

Safety Data Sheet

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Issue Date:	04/07/2021	Supersedes date:	06/10/2019

This Safety Data Sheet has been prepared in accordance with the New Zealand, Hazardous Substances (Safety Data Sheets) Notice 2017.

IDENTIFICATION:

1.1. Product identifier

3M(TM) Scotch-Weld(TM) Structural Plastic Adhesive DP8005 Off-White

Product Identification Numbers 62-2786-1445-8

1.2. Recommended use and restrictions on use

Recommended use

Adhesive

1.3. Supplier's details

Address:	3M New Zealand Ltd, 94 Apollo Drive, Rosedale 0632, Auckland
Telephone:	(09) 477 4040
E Mail:	innovation@nz.mmm.com
Website:	3m.co.nz

1.4. Emergency telephone number

24 hr Medical Emergency, National Poisons Centre, 0800 764 766 (0800 POISON)

This product is a kit or a multipart product which consists of multiple, independently packaged components. A Safety Data Sheet for each of these components is included. Please do not separate the component Safety Data Sheets from this cover page. The document numbers of the SDSs for components of this product are:

28-2521-4, 08-8284-5

One or more components of this KIT is classified as a hazardous substance in accordance with the relevant criteria of the HSNO Act 1996 and the Hazardous Substances (Hazard Classification) Notice 2020.

TRANSPORT INFORMATION

NOT HAZARDOUS FOR TRANSPORT

Revision information:

Complete document review.

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This Safety Data Sheet has been prepared in accordance with the New Zealand, Hazardous Substances (Safety Data Sheets) Notice 2017.

SECTION 1: Identification

1.1. Product identifier

3M(TM) Scotch-Weld(TM) Structural Plastic Adhesive DP8005 Off-White, Part B

1.2. Recommended use and restrictions on use

Recommended use

Adhesive

For Industrial or Professional use only

1.3. Supplier's details

Address:	3M New Zealand Ltd, 94 Apollo Drive, Rosedale 0632, Auckland
Telephone:	(09) 477 4040
E Mail:	innovation@nz.mmm.com
Website:	3m.co.nz

1.4. Emergency telephone number

24 hr Medical Emergency, National Poisons Centre, 0800 764 766 (0800 POISON)

SECTION 2: Hazard identification

Classified as hazardous in accordance with the relevant criteria of the HSNO Act 1996 and the Hazardous Substances (Hazard Classification) Notice 2020.

Refer to Section 14 of this Safety Data Sheet for product Dangerous Goods Classification.

2.1. Classification of the substance or mixture

Respiratory Sensitiser: Category 1 Skin Sensitizer: Category 1A. Carcinogenicity: Category 2 Reproductive Toxicity: Category 1B Chronic Aquatic Toxicity: Category 3

2.2. Label elements SIGNAL WORD Danger **Symbols:** Health Hazard |

Pictograms



HAZARD STATEMENTS:H334May cause allergy or asthma symptoms or breathing difficulties if inhaled.H317May cause an allergic skin reaction.H351Suspected of causing cancer.H360May damage fertility or the unborn child.H412Harmful to aquatic life with long lasting effects.

PRECAUTIONARY STATEMENTS

Prevention	
P201	Obtain special instructions before use.
P202	Do not handle until all safety precautions have been read and understood.
P261	Avoid breathing dust/fume/gas/mist/vapours/spray.
P272	Contaminated work clothing should not be allowed out of the workplace.
P273	Avoid release to the environment.
P280F	Wear respiratory protection.
P284	Wear respiratory protection.
Response	
P302 + P352	IF ON SKIN: Wash with plenty of soap and water.
P304 + P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
P308 + P313	IF exposed or concerned: Get medical advice/attention.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.
P342 + P311	If experiencing respiratory symptoms: Call a POISON CENTER or doctor/physician.
P362 + P364	Take off contaminated clothing and wash it before reuse.
Storage	
P405	Store locked up.
Disposal	
P501	Dispose of contents/container in accordance with applicable local/regional/national/international regulations.

SECTION 3: Composition/information on ingredients

Ingredient	CAS Nbr	% by Weight
Tetrahydrofurfuryl Methacrylate	2455-24-5	30 - 70
Acrylate Polymer	Trade Secret	10 - 30
2-Ethylhexyl Methacrylate	688-84-6	10 - 24
Butanoic acid, 3-oxo-, 2-[(2-methyl-1-oxo-2-propenyl)oxy]ethyl ester	21282-97-3	1 - 15
Glass Spheres	Trade Secret	1 - 10
Impact Modifier	20882-04-6	1 - 9
Succinic Anhydride	108-30-5	< 1

Tetrahydrofurfuryl Alcohol	97-99-4	< 1
Acetone	67-64-1	< 1
2-Hydroxyethyl Methacrylate	868-77-9	< 0.3
Methyl Methacrylate	80-62-6	< 0.3
Styrene	100-42-5	< 0.2
Maleic anhydride	108-31-6	< 0.002

SECTION 4: First aid measures

4.1. Description of first aid measures

Inhalation

Remove person to fresh air. If you feel unwell, get medical attention.

Skin contact

Immediately wash with soap and water. Remove contaminated clothing and wash before reuse. If signs/symptoms develop, get medical attention.

Eve contact

Flush with large amounts of water. Remove contact lenses if easy to do. Continue rinsing. If signs/symptoms persist, get medical attention.

If swallowed

Rinse mouth. If you feel unwell, get medical attention.

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

The most important symptoms and effects based on the CLP classification include:

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

Not applicable

SECTION 5: Fire-fighting measures

5.1. Suitable extinguishing media

In case of fire: Use a fire fighting agent suitable for ordinary combustible material such as water or foam to extinguish.

5.2. Special hazards arising from the substance or mixture

None inherent in this product.

Hazardous Decomposition or By-Products

<u>Substance</u>	<u>Condition</u>
Aldehydes.	During combustion.
Carbon monoxide.	During combustion.
Carbon dioxide.	During combustion.
Hydrogen cyanide.	During combustion.
Irritant vapours or gases.	During combustion.
Oxides of nitrogen.	During combustion.

5.3. Special protective actions for fire-fighters

Wear full protective clothing, including helmet, self-contained, positive pressure or pressure demand breathing apparatus, bunker coat and pants, bands around arms, waist and legs, face mask, and protective covering for exposed areas of the head.

5.4. Hazchem code: Not applicable.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Evacuate area. Ventilate the area with fresh air. For large spill, or spills in confined spaces, provide mechanical ventilation to disperse or exhaust vapors, in accordance with good industrial hygiene practice. Refer to other sections of this SDS for information regarding physical and health hazards, respiratory protection, ventilation, and personal protective equipment.

6.2. Environmental precautions

Avoid release to the environment. For larger spills, cover drains and build dykes to prevent entry into sewer systems or bodies of water.

6.3. Methods and material for containment and cleaning up

Contain spill. Working from around the edges of the spill inward, cover with bentonite, vermiculite, or commercially available inorganic absorbent material. Mix in sufficient absorbent until it appears dry. Remember, adding an absorbent material does not remove a physical, health, or environmental hazard. Collect as much of the spilled material as possible. Place in a closed container approved for transportation by appropriate authorities. Clean up residue with an appropriate solvent selected by a qualified and authorised person. Ventilate the area with fresh air. Read and follow safety precautions on the solvent label and Safety Data Sheet. Seal the container. Dispose of collected material as soon as possible in accordance with applicable local/regional/national/international regulations.

SECTION 7: Handling and storage

Refer to Section 15 - Controls for more information

7.1. Precautions for safe handling

For industrial/occupational use only. Not for consumer sale or use. Do not handle until all safety precautions have been read and understood. Do not breathe dust/fume/gas/mist/vapours/spray. Do not get in eyes, on skin, or on clothing. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Contaminated work clothing should not be allowed out of the workplace. Avoid release to the environment. Wash contaminated clothing before reuse. Use personal protective equipment (eg. gloves, respirators...) as required.

7.2. Conditions for safe storage including any incompatibilities

Store away from heat. Store away from acids.

7.3. Certified handler

Not required

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limits

If a component is disclosed in section 3 but does not appear in the table below, an occupational exposure limit is not available for the component.

Ingredient	CAS Nbr	Agency	Limit type	Additional comments
Styrene	100-42-5	ACGIH	TWA:10 ppm;STEL:20 ppm	A3: Confirmed animal carcin., Ototoxicant
Styrene	100-42-5	New Zealand WES	TWA(8 hours):85 mg/m3(20 ppm);STEL(15 minutes):170 mg/m3(40 ppm)	Class-subclass 6.7, carc HCB
Maleic anhydride	108-31-6	ACGIH	TWA(inhalable fraction and vapor):0.01 mg/m3	A4: Not class. as human carcin, Dermal/Respiratory

Sensitizer

3M(TM) Scotch-Weld(TM) Structural Plastic Adhesive DP8005 Off-White, Part B

Maleic anhydride	108-31-6	New Zealand WES	TWA(inhalable fraction and vapour)(8 hours):0.01 mg/m3(0.0025 ppm);TWA(8 hours):1 mg/m3(0.25 ppm)	Capable of csng resp/skin sens
Acetone	67-64-1	ACGIH	TWA:250 ppm;STEL:500 ppm	A4: Not class. as human carcinogin
Acetone	67-64-1	New Zealand WES	TWA(8 hours):1185 mg/m3(500 ppm);STEL(15 minutes):2375 mg/m3(1000 ppm)	-
Methyl Methacrylate	80-62-6	ACGIH	TWA:50 ppm;STEL:100 ppm	A4: Not class. as human carcin, Dermal Sensitizer
Methyl Methacrylate	80-62-6	New Zealand WES	TWA(8 hours):208 mg/m3(50 ppm);STEL(15 minutes):416 mg/m3(100 ppm)	Capable of csng resp/skin sens, SKIN
Tetrahydrofurfuryl Alcohol	97-99-4	AIHA	TWA:2 mg/m3(0.5 ppm)	
ACGIH : American Conference of Governi AIHA : American Industrial Hygiene Asso CMRG : Chemical Manufacturer's Recomm	ciation	50		

CMRG : Chemical Manufacturer's Recommended Guidelines

New Zealand WES : New Zealand Workplace Exposure Standards.

