorisation or restriction are met.

Chemical name	K - Carcinogen	Restricted substance
Chromic nitrate nonahydrate - 7789-02-8	-	For abrasive blasting at a concentration of >0.5% as Chromium except as specified for wet blasting For wet abrasive blasting
Antimony - 7440-36-0	-	For abrasive blasting at a concentration of >0.1%

International Inventories

AIC

NZIoC

TSCA

DSL/NDSL

EINECS/ELINCS

ENCS

IECSC

KECL

PICCS

TCSI

Contact supplier for inventory compliance status.

Contact supplier for inventory compliance status.

U.S. INVENTORY (TSCA): Listed on inventory. For purposes of 40 CFR 720.36, this product is for Research and Development (R&D) Use Only.

Contact supplier for inventory compliance status.

Contact supplier for inventory compliance status.

Contact supplier for inventory compliance status.

Contact supplier for inventory compliance status.

Contact supplier for inventory compliance status.

Contact supplier for inventory compliance status.

Contact supplier for inventory compliance status.

Legend:

AICS - Australian Inventory of Chemical Substances

NZIoC - New Zealand Inventory of Chemicals

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

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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 Chemicals Inventory
PICCS - Philippines Inventory of Chemicals and Chemical Substances

International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

Section 16: Any other relevant information

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Revision Note

The symbol (*) in the margin of this SDS indicates that this line has been revised.

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

List may include phrases which are not applicable to this product

ACGIH	American Conference of Governmental Industrial Hygienists
ADN	Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways (Europe)
ADR	Agreement concerning the International Carriage of Dangerous Goods by Road (Europe)
AIIC	Australian Inventory of Industrial Chemicals
ATE	Acute Toxicity Estimate
ASTM	American Society for the Testing of Materials
bar	Biological Reference Values for Chemical Compounds in the Work Area
BAT	Biological tolerance values for occupational exposure
BEL	Biological exposure limits
bw	Body weight
Ceiling	Maximum limit value
CMR	Carcinogen, Mutagen or Reproductive Toxicant
DOT	Department of Transportation (United States)
DSL	Domestic Substances List (Canada)
EmS	Emergency Schedule
ENCS	Existing and New Chemical Substances (Japan)
EPA	U.S. Environmental Protection Agency
GHS	Globally Harmonized System
IARC	International Agency for Research on Cancer
IATA	International Air Transport Association
IBC	International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk

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ICAO	International Civil Aviation Organisation
IECSC	Inventory of Existing Chemical Substances in China
IMDG	International Maritime Dangerous Goods
IMO	International Maritime Organization
ISO	International Organisation for Standardisation
KECI	Korean Existing Chemicals Inventory
LC50	Lethal Concentration to 50% of a test population
LD50	Lethal Dose to 50% of a test population (Median Lethal Dose)
MAK	Maximum Concentration at the Workplace
MARPOL	International Convention for the Prevention of Pollution from Ships
n.o.s.	Not Otherwise Specified
NOAEC	No Observed Adverse Effect Concentration
NOAEL	No Observed Adverse Effect Level
NOELR	No Observable Effect Loading Rate
NZIoC	New Zealand Inventory of Chemicals
OECD	Organisation for Economic Cooperation and Development
OEL	Occupational exposure limits
PBT	Persistent, Bioaccumulative and Toxic substance
PICCS	Philippines Inventory of Chemicals and Chemical Substances
PMT	Persistent, Mobile and Toxic
PPE	Personal protective equipment
QSAR	Quantitative Structure Activity Relationship
RID	Agreement concerning the International Carriage of Dangerous Goods by Rail (Europe)
SADT	Self-Accelerating Decomposition Temperature
SAR	Structure-activity relationship
SDS	Safety Data Sheet
SL	Surface Limit
STEL	Short Term Exposure Limit
STOT RE	Specific target organ toxicity - Repeated exposure
STOT SE	Specific target organ toxicity - Single exposure
TCSI	Taiwan Chemical Substance Inventory
TDG	Transport of Dangerous Goods (Canada)
TSCA	Toxic Substances Control Act (United States)
TWA	Time-Weighted Average
UN	United Nations
VOC	Volatile organic compounds
vPvB	Very Persistent and Very Bioaccumulative
vPvM	Very Persistent and Very Mobile
As	Allergenic substance
DS	Dermal Sensitiser
Ot	Ototoxicant
pOt	Ototoxicant - potential to cause hearing disorders
PS	Photosensitiser
RS	Respiratory Sensitiser
S	Sensitiser
poS	Sensitiser - capable of causing occupational asthma
Sa	Simple asphyxiant
Sd	Skin designation
pSd	Skin designation - potential for cutaneous absorption



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Sdv	Skin designation - vacated
Sk	Skin notation
dSk	Skin notation - danger of cutaneous absorption
pSk	Skin notation - potential for cutaneous absorption

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

U.S. Agency for Toxic Substances and Disease Registry (ATSDR)
U.S. Environmental Protection Agency ChemView Database
European Food Safety Authority (EFSA)
U.S. 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)
Japan National Institute of Technology and Evaluation (NITE)
Australia National Industrial Chemicals Notification and Assessment Scheme (NICNAS)
Australian Industrial Chemicals Introduction Scheme (AICIS)
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)
International Organization for Economic Co-operation and Development (OECD) Environment, Health, and Safety Publications
International Organization for Economic Co-operation and Development (OECD) High Production Volume Chemicals Program
International Organization for Economic Co-operation and Development (OECD) Screening Information Data Set
United Nations World Health Organization (WHO)

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End of Safety Data Sheet