TWA: Time-Weighted-Average STEL: Short Term Exposure Limit

ppm: parts per million

mg/m³: milligrams per cubic metre CEIL: Ceiling

8.2. Exposure controls

8.2.1. Engineering controls

Use general dilution ventilation and/or local exhaust ventilation to control airborne exposures to below relevant Exposure Limits and/or control dust/fume/gas/mist/vapours/spray. If ventilation is not adequate, use respiratory protection equipment.

8.2.2. Personal protective equipment (PPE)

Eye/face protection

Select and use eye/face protection to prevent contact based on the results of an exposure assessment. The following eye/face protection(s) are recommended: Safety glasses with side shields.

Refer AS/NZS 1336 - Recommended practices for occupational eye protection and for performance specifications AS/NZS 1337, Parts 1 - 6 - Personal eye-protection.

Skin/hand protection

Select and use gloves and/or protective clothing approved to relevant local standards to prevent skin contact based on the results of an exposure assessment. Selection should be based on use factors such as exposure levels, concentration of the substance or mixture, frequency and duration, physical challenges such as temperature extremes, and other use conditions. Consult with your glove and/or protective clothing manufacturer for selection of appropriate compatible gloves/protective clothing. Note: Nitrile gloves may be worn over polymer laminate gloves to improve dexterity. Gloves made from the following material(s) are recommended: Polymer laminate

Respiratory protection

An exposure assessment may be needed to decide if a respirator is required. If a respirator is needed, use respirators as part of a full respiratory protection program. Based on the results of the exposure assessment, select from the following respirator type(s) to reduce inhalation exposure:

Half facepiece or full facepiece air-purifying respirator suitable for organic vapors and particulates

3M(TM) Scotch-Weld(TM) Structural Plastic Adhesive DP8005 Off-White, Part B

For questions about suitability for a specific application, consult with your respirator manufacturer.

Refer AS/NZS 1715 - Selection, use and maintenance of respiratory protective equipment and AS/NZS 1716 - Respiratory protective devices.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

intormation on basic physical and chemical properties		
Physical state	Liquid.	
Specific Physical Form:	Paste	
Colour	Off-White	
Odour	Mild Acrylic	
Odour threshold	No data available.	
рН	Not applicable.	
Melting point/Freezing point	Not applicable.	
Boiling point/Initial boiling point/Boiling range	>=82.2 °C	
Flash point	103.3 °C [Test Method:Closed Cup]	
Evaporation rate	No data available.	
Flammability (solid, gas)	Not applicable.	
Flammable Limits(LEL)	No data available.	
Flammable Limits(UEL)	No data available.	
Vapour pressure	<=13.3 Pa [@ 20 °C]	
Vapor Density and/or Relative Vapor DensityNo data available.		
Density	0.98 g/ml	
Relative density	0.98 [<i>Ref Std</i> :WATER=1]	
Water solubility	Slight (less than 10%)	
Solubility- non-water	No data available.	
Partition coefficient: n-octanol/water	No data available.	
Autoignition temperature	No data available.	
Decomposition temperature	No data available.	
Viscosity/Kinematic Viscosity	15,000 - 30,000 mPa-s	
Volatile organic compounds (VOC)		
Percent volatile		
VOC less H2O & exempt solvents	7.3 g/l [Details: when used as intended with Part A]	
VOC less H2O & exempt solvents	0.8 % [Details: when used as intended with Part A]	
VOC less H2O & exempt solvents	392 g/l [<i>Test Method</i> :calculated SCAQMD rule 443.1]	
	[Details:as supplied]	
Molecular weight	No data available.	
ÿ	1	

Nanoparticles

This material does not contain nanoparticles.

SECTION 10: Stability and reactivity

10.1 Reactivity

This material may be reactive with certain agents under certain conditions - see the remaining headings in this section

10.2 Chemical stability

Stable.

10.3 Possibility of hazardous reactions

Hazardous polymerisation will not occur.

10.4 Conditions to avoid Heat.

10.5 Incompatible materials Strong acids.

10.6 Hazardous decomposition products Substance

None known.

Condition

Refer to Section 5.2 for hazardous decomposition products during combustion.

SECTION 11: Toxicological information

The information below may not be consistent with the material classification in Section 2 if specific ingredient classifications are mandated by a competent authority. In addition, toxicological data on ingredients may not be reflected in the material classification and/or the signs and symptoms of exposure, because an ingredient may be present below the threshold for labelling, an ingredient may not be available for exposure, or the data may not be relevant to the material as a whole.

11.1 Information on Toxicological effects

Signs and Symptoms of Exposure

Based on test data and/or information on the components, this material may produce the following health effects:

Inhalation

Respiratory tract irritation: Signs/symptoms may include cough, sneezing, nasal discharge, headache, hoarseness, and nose and throat pain. Allergic respiratory reaction: Signs/symptoms may include difficulty breathing, wheezing, cough, and tightness of chest. May cause additional health effects (see below).

Skin contact

May be harmful in contact with skin.

Mild Skin Irritation: Signs/symptoms may include localized redness, swelling, itching, and dryness. Allergic skin reaction (non-photo induced): Signs/symptoms may include redness, swelling, blistering, and itching. May cause additional health effects (see below).

Eye contact

Contact with the eyes during product use is not expected to result in significant irritation.

Ingestion

Gastrointestinal irritation: Signs/symptoms may include abdominal pain, stomach upset, nausea, vomiting and diarrhoea. May cause additional health effects (see below).

Additional Health Effects:

Reproductive/Developmental Toxicity:

Contains a chemical or chemicals which can cause birth defects or other reproductive harm.

Carcinogenicity:

Contains a chemical or chemicals which can cause cancer.

Toxicological Data

If a component is disclosed in section 3 but does not appear in a table below, either no data are available for that endpoint or

the data are not sufficient for classification.

Acute Toxicity

Name	Route	Species	Value
Overall product	Dermal		No data available; calculated ATE2,000 - 5,000 mg/kg
Overall product	Ingestion		No data available; calculated ATE >5,000 mg/kg
Tetrahydrofurfuryl Methacrylate	Ingestion	Rat	LD50 4,000 mg/kg
Tetrahydrofurfuryl Methacrylate	Dermal	similar health hazards	LD50 estimated to be 2,000 - 5,000 mg/kg
2-Ethylhexyl Methacrylate	Dermal		LD50 estimated to be > 5,000 mg/kg
2-Ethylhexyl Methacrylate	Ingestion	Rat	LD50 > 2,000 mg/kg
Impact Modifier	Dermal		LD50 estimated to be 2,000 - 5,000 mg/kg
Impact Modifier	Ingestion		LD50 estimated to be 2,000 - 5,000 mg/kg
Acetone	Dermal	Rabbit	LD50 > 15,688 mg/kg
Acetone	Inhalation- Vapor (4 hours)	Rat	LC50 76 mg/l
Acetone	Ingestion	Rat	LD50 5,800 mg/kg
Succinic Anhydride	Dermal	Rat	LD50 > 2,000 mg/kg
Succinic Anhydride	Ingestion	Rat	LD50 1,510 mg/kg
2-Hydroxyethyl Methacrylate	Dermal	Rabbit	LD50 > 5,000 mg/kg
2-Hydroxyethyl Methacrylate	Ingestion	Rat	LD50 5,564 mg/kg
Tetrahydrofurfuryl Alcohol	Dermal	Professio nal judgeme nt	LD50 estimated to be 2,000 - 5,000 mg/kg
Tetrahydrofurfuryl Alcohol	Inhalation- Vapor (4 hours)	Rat	LC50 > 3.1 mg/l
Tetrahydrofurfuryl Alcohol	Ingestion	Rat	LD50 > 2,000 mg/kg
Methyl Methacrylate	Dermal	Rabbit	LD50 > 5,000 mg/kg
Methyl Methacrylate	Inhalation- Vapor (4 hours)	Rat	LC50 29 mg/l
Methyl Methacrylate	Ingestion	Rat	LD50 7,900 mg/kg
Styrene	Dermal	Rat	LD50 > 2,000 mg/kg
Styrene	Inhalation- Vapor (4 hours)	Rat	LC50 11.8 mg/l
Styrene	Ingestion	Rat	LD50 5,000 mg/kg
Maleic anhydride	Dermal	Rabbit	LD50 2,620 mg/kg
Maleic anhydride	Ingestion	Rat	LD50 1,030 mg/kg

ATE = acute toxicity estimate

Skin Corrosion/Irritation

Name	Species	Value
Tetrahydrofurfuryl Methacrylate	Rabbit	No significant irritation
2-Ethylhexyl Methacrylate	Rabbit	Minimal irritation
Impact Modifier	Not	Irritant
	applicabl	
	e	
Acetone	Mouse	Minimal irritation
Succinic Anhydride	In vitro	Corrosive
	data	
2-Hydroxyethyl Methacrylate	Rabbit	Minimal irritation
Tetrahydrofurfuryl Alcohol	Rabbit	No significant irritation
Methyl Methacrylate	Human	Mild irritant
	and	
	animal	
Styrene	Professio	Mild irritant

	nal judgemen t	
Maleic anhydride	Human and	Corrosive
	animal	

Serious Eye Damage/Irritation

Name	Species	Value
Tetrahydrofurfuryl Methacrylate	Rabbit	No significant irritation
2-Ethylhexyl Methacrylate	Rabbit	No significant irritation
Impact Modifier	Not	Severe irritant
	available	
Acetone	Rabbit	Severe irritant
Succinic Anhydride	similar	Corrosive
	health	
	hazards	
2-Hydroxyethyl Methacrylate	Rabbit	Moderate irritant
Tetrahydrofurfuryl Alcohol	Rabbit	Severe irritant
Methyl Methacrylate	Rabbit	Moderate irritant
Styrene	Professio	Moderate irritant
	nal	
	judgemen	
	t	
Maleic anhydride	Rabbit	Corrosive

Sensitisation:

Skin Sensitisation

Name	Species	Value
Tetrahydrofurfuryl Methacrylate	In vitro	Sensitising
	data	
2-Ethylhexyl Methacrylate	Guinea	Sensitising
	pig	
Impact Modifier	similar	Sensitising
	compoun	
	ds	
Succinic Anhydride	Mouse	Sensitising
2-Hydroxyethyl Methacrylate	Human	Sensitising
	and	
	animal	
Tetrahydrofurfuryl Alcohol	Mouse	Not classified
Methyl Methacrylate	Human	Sensitising
	and	
	animal	
Styrene	Guinea	Not classified
	pig	
Maleic anhydride	Multiple	Sensitising
	animal	
	species	

Respiratory Sensitisation

Name	Species	Value
Succinic Anhydride	similar	Sensitising
	compoun	
	ds	
Methyl Methacrylate	Human	Not classified
Maleic anhydride	Human	Sensitising

Germ Cell Mutagenicity

Name	Route	Value
Tetrahydrofurfuryl Methacrylate	In Vitro	Not mutagenic
Impact Modifier	In Vitro	Not mutagenic
Acetone	In vivo	Not mutagenic
Acetone	In Vitro	Some positive data exist, but the data are not sufficient for classification
Succinic Anhydride	In Vitro	Not mutagenic
2-Hydroxyethyl Methacrylate	In vivo	Not mutagenic
2-Hydroxyethyl Methacrylate	In Vitro	Some positive data exist, but the data are not sufficient for classification
Tetrahydrofurfuryl Alcohol	In Vitro	Not mutagenic
Methyl Methacrylate	In vivo	Not mutagenic
Methyl Methacrylate	In Vitro	Some positive data exist, but the data are not sufficient for classification
Styrene	In Vitro	Some positive data exist, but the data are not sufficient for classification
Styrene	In vivo	Some positive data exist, but the data are not sufficient for classification
Maleic anhydride	In vivo	Not mutagenic
Maleic anhydride	In Vitro	Some positive data exist, but the data are not sufficient for classification

Carcinogenicity

Name	Route	Species	Value
Acetone	Not	Multiple	Not carcinogenic
	specified.	animal	
		species	
Succinic Anhydride	Ingestion	Multiple	Not carcinogenic
		animal	
		species	
Methyl Methacrylate	Ingestion	Rat	Not carcinogenic
Methyl Methacrylate	Inhalation	Human	Not carcinogenic
		and	
		animal	
Styrene	Ingestion	Mouse	Carcinogenic.
Styrene	Inhalation	Human	Carcinogenic.
•		and	
		animal	

Reproductive Toxicity

Reproductive and/or Developmental Effects

Name	Route	Value	Species	Test result	Exposure Duration
Tetrahydrofurfuryl Methacrylate	Ingestion	Not classified for male reproduction	Rat	NOAEL 300 mg/kg/day	29 days
Tetrahydrofurfuryl Methacrylate	Ingestion	Toxic to female reproduction	Rat	NOAEL 120 mg/kg/day	premating into lactation
Tetrahydrofurfuryl Methacrylate	Ingestion	Toxic to development	Rat	NOAEL 120 mg/kg/day	premating into lactation
Acetone	Ingestion	Not classified for male reproduction	Rat	NOAEL 1,700 mg/kg/day	13 weeks
Acetone	Inhalation	Not classified for development	Rat	NOAEL 5.2 mg/l	during organogenesis
2-Hydroxyethyl Methacrylate	Ingestion	Not classified for female reproduction	Rat	NOAEL 1,000 mg/kg/day	premating & during gestation
2-Hydroxyethyl Methacrylate	Ingestion	Not classified for male reproduction	Rat	NOAEL 1,000 mg/kg/day	49 days
2-Hydroxyethyl Methacrylate	Ingestion	Not classified for development	Rat	NOAEL 1,000 mg/kg/day	premating & during gestation

Tetrahydrofurfuryl Alcohol	Ingestion	Toxic to female reproduction	Rat	NOAEL 50 mg/kg/day	premating into lactation
Tetrahydrofurfuryl Alcohol	Dermal	Toxic to male reproduction	Rat	NOAEL 100 mg/kg/day	13 weeks
Tetrahydrofurfuryl Alcohol	Ingestion	Toxic to male reproduction	Rat	NOAEL 150 mg/kg/day	47 days
Tetrahydrofurfuryl Alcohol	Inhalation	Toxic to male reproduction	Rat	NOAEL 0.6 mg/l	90 days
Tetrahydrofurfuryl Alcohol	Ingestion	Toxic to development	Rat	NOAEL 50 mg/kg/day	premating into lactation
Methyl Methacrylate	Inhalation	Not classified for male reproduction	Mouse	NOAEL 36.9 mg/l	
Methyl Methacrylate	Inhalation	Not classified for development	Rat	NOAEL 8.3 mg/l	during organogenesis
Styrene	Ingestion	Not classified for female reproduction	Rat	NOAEL 21 mg/kg/day	3 generation
Styrene	Inhalation	Not classified for female reproduction	Rat	NOAEL 2.1 mg/l	2 generation
Styrene	Inhalation	Not classified for male reproduction	Rat	NOAEL 2.1 mg/l	2 generation
Styrene	Ingestion	Not classified for male reproduction	Rat	NOAEL 400 mg/kg/day	60 days
Styrene	Ingestion	Not classified for development	Rat	NOAEL 400 mg/kg/day	during gestation
Styrene	Inhalation	Not classified for development	Multiple animal species	NOAEL 2.1 mg/l	during gestation
Maleic anhydride	Ingestion	Not classified for female reproduction	Rat	NOAEL 55 mg/kg/day	2 generation
Maleic anhydride	Ingestion	Not classified for male reproduction	Rat	NOAEL 55 mg/kg/day	2 generation
Maleic anhydride	Ingestion	Not classified for development	Rat	NOAEL 140 mg/kg/day	during organogenesis

Target Organ(s)

Specific Target Organ Toxicity - single exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Impact Modifier	Inhalation	respiratory irritation	Some positive data exist, but the data are not sufficient for classification		NOAEL Not available	
Acetone	Inhalation	central nervous system depression	May cause drowsiness or dizziness	Human	NOAEL Not available	
Acetone	Inhalation	respiratory irritation	Some positive data exist, but the data are not sufficient for classification	Human	NOAEL Not available	
Acetone	Inhalation	immune system	Not classified	Human	NOAEL 1.19 mg/l	6 hours
Acetone	Inhalation	liver	Not classified	Guinea pig	NOAEL Not available	
Acetone	Ingestion	central nervous system depression	May cause drowsiness or dizziness	Human	NOAEL Not available	poisoning and/or abuse
Succinic Anhydride	Inhalation	respiratory irritation	May cause respiratory irritation	similar health hazards	NOAEL Not available	
Tetrahydrofurfuryl Alcohol	Inhalation	respiratory irritation	Some positive data exist, but the data are not sufficient for classification	similar health hazards	NOAEL Not available	
Methyl Methacrylate	Inhalation	respiratory irritation	May cause respiratory irritation	Human	NOAEL Not available	occupational exposure
Styrene	Inhalation	auditory system	Causes damage to organs	Multiple animal species	LOAEL 4.3 mg/l	not available
Styrene	Inhalation	liver	Causes damage to organs	Mouse	LOAEL 2.1 mg/l	not available

Styrene	Inhalation	central nervous system depression	May cause drowsiness or dizziness	Human	NOAEL Not available	occupational exposure
Styrene	Inhalation	respiratory irritation	May cause respiratory irritation	Human and animal	NOAEL Not available	
Styrene	Inhalation	endocrine system	Not classified	Rat	NOAEL Not available	not available
Styrene	Inhalation	kidney and/or bladder	Not classified	Multiple animal species	NOAEL 2.1 mg/l	not available
Maleic anhydride	Inhalation	respiratory irritation	May cause respiratory irritation	Human	NOAEL Not available	

Specific Target Organ Toxicity - repeated exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Tetrahydrofurfuryl Methacrylate	Ingestion	hematopoietic system nervous system	Not classified	Rat	NOAEL 300 mg/kg/day	29 days
Acetone	Dermal	eyes	Not classified	Guinea pig	NOAEL Not available	3 weeks
Acetone	Inhalation	hematopoietic system	Not classified	Human	NOAEL 3 mg/l	6 weeks
Acetone	Inhalation	immune system	Not classified	Human	NOAEL 1.19 mg/l	6 days
Acetone	Inhalation	kidney and/or bladder	Not classified	Guinea pig	NOAEL 119 mg/l	not available
Acetone	Inhalation	heart liver	Not classified	Rat	NOAEL 45 mg/l	8 weeks
Acetone	Ingestion	kidney and/or bladder	Not classified	Rat	NOAEL 900 mg/kg/day	13 weeks
Acetone	Ingestion	heart	Not classified	Rat	NOAEL 2,500 mg/kg/day	13 weeks
Acetone	Ingestion	hematopoietic system	Not classified	Rat	NOAEL 200 mg/kg/day	13 weeks
Acetone	Ingestion	liver	Not classified	Mouse	NOAEL 3,896 mg/kg/day	14 days
Acetone	Ingestion	eyes	Not classified	Rat	NOAEL 3,400 mg/kg/day	13 weeks
Acetone	Ingestion	respiratory system	Not classified	Rat	NOAEL 2,500 mg/kg/day	13 weeks
Acetone	Ingestion	muscles	Not classified	Rat	NOAEL 2,500 mg/kg	13 weeks
Acetone	Ingestion	skin bone, teeth, nails, and/or hair	Not classified	Mouse	NOAEL 11,298 mg/kg/day	13 weeks
Succinic Anhydride	Ingestion	heart skin endocrine system bone, teeth, nails, and/or hair hematopoietic system liver immune system nervous system kidney and/or bladder respiratory system	Not classified	Mouse	NOAEL 300 mg/kg/day	13 weeks
Tetrahydrofurfuryl Alcohol	Inhalation	nervous system	Causes damage to organs through prolonged or repeated exposure	Rat	LOAEL 0.2 mg/l	90 days
Tetrahydrofurfuryl Alcohol	Inhalation	hematopoietic system	Some positive data exist, but the data are not sufficient for classification	Rat	NOAEL 0.6 mg/l	90 days
Tetrahydrofurfuryl	Inhalation	eyes	Not classified	Rat	NOAEL 2.1	90 days

Alcohol					mg/l	
Tetrahydrofurfuryl Alcohol	Ingestion	hematopoietic system	Some positive data exist, but the data are not sufficient for classification	Rat	NOAEL 69 mg/kg/day	91 days
Tetrahydrofurfuryl Alcohol	Ingestion	immune system	Some positive data exist, but the data are not sufficient for classification	Rat	NOAEL 150 mg/kg/day	28 days
Tetrahydrofurfuryl Alcohol	Ingestion	endocrine system kidney and/or bladder	Not classified	Rat	NOAEL 600 mg/kg/day	28 days
Tetrahydrofurfuryl Alcohol	Ingestion	liver eyes	Not classified	Rat	NOAEL 781 mg/kg/day	91 days
Tetrahydrofurfuryl Alcohol	Ingestion	heart nervous system	Not classified	Rat	NOAEL 600 mg/kg/day	28 days
Methyl Methacrylate	Dermal	peripheral nervous system	Not classified	Human	NOAEL Not available	occupational exposure
Methyl Methacrylate	Inhalation	olfactory system	Causes damage to organs through prolonged or repeated exposure	Human	NOAEL Not available	occupational exposure
Methyl Methacrylate	Inhalation	kidney and/or bladder	Not classified	Multiple animal species	NOAEL Not available	14 weeks
Methyl Methacrylate	Inhalation	liver	Not classified	Mouse	NOAEL 12.3 mg/l	14 weeks
Methyl Methacrylate	Inhalation	respiratory system	Not classified	Human	NOAEL Not available	occupational exposure
Styrene	Inhalation	auditory system	Causes damage to organs through prolonged or repeated exposure	Human	NOAEL not available	occupational exposure
Styrene	Inhalation	eyes	Causes damage to organs through prolonged or repeated exposure	Human	NOAEL Not available	occupational exposure
Styrene	Inhalation	liver	May cause damage to organs though prolonged or repeated exposure	Mouse	LOAEL 0.85 mg/l	13 weeks
Styrene	Inhalation	nervous system	Some positive data exist, but the data are not sufficient for classification	Multiple animal species	LOAEL 1.1 mg/l	not available
Styrene	Inhalation	hematopoietic system	Not classified	Rat	NOAEL 0.85 mg/l	7 days
Styrene	Inhalation	endocrine system	Not classified	Rat	NOAEL 0.6 mg/l	10 days
Styrene	Inhalation	respiratory system	Not classified	Multiple animal species	LOAEL 0.09 mg/l	not available
Styrene	Inhalation	heart gastrointestinal tract bone, teeth, nails, and/or hair muscles kidney and/or bladder	Not classified	Multiple animal species	NOAEL 4.3 mg/l	2 years
Styrene	Ingestion	nervous system	Some positive data exist, but the data are not sufficient for classification	Rat	LOAEL 500 mg/kg/day	8 weeks
Styrene	Ingestion	immune system	Some positive data exist, but the data are not sufficient for classification	Multiple animal species	NOAEL Not available	not available
Styrene	Ingestion	liver kidney and/or bladder	Not classified	Rat	NOAEL 677 mg/kg/day	6 months
Styrene	Ingestion	hematopoietic system	Not classified	Dog	NOAEL 600 mg/kg/day	470 days
Styrene	Ingestion	heart respiratory system	Not classified	Rat	NOAEL 35 mg/kg/day	105 weeks
Maleic anhydride	Inhalation	respiratory system	Causes damage to organs through prolonged or repeated exposure	Rat	LOAEL 0.0011 mg/l	6 months
Maleic anhydride	Inhalation	endocrine system hematopoietic system nervous system kidney and/or bladder heart liver eyes	Not classified	Rat	NOAEL 0.0098 mg/l	6 months

Maleic anhydride	Ingestion	kidney and/or bladder	Some positive data exist, but the data are not sufficient for classification	Rat	NOAEL 55 mg/kg/day	80 days
Maleic anhydride	Ingestion	liver	Some positive data exist, but the data are not sufficient for classification	Rat	LOAEL 250 mg/kg/day	183 days
Maleic anhydride	Ingestion	heart nervous system	Not classified	Rat	NOAEL 600 mg/kg/day	183 days
Maleic anhydride	Ingestion	gastrointestinal tract	Not classified	Rat	NOAEL 150 mg/kg/day	80 days
Maleic anhydride	Ingestion	hematopoietic system	Not classified	Dog	NOAEL 60 mg/kg/day	90 days
Maleic anhydride	Ingestion	skin endocrine system immune system eyes respiratory system	Not classified	Rat	NOAEL 150 mg/kg/day	80 days

Aspiration Hazard

Name	Value
Styrene	Aspiration hazard

Please contact the address or phone number listed on the first page of the SDS for additional toxicological information on this material and/or its components.

SECTION 12: Ecological information

The information below may not be consistent with the material classification in Section 2 if specific ingredient classifications are mandated by a competent authority. Additional information leading to material classification in Section 2 is available upon request. In addition, environmental fate and effects data on ingredients may not be reflected in this section because an ingredient is present below the threshold for labelling, an ingredient is not expected to be available for exposure, or the data is considered not relevant to the material as a whole.

12.1. Toxicity

Ecotoxic to the aquatic environment.

Acute Aquatic Toxicity: Category 3 (HSNO 9.1D Aquatic toxicity) Chronic Aquatic Toxicity: Category 3 (HSNO 9.1C Aquatic toxicity)

No product test data available.

Material	CAS Number	Organism	Туре	Exposure	Test endpoint	Test result
Tetrahydrofurf uryl	2455-24-5	Fathead minnow	Experimental	96 hours	LC50	34.7 mg/l
Methacrylate						
Tetrahydrofurf uryl Methacrylate	2455-24-5	Green algae	Experimental	72 hours	EC50	>100 mg/l
Tetrahydrofurf uryl Methacrylate	2455-24-5	Green algae	Experimental	72 hours	EC10	100 mg/l
Tetrahydrofurf uryl Methacrylate	2455-24-5	Water flea	Experimental	21 days	NOEC	37.2 mg/l
Acrylate Polymer	Trade Secret		Data not available or insufficient for classification			N/A
2-Ethylhexyl Methacrylate	688-84-6	Green Algae	Experimental	72 hours	EC50	5.3 mg/l

3M(TM) Scotch-Weld(TM) Structural Plastic Adhesive DP8005 Off-White, Part B

		h c 1 1	E 1 1		1.050	
2-Ethylhexyl	688-84-6	Medaka	Experimental	96 hours	LC50	2.8 mg/l
Methacrylate	688-84-6	Watan flag	E-m anima amtal	40 1	EC50	4.6
2-Ethylhexyl Methacrylate	088-84-0	Water flea	Experimental	48 hours	EC30	4.6 mg/l
2-Ethylhexyl	688-84-6	Green Algae	Experimental	72 hours	NOEC	0.81 mg/l
Methacrylate	088-84-0	Gleen Algae	Experimental	72 110015	NOEC	0.01 mg/1
2-Ethylhexyl	688-84-6	Water flea	Experimental	21 days	NOEC	0.105 mg/l
Methacrylate	000-04-0	water nea	Experimental	21 uays	NOLC	0.105 mg/1
Butanoic acid,	21282-97-3	Activated	Experimental	3 hours	NOEC	320 mg/l
3-oxo-, 2-[(2-	21202 77 5	sludge	Experimental	5 110015	NOLC	520 1115/1
methyl-1-oxo-		siddge				
2-						
propenyl)oxy]e						
thyl ester						
Butanoic acid,	21282-97-3	Green Algae	Experimental	72 hours	EC50	>100 mg/l
3-oxo-, 2-[(2-			1			
methyl-1-oxo-						
2-						
propenyl)oxy]e						
thyl ester						
Butanoic acid,	21282-97-3	Rainbow trout	Experimental	96 hours	LC50	>100 mg/l
3-oxo-, 2-[(2-						
methyl-1-oxo-						
2-						
propenyl)oxy]e						
thyl ester	21202.07.2		F · / 1	40.1		> 100 /1
Butanoic acid,	21282-97-3	Water flea	Experimental	48 hours	EL50	>100 mg/l
3-oxo-, 2-[(2-						
methyl-1-oxo- 2-						
propenyl)oxy]e						
thyl ester						
Butanoic acid,	21282-97-3	Green Algae	Experimental	72 hours	NOEC	11.1 mg/l
3-oxo-, 2-[(2-	21202 97 5	Green ringue	Experimental	72 110415	NOLC	
methyl-1-oxo-						
2-						
propenyl)oxy]e						
thyl ester						
Impact	20882-04-6	Green algae	Estimated	72 hours	EC50	710 mg/l
Modifier						
Impact	20882-04-6	Medaka	Estimated	96 hours	LC50	227 mg/l
Modifier						
Impact	20882-04-6	Water flea	Estimated	48 hours	EC50	380 mg/l
Modifier					1	
Impact	20882-04-6	Green algae	Estimated	72 hours	NOEC	160 mg/l
Modifier						
Impact	20882-04-6	Water flea	Estimated	21 days	NOEC	24.1 mg/l
Modifier						
Acetone	67-64-1	Algae other	Experimental	96 hours	EC50	11,493 mg/l
Acetone	67-64-1	Crustecea other	Experimental	24 hours	LC50	2,100 mg/l
Acetone	67-64-1	Rainbow trout	Experimental	96 hours	LC50	5,540 mg/l
Acetone	67-64-1	Water flea	Experimental	21 days	NOEC	1,000 mg/l
Acetone	67-64-1	Bacteria	Experimental	16 hours	NOEC	1,700 mg/l
Acetone	67-64-1	Redworm	Experimental	48 hours	LC50	>100

Succinic	108-30-5	Green Algae	Estimated	72 hours	EC50	>100 mg/l
Anhydride						
Succinic Anhydride	108-30-5	Water flea	Estimated	48 hours	EC50	>100 mg/l
Succinic Anhydride	108-30-5	Zebra Fish	Estimated	96 hours	LC50	>100 mg/l
Succinic Anhydride	108-30-5	Green Algae	Estimated	72 hours	NOEC	100 mg/l
Tetrahydrofurf uryl Alcohol	97-99-4	Green Algae	Experimental	72 hours	EC50	>100 mg/l
Tetrahydrofurf uryl Alcohol	97-99-4	Medaka	Experimental	96 hours	LC50	>100 mg/l
Tetrahydrofurf uryl Alcohol	97-99-4	Water flea	Experimental	48 hours	EC50	>100 mg/l
	97-99-4	Green Algae	Experimental	72 hours	NOEC	>100 mg/l
Tetrahydrofurf uryl Alcohol	97-99-4	Water flea	Experimental	21 days	NOEC	>100 mg/l
2- Hydroxyethyl Methacrylate	868-77-9	Turbot	Analogous Compound	96 hours	LC50	833 mg/l
2- Hydroxyethyl Methacrylate	868-77-9	Fathead minnow	Experimental	96 hours	LC50	227 mg/l
2- Hydroxyethyl Methacrylate	868-77-9	Green algae	Experimental	72 hours	EC50	710 mg/l
2- Hydroxyethyl Methacrylate	868-77-9	Water flea	Experimental	48 hours	EC50	380 mg/l
2- Hydroxyethyl Methacrylate	868-77-9	Green Algae	Experimental	72 hours	NOEC	160 mg/l
2- Hydroxyethyl Methacrylate	868-77-9	Water flea	Experimental	21 days	NOEC	24.1 mg/l
2- Hydroxyethyl Methacrylate	868-77-9		Experimental	16 hours	EC0	>3,000 mg/l
2- Hydroxyethyl Methacrylate	868-77-9		Experimental	18 hours	LD50	<98 mg per kg of bodyweight
Methyl Methacrylate	80-62-6	Green Algae	Experimental	72 hours	EC50	>110 mg/l
Methyl Methacrylate	80-62-6	Rainbow trout	Experimental	96 hours	LC50	>79 mg/l
Methyl Methacrylate	80-62-6	Water flea	Experimental	48 hours	EC50	69 mg/l
Methyl Methacrylate	80-62-6	Green algae	Experimental	72 hours	NOEC	110 mg/l
Methyl Methacrylate	80-62-6	Water flea	Experimental	21 days	NOEC	37 mg/l
Methyl Methacrylate	80-62-6	Activated sludge	Experimental	30 minutes	EC20	150 mg/l

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Methyl Methacrylate	80-62-6	Soil microbes	Experimental	28 days	NOEC	>1,000 mg/kg (Dry Weight)
Styrene	100-42-5	Activated sludge	Experimental	30 minutes	EC50	500 mg/l
Styrene	100-42-5	Fathead minnow	Experimental	96 hours	LC50	4.02 mg/l
Styrene	100-42-5	Green Algae	Experimental	72 hours	EC50	4.9 mg/l
Styrene	100-42-5	Water flea	Experimental	48 hours	EC50	4.7 mg/l
Styrene	100-42-5	Green algae	Experimental	96 hours	EC10	0.28 mg/l
Styrene	100-42-5	Water flea	Experimental	21 days	NOEC	1.01 mg/l
Maleic anhydride	108-31-6	Green algae	Estimated	72 hours	EC50	74.4 mg/l
Maleic anhydride	108-31-6	Water flea	Estimated	48 hours	EC50	93.8 mg/l
Maleic anhydride	108-31-6	Bacteria	Experimental	18 hours	EC10	44.6 mg/l
Maleic anhydride	108-31-6	Rainbow trout	Experimental	96 hours	LC50	75 mg/l
Maleic anhydride	108-31-6	Green algae	Estimated	72 hours	EC10	11.8 mg/l
Maleic anhydride	108-31-6	Water flea	Experimental	21 days	NOEC	10 mg/l

12.2. Persistence and degradability

Material	CAS Number	Test type	Duration	Study Type	Test result	Protocol
Tetrahydrofurf uryl Methacrylate	2455-24-5	Experimental Biodegradation	28 days	BOD	75 % BOD/ThBOD	OECD 301F - Manometric respirometry
Acrylate Polymer	Trade Secret	Data not availbl- insufficient			N/A	
2-Ethylhexyl Methacrylate	688-84-6	Experimental Biodegradation	28 days	BOD	88 % BOD/ThBOD	OECD 301C - MITI test (I)
Butanoic acid, 3-oxo-, 2-[(2- methyl-1-oxo- 2- propenyl)oxy]e thyl ester	21282-97-3	Experimental Hydrolysis		Hydrolytic half-life	6.5 days (t 1/2)	Non-standard method
Butanoic acid, 3-oxo-, 2-[(2- methyl-1-oxo- 2- propenyl)oxy]e thyl ester	21282-97-3	Experimental Biodegradation	28 days	BOD	64 % BOD/ThBOD	OECD 301C - MITI test (I)
Impact Modifier	20882-04-6	Estimated Biodegradation	14 days	BOD	95 % weight	OECD 301C - MITI test (I)
Acetone	67-64-1	Experimental Photolysis		Photolytic half- life (in air)	147 days (t 1/2)	
Acetone	67-64-1	Experimental Biodegradation	28 days	BOD	78 % BOD/ThBOD	OECD 301D - Closed bottle test
Succinic Anhydride	108-30-5	Experimental Hydrolysis		Hydrolytic half-life	4.3 minutes (t 1/2)	Non-standard method

Succinic	108-30-5	Estimated	28 days	Dissolv.	96.55 % weight	OECD 301E - Modif.
Anhydride		Biodegradation		Organic		OECD Screen
				Carbon Deplet		
Tetrahydrofurf	97-99-4	Experimental	28 days	BOD	92 % weight	OECD 301C - MITI
uryl Alcohol		Biodegradation				test (I)
2-	868-77-9	Experimental		Hydrolytic	10.9 days (t	OECD 111 Hydrolysis
Hydroxyethyl		Hydrolysis		half-life (pH	1/2)	func of pH
Methacrylate				10)		
2-	868-77-9	Experimental	28 days	BOD	84 %BOD/CO	OECD 301D - Closed
Hydroxyethyl		Biodegradation			D	bottle test
Methacrylate						
Methyl	80-62-6	Experimental	14 days	BOD	94 %	OECD 301C - MITI
Methacrylate		Biodegradation			BOD/ThBOD	test (I)
Styrene	100-42-5	Experimental		Photolytic half-	6.64 hours (t	Non-standard method
-		Photolysis		life (in air)	1/2)	
Styrene	100-42-5	Experimental	28 days	BOD	70.9 %	Non-standard method
		Biodegradation	-		BOD/ThBOD	
Maleic	108-31-6	Experimental		Hydrolytic	22 seconds (t	Non-standard method
anhydride		Hydrolysis		half-life	1/2)	
Maleic	108-31-6	Estimated	25 days	CO2 evolution	>90 % weight	OECD 301B - Modified
anhydride		Biodegradation	-			sturm or CO2

12.3 : Bioaccumulative potential

Material	CAS Number	Test type	Duration	Study Type	Test result	Protocol
Tetrahydrofurf uryl Methacrylate	2455-24-5	Estimated Bioconcentrati on		Bioaccumulatio n factor	3.42	Estimated: Bioconcentration factor
Acrylate Polymer	Trade Secret	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
2-Ethylhexyl Methacrylate	688-84-6	Experimental Bioconcentrati on	96 hours	Bioaccumulatio n factor	37	OECD 305C-Bioaccum degree fish
Butanoic acid, 3-oxo-, 2-[(2- methyl-1-oxo- 2- propenyl)oxy]e thyl ester	21282-97-3	Experimental Bioconcentrati on		Log Kow	0.9	Non-standard method
Impact Modifier	20882-04-6	Estimated Bioconcentrati on		Bioaccumulatio n factor	3.0	Estimated: Bioconcentration factor
Acetone	67-64-1	Experimental BCF - Other		Bioaccumulatio n factor	0.65	
Acetone	67-64-1	Experimental Bioconcentrati on		Log Kow	-0.24	
Succinic Anhydride	108-30-5	Experimental Bioconcentrati on		Log Kow	2.44	Non-standard method
Tetrahydrofurf uryl Alcohol	97-99-4	Experimental Bioconcentrati		Log Kow	-0.11	Non-standard method

		on			
2- Hydroxyethyl Methacrylate	868-77-9	Experimental Bioconcentrati on	Log Kow	0.42	OECD 107 log Kow shke flsk mtd
Methyl Methacrylate	80-62-6	Experimental Bioconcentrati on	Log Kow	1.38	OECD 107 log Kow shke flsk mtd
Styrene	100-42-5	Experimental Bioconcentrati on	Log Kow	2.96	Non-standard method
Maleic anhydride	108-31-6	Experimental Bioconcentrati on	Log Kow	-2.61	Non-standard method

12.4. Mobility in soil

Please contact manufacturer for more details

12.5 Other adverse effects

No information available.

SECTION 13: Disposal considerations

13.1. Disposal methods

In accordance with the Hazardous Substances (Disposal) Notice 2017 and the relevant criteria of the HSNO Act 1996.

Dispose of completely cured (or polymerized) material in a permitted industrial waste facility. As a disposal alternative, incinerate uncured product in a permitted waste incineration facility. Proper destruction may require the use of additional fuel during incineration processes. Empty drums/barrels/containers used for transporting and handling hazardous chemicals (chemical substances/mixtures/preparations classified as Hazardous as per applicable regulations) shall be considered, stored, treated & disposed of as hazardous wastes unless otherwise defined by applicable waste regulations. Consult with the respective regulating authorities to determine the available treatment and disposal facilities.

Packaging (that may or may not contain any residual substance) may be lawfully disposed of by householders or other consumers through public or commercial waste collection services.

SECTION 14: Transport Information

New Zealand Land Transport Rule: Dangerous Goods - Road/Rail Transport

UN No.: Not applicable. Proper Shipping Name: Not applicable. Class/Division: Not applicable. Sub Risk: Not applicable. Packing Group: Not applicable.

Hazchem Code: Not applicable. IERG: Not applicable.

International Air Transport Association (IATA) - Air Transport UN No.: Not applicable. Proper Shipping Name: Not applicable. Class/Division: Not applicable. Sub Risk: Not applicable. Packing Group: Not applicable.

International Maritime Dangerous Goods Code (IMDG) - Marine Transport UN No.: Not applicable. Proper Shipping Name: Not applicable. Class/Division: Not applicable. Sub Risk: Not applicable. Packing Group: Not applicable. Marine Pollutant: Not applicable.

SECTION 15: Regulatory information

HSNO Approval numberHSR002679Group standard nameSurface Coatings and Colourants (Carcinogenic) Group Standard 2020HSNO Hazard classificationRefer to Section 2: Hazard identification

NZ Inventory of Chemicals (NZIoC) Status

All applicable chemical ingredients in this material are in compliance with NZIoC listing requirements.

Controls in accordance with The Health and Safety at Work Act 2015, Health and Safety at Work (Hazardous Substances) Regulations 2017 and the HSNO Act 1996, Hazardous Substances (Hazardous Property Controls) Notice 2017

2017	
Certified handler	Not required
Location Compliance Certificate	Not required
Hazardous atmosphere zone	Not required
Fire extinguishers	Not required
Emergency response plan	100 L or 100 kg (for Hazardous to the aquatic environment Category 1 substances); or 1 000 L or 1 000 kg (for Acute toxicity Category 4, Skin sensitisation Category 1, Respiratory sensitisation Category 1, Hazardous to the aquatic environment Category 2 or Hazardous to the aquatic environment Category 3 substances); or 10 000 L or 10 000 kg (for all other substances)
Secondary containment	100 L or 100 kg (for Hazardous to the aquatic environment Category 1 substances); or 1 000 L or 1 000 kg (for Acute toxicity Category 4, Skin sensitisation Category 1, Respiratory sensitisation Category 1, Hazardous to the aquatic environment Category 2 or Hazardous to the aquatic environment Category 3 substances); or 10 000 L or 10 000 kg (for all other substances)
Tracking	Not required
Warning signage	100 L or 100 kg (for Hazardous to the aquatic environment Category 1 substances); or 1 000 L or 1 000 kg (for Serious eye damage Category 1, Hazardous to the aquatic environment Category 2 or Hazardous to the aquatic environment Category 3 substances); or 10 000 L or 10 000 kg (for Acute toxicity Category 4 or Hazardous to the aquatic environment Category 4 substances)

SECTION 16: Other information

Revision information:

Complete document review.

Document group:	28-2521-4	Version number:	4.00
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Key to abbreviations and acronyms

GHS refers to the Globally Harmonised System of Classification and Labelling of Chemicals, 7th revised edition of 2017 **HSNO** means Hazardous Substances and New Organisms Act 1996 The information in this Safety Data Sheet (SDS) is believed to be correct as of the date of issue. TO THE EXTENT PERMITTED BY LAW, 3M MAKES NO WARRANTY, EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, ANY IMPLIED WARRANTY, OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR COURSE OF PERFORMANCE OR USAGE OF TRADE. User is responsible for determining whether the 3M product is fit for a particular purpose and suitable for user's method of use or application. Given the variety of factors that can affect the use and application of a 3M product, some of which are uniquely within the user's knowledge and control, it is essential that the user evaluates the 3M product to determine whether it is fit for a particular purpose and suitable for user's method of use or application. 3M provides information in electronic form as a service to customers. Due to the remote possibility of electronic transfer may have resulted in errors, omissions or alterations in this information; 3M makes no representations as to its completeness or accuracy. In addition, information obtained from a database may not be as current as the information in the SDS available directly from 3M.

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Safety Data Sheet

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Issue Date:	03/07/2023	Supersedes date:	06/10/2019

This Safety Data Sheet has been prepared in accordance with the New Zealand, Hazardous Substances (Safety Data Sheets) Notice 2017.

SECTION 1: Identification

1.1. Product identifier

3M[™] Scotch-Weld[™] Structural Plastic Adhesive DP8005 Off-White and Structural Plastic Adhesive 8005 Off-White, Part A

1.2. Recommended use and restrictions on use

Recommended use

Structural adhesive.

For Industrial or Professional use only

1.3. Supplier's details

Address:3M New Zealand Ltd, 94 Apollo Drive, Rosedale 0632, AucklandTelephone:(09) 477 4040E Mail:innovation@nz.mmm.comWebsite:3m.co.nz

1.4. Emergency telephone number

24 hr Medical Emergency, National Poisons Centre, 0800 764 766 (0800 POISON)

SECTION 2: Hazard identification

Classified as hazardous in accordance with the relevant criteria of the HSNO Act 1996 and the Hazardous Substances (Hazard Classification) Notice 2020.

Refer to Section 14 of this Safety Data Sheet for product Dangerous Goods Classification.

2.1. Classification of the substance or mixture

Flammable Liquids Category 4 Serious Eye Damage Category 1 Respiratory Sensitisation Category 1 Skin Sensitisation Category 1 Germ Cell Mutagenicity Category 2 Hazardous to the aquatic environment chronic Category 2

2.2. Label elements SIGNAL WORD

Danger

Symbols:

Corrosion |Health Hazard |Environment |

Pictograms



HAZARD STATEMENTS: H227	Combustible Liquid
H318	Causes serious eye damage.
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H317	May cause an allergic skin reaction.
H341	Suspected of causing genetic defects.
H411	Toxic to aquatic life with long lasting effects.

PRECAUTIONARY STATEMENTS

Prevention	
P201	Obtain special instructions before use.
P202	Do not handle until all safety precautions have been read and understood.
P210	Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
P261	Avoid breathing dust/fume/gas/mist/vapours/spray.
P272	Contaminated work clothing should not be allowed out of the workplace.
P273	Avoid release to the environment.
P280B	Wear protective gloves and eye/face protection.
P284	Wear respiratory protection.
Response	
P302 + P352	IF ON SKIN: Wash with plenty of soap and water.
P304 + P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
P305 + P351 + P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact
	lenses, if present and easy to do. Continue rinsing.
P310	Immediately call a POISON CENTER or doctor/physician.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.
P342 + P311	If experiencing respiratory symptoms: Call a POISON CENTER or
	doctor/physician.
P362 + P364	Take off contaminated clothing and wash it before reuse.
P370 + P378	In case of fire: Use a fire fighting agent suitable for flammable liquids such as dry
	chemical or carbon dioxide to extinguish.
P391	Collect spillage.
Storage	
P403	Store in a well-ventilated place.
P405	Store locked up.
Disposal	
P501	Dispose of contents/container in accordance with applicable local/regional/national/international regulations.

2.3. Other hazards

Although titanium dioxide is classified as a carcinogen, exposures associated with this health effect are not expected during normal, intended use of this product. Persons previously sensitised to amines may develop a cross-sensitisation reaction to certain other amines.

SECTION 3: Composition/information on ingredients

Ingredient	CAS Nbr	% by Weight
Polyester Adipate	Trade Secret	40 - 70
Polyfunctional Aziridine	64265-57-2	20 - 40
Amine Borane Complex	223674-50-8	5 - 20
Silane, trimethoxyoctyl-, hydrolysis products with silica	67762-90-7	0.5 - 1.5
Titanium dioxide	13463-67-7	<= 0.5

SECTION 4: First aid measures

4.1. Description of first aid measures

Inhalation

Remove person to fresh air. If you feel unwell, get medical attention.

Skin contact

Immediately wash with soap and water. Remove contaminated clothing and wash before reuse. If signs/symptoms develop, get medical attention.

Eye contact

Immediately flush with large amounts of water for at least 15 minutes. Remove contact lenses if easy to do. Continue rinsing. Immediately get medical attention.

A product risk assessment is recommended to determine if eye wash facilities may be required when using this product in the workplace.

If swallowed

Rinse mouth. If you feel unwell, get medical attention.

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

The most important symptoms and effects based on the CLP classification include:

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

Not applicable

SECTION 5: Fire-fighting measures

5.1. Suitable extinguishing media

In case of fire: Use a fire fighting agent suitable for flammable liquids such as dry chemical or carbon dioxide to extinguish.

5.2. Special hazards arising from the substance or mixture

Closed containers exposed to heat from fire may build pressure and explode.

Hazardous Decomposition or By-Products	
<u>Substance</u>	<u>Condition</u>
Aldehydes.	During combustion.
Carbon monoxide.	During combustion.
Carbon dioxide.	During combustion.

Irritant vapours or gases.	During combustion.
Oxides of nitrogen.	During combustion.

5.3. Special protective actions for fire-fighters

Water may not effectively extinguish fire; however, it should be used to keep fire-exposed containers and surfaces cool and prevent explosive rupture. Wear full protective clothing, including helmet, self-contained, positive pressure or pressure demand breathing apparatus, bunker coat and pants, bands around arms, waist and legs, face mask, and protective covering for exposed areas of the head.

5.4. Hazchem code: Not applicable.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Evacuate area. Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Use only non-sparking tools. Ventilate the area with fresh air. For large spill, or spills in confined spaces, provide mechanical ventilation to disperse or exhaust vapors, in accordance with good industrial hygiene practice. Warning! A motor could be an ignition source and could cause flammable gases or vapors in the spill area to burn or explode. Refer to other sections of this SDS for information regarding physical and health hazards, respiratory protection, ventilation, and personal protective equipment.

6.2. Environmental precautions

Avoid release to the environment. For larger spills, cover drains and build dykes to prevent entry into sewer systems or bodies of water.

6.3. Methods and material for containment and cleaning up

Contain spill. Cover spill area with a fire-extinguishing foam. Working from around the edges of the spill inward, cover with bentonite, vermiculite, or commercially available inorganic absorbent material. Mix in sufficient absorbent until it appears dry. Remember, adding an absorbent material does not remove a physical, health, or environmental hazard. Collect as much of the spilled material as possible using non-sparking tools. Place in a metal container approved for transportation by appropriate authorities. Clean up residue with an appropriate solvent selected by a qualified and authorised person. Ventilate the area with fresh air. Read and follow safety precautions on the solvent label and Safety Data Sheet. Seal the container. Dispose of collected material as soon as possible in accordance with applicable local/regional/national/international regulations.

SECTION 7: Handling and storage

Refer to Section 15 - Controls for more information

7.1. Precautions for safe handling

For industrial/occupational use only. Not for consumer sale or use. Do not handle until all safety precautions have been read and understood. Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Avoid breathing dust/fume/gas/mist/vapours/spray. Do not get in eyes, on skin, or on clothing. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Contaminated work clothing should not be allowed out of the workplace. Avoid release to the environment. Wash contaminated clothing before reuse. Avoid contact with oxidising agents (eg. chlorine, chromic acid etc.) Use personal protective equipment (eg. gloves, respirators...) as required.

7.2. Conditions for safe storage including any incompatibilities

Store in a well-ventilated place. Keep cool. Store away from heat. Store away from acids. Store away from oxidising agents.

7.3. Certified handler

Required when present in any quantity, for Acute toxicity Category 2 substances Not required

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limits

If a component is disclosed in section 3 but does not appear in the table below, an occupational exposure limit is not available for the component.

Ingredient	CAS Nbr	Agency	Limit type	Additional comments
Titanium dioxide	13463-67-7	ACGIĤ	TWA(Respirable nanoscale particles):0.2 mg/m3;TWA(Respirable finescale particles):2.5 mg/m3	A3: Confirmed animal carcinogen.
Titanium dioxide	13463-67-7	New Zealand	TWA(8 hours):10 mg/m3	
		WES		
ACGIH : American Conference of Govern	mental Industrial	Hygienists		
AIHA : American Industrial Hygiene Asso	ociation			
CMRG : Chemical Manufacturer's Recom	mended Guideline	es		
New Zealand WES : New Zealand Workp	lace Exposure Sta	ndards.		
TWA: Time-Weighted-Average				
STEL: Short Term Exposure Limit				
ppm: parts per million				
mg/m ³ : milligrams per cubic metre				

CEIL: Ceiling

8.2. Exposure controls

8.2.1. Engineering controls

Use general dilution ventilation and/or local exhaust ventilation to control airborne exposures to below relevant Exposure Limits and/or control dust/fume/gas/mist/vapours/spray. If ventilation is not adequate, use respiratory protection equipment.

8.2.2. Personal protective equipment (PPE)

Eye/face protection

Select and use eye/face protection to prevent contact based on the results of an exposure assessment. The following eye/face protection(s) are recommended: Full face shield. Indirect vented goggles.

Refer AS/NZS 1336 - Recommended practices for occupational eye protection and for performance specifications AS/NZS 1337, Parts 1 - 6 - Personal eye-protection.

Skin/hand protection

Select and use gloves and/or protective clothing approved to relevant local standards to prevent skin contact based on the results of an exposure assessment. Selection should be based on use factors such as exposure levels, concentration of the substance or mixture, frequency and duration, physical challenges such as temperature extremes, and other use conditions. Consult with your glove and/or protective clothing manufacturer for selection of appropriate compatible gloves/protective clothing. Note: Nitrile gloves may be worn over polymer laminate gloves to improve dexterity. Gloves made from the following material(s) are recommended: Polymer laminate

Respiratory protection

An exposure assessment may be needed to decide if a respirator is required. If a respirator is needed, use respirators as part of a full respiratory protection program. Based on the results of the exposure assessment, select from the following respirator type(s) to reduce inhalation exposure:

Half facepiece or full facepiece air-purifying respirator suitable for organic vapors and particulates

For questions about suitability for a specific application, consult with your respirator manufacturer.

3M™ Scotch-Weld™ Structural Plastic Adhesive DP8005 Off-White and Structural Plastic Adhesive 8005 Off-White, Part A

Refer AS/NZS 1715 - Selection, use and maintenance of respiratory protective equipment and AS/NZS 1716 - Respiratory protective devices.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

information on basic physical and chemical properti		
Physical state	Liquid.	
Specific Physical Form:	Paste	
Colour White		
Odour	Mild Odour	
Odour threshold	No data available.	
рН	Not applicable.	
Melting point/Freezing point	Not applicable.	
Boiling point/Initial boiling point/Boiling range	>=82.2 °C	
Flash point	82.2 °C [Test Method:Closed Cup]	
Evaporation rate	No data available.	
Flammability (solid, gas)	Not applicable.	
Flammable Limits(LEL)	No data available.	
Flammable Limits(UEL)	No data available.	
Vapour pressure	<=13.3 Pa	
Vapor Density and/or Relative Vapor Density	No data available.	
Density	1.063 g/ml	
Relative density	1.063 [<i>Ref Std</i> :WATER=1]	
Water solubility	Slight (less than 10%)	
Solubility- non-water	No data available.	
Partition coefficient: n-octanol/water	nol/water No data available.	
Autoignition temperature	No data available.	
Decomposition temperature	No data available.	
Viscosity/Kinematic Viscosity	49,000 mPa-s [@ 23 °C]	
Volatile organic compounds (VOC)	<=65 g/l [<i>Test Method</i> :calculated SCAQMD rule 443.1]	
	[Details:EU VOC content]	
Percent volatile	5 - 10 % weight [Test Method:ACS]	
VOC less H2O & exempt solvents	7.8 g/l [Details: when used as intended with Part B]	
VOC less H2O & exempt solvents	0.8 % [Details: when used as intended with Part B]	
VOC less H2O & exempt solvents	65 g/l [Test Method:calculated SCAQMD rule 443.1] [Details:as	
	supplied]	
Molecular weight	No data available.	

SECTION 10: Stability and reactivity

10.1 Reactivity

This material may be reactive with certain agents under certain conditions - see the remaining headings in this section

10.2 Chemical stability

Stable.

10.3 Possibility of hazardous reactions

Hazardous polymerisation will not occur.

10.4 Conditions to avoid

Heat. Sparks and/or flames. **10.5 Incompatible materials** Strong acids. Strong oxidising agents.

10.6 Hazardous decomposition products

Substance None known. <u>Condition</u>

Refer to Section 5.2 for hazardous decomposition products during combustion.

SECTION 11: Toxicological information

The information below may not be consistent with the material classification in Section 2 if specific ingredient classifications are mandated by a competent authority. In addition, toxicological data on ingredients may not be reflected in the material classification and/or the signs and symptoms of exposure, because an ingredient may be present below the threshold for labelling, an ingredient may not be available for exposure, or the data may not be relevant to the material as a whole.

11.1 Information on Toxicological effects

Signs and Symptoms of Exposure

Based on test data and/or information on the components, this material may produce the following health effects:

Inhalation

Respiratory tract irritation: Signs/symptoms may include cough, sneezing, nasal discharge, headache, hoarseness, and nose and throat pain. Allergic respiratory reaction: Signs/symptoms may include difficulty breathing, wheezing, cough, and tightness of chest.

Skin contact

Mild Skin Irritation: Signs/symptoms may include localized redness, swelling, itching, and dryness. Allergic skin reaction (non-photo induced): Signs/symptoms may include redness, swelling, blistering, and itching.

Eye contact

Corrosive (eye burns): Signs/symptoms may include cloudy appearance of the cornea, chemical burns, severe pain, tearing, ulcerations, significantly impaired vision or complete loss of vision.

Ingestion

May be harmful if swallowed.

Gastrointestinal irritation: Signs/symptoms may include abdominal pain, stomach upset, nausea, vomiting and diarrhoea.

Additional Health Effects:

Genotoxicity:

Genotoxicity and Mutagenicity: May interact with genetic material and possibly alter gene expression.

Additional information:

Persons previously sensitised to amines may develop a cross-sensitisation reaction to certain other amines.

Toxicological Data

If a component is disclosed in section 3 but does not appear in a table below, either no data are available for that endpoint or the data are not sufficient for classification.

Acute Toxicity

Name	Route	Species	Value
Overall product	Ingestion		No data available; calculated ATE >2,000 - =5,000
			mg/kg
Polyfunctional Aziridine	Dermal	Rabbit	LD50 > 3,000 mg/kg
Polyfunctional Aziridine	Inhalation-	Rat	LC50 0.252 mg/l
	Dust/Mist		
	(4 hours)		
Polyfunctional Aziridine	Ingestion	Rat	LD50 3,038 mg/kg
Amine Borane Complex	Ingestion	Rat	LD50 693 mg/kg
Silane, trimethoxyoctyl-, hydrolysis products with silica	Dermal	Rabbit	LD50 > 5,000 mg/kg
Silane, trimethoxyoctyl-, hydrolysis products with silica	Inhalation-	Rat	LC50 > 0.691 mg/l
	Dust/Mist		
	(4 hours)		
Silane, trimethoxyoctyl-, hydrolysis products with silica	Ingestion	Rat	LD50 > 5,110 mg/kg
Titanium dioxide	Dermal	Rabbit	LD50 > 10,000 mg/kg
Titanium dioxide	Inhalation-	Rat	LC50 > 6.82 mg/l
	Dust/Mist		-
	(4 hours)		
Titanium dioxide	Ingestion	Rat	LD50 > 10,000 mg/kg

ATE = acute toxicity estimate

Skin Corrosion/Irritation

Name	Species	Value
Polyfunctional Aziridine	Rabbit	Mild irritant
Amine Borane Complex	Rabbit	No significant irritation
Silane, trimethoxyoctyl-, hydrolysis products with silica	Rabbit	No significant irritation
Titanium dioxide	Rabbit	No significant irritation

Serious Eye Damage/Irritation

Name	Species	Value
Polyfunctional Aziridine	Rabbit	Corrosive
Amine Borane Complex	Professio nal judgemen t	Severe irritant
Silane, trimethoxyoctyl-, hydrolysis products with silica	Rabbit	No significant irritation
Titanium dioxide	Rabbit	No significant irritation

Sensitisation:

Skin Sensitisation

Name	Species	Value
	_	
Polyfunctional Aziridine	Human	Sensitising
	and	
	animal	
Amine Borane Complex	Guinea	Sensitising
	pig	
Silane, trimethoxyoctyl-, hydrolysis products with silica	Human	Not classified
	and	
	animal	
Titanium dioxide	Human	Not classified
	and	
	animal	

Respiratory Sensitisation

Name	Species	Value
Polyfunctional Aziridine	Human	Sensitising

Germ Cell Mutagenicity

Name	Route	Value
Polyfunctional Aziridine	In vivo	Mutagenic
Amine Borane Complex	In Vitro	Not mutagenic
Silane, trimethoxyoctyl-, hydrolysis products with silica	In Vitro	Not mutagenic
Titanium dioxide	In Vitro	Not mutagenic
Titanium dioxide	In vivo	Not mutagenic

Carcinogenicity

Name	Route	Species	Value
Silane, trimethoxyoctyl-, hydrolysis products with silica	Not	Mouse	Some positive data exist, but the data are not
	specified.		sufficient for classification
Titanium dioxide	Ingestion	Multiple animal species	Not carcinogenic
Titanium dioxide	Inhalation	Rat	Carcinogenic.

Reproductive Toxicity

Reproductive and/or Developmental Effects

Name	Route	Value	Species	Test result	Exposure
					Duration
Silane, trimethoxyoctyl-, hydrolysis	Ingestion	Not classified for female reproduction	Rat	NOAEL 509	1 generation
products with silica	-	*		mg/kg/day	-
Silane, trimethoxyoctyl-, hydrolysis	Ingestion	Not classified for male reproduction	Rat	NOAEL 497	1 generation
products with silica	-	*		mg/kg/day	-
Silane, trimethoxyoctyl-, hydrolysis	Ingestion	Not classified for development	Rat	NOAEL	during
products with silica	-	-		1,350	organogenesis
-				mg/kg/day	

Target Organ(s)

Specific Target Organ Toxicity - single exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Polyfunctional Aziridine	Inhalation	respiratory irritation	Some positive data exist, but the data are not sufficient for classification	Rat	NOAEL Not available	4 hours

Specific Target Organ Toxicity - repeated exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Silane, trimethoxyoctyl-, hydrolysis products with silica	Inhalation	respiratory system silicosis	Not classified	Human	NOAEL Not available	occupational exposure
Titanium dioxide	Inhalation	respiratory system	Some positive data exist, but the data are not sufficient for classification	Rat	LOAEL 0.01 mg/l	2 years
Titanium dioxide	Inhalation	pulmonary fibrosis	Not classified	Human	NOAEL Not available	occupational exposure

Aspiration Hazard

For the component/components, either no data are currently available or the data are not sufficient for classification.

Please contact the address or phone number listed on the first page of the SDS for additional toxicological information on this material and/or its components.

SECTION 12: Ecological information

The information below may not be consistent with the material classification in Section 2 if specific ingredient

classifications are mandated by a competent authority. Additional information leading to material classification in Section 2 is available upon request. In addition, environmental fate and effects data on ingredients may not be reflected in this section because an ingredient is present below the threshold for labelling, an ingredient is not expected to be available for exposure, or the data is considered not relevant to the material as a whole.

12.1. Toxicity

Ecotoxic to the aquatic environment.

Hazardous to the aquatic environment chronic Category 2

No product test data available.

Material	CAS Number	Organism	Туре	Exposure	Test endpoint	Test result
Polyfunctional Aziridine	64265-57-2	Algae or other aquatic plants	Experimental	72 hours	EC50	3.8 mg/l
Polyfunctional Aziridine	64265-57-2	Fish	Experimental	96 hours	LC50	2.35 mg/l
Polyfunctional Aziridine	64265-57-2	Invertebrate	Experimental	48 hours	EC50	6.96 mg/l
Amine Borane Complex	223674-50-8	N/A	Data not available or insufficient for classification	N/A	N/A	N/A
Silane, trimethoxyocty l-, hydrolysis products with silica	67762-90-7	N/A	Data not available or insufficient for classification	N/A	N/A	N/A
Titanium dioxide	13463-67-7	Activated sludge	Experimental	3 hours	NOEC	>=1,000 mg/l
Titanium dioxide	13463-67-7	Diatom	Experimental	72 hours	EC50	>10,000 mg/l
Titanium dioxide	13463-67-7	Fathead minnow	Experimental	96 hours	LC50	>100 mg/l
Titanium dioxide	13463-67-7	Water flea	Experimental	48 hours	EC50	>100 mg/l
Titanium dioxide	13463-67-7	Diatom	Experimental	72 hours	NOEC	5,600 mg/l

12.2. Persistence and degradability

Material	CAS Number	Test type	Duration	Study Type	Test result	Protocol
Polyfunctional	64265-57-2	Experimental	28 days	CO2 evolution	<60 %CO2	OECD 301B - Modified
Aziridine		Biodegradation			evolution/THC	sturm or CO2
					O2 evolution	
Amine Borane	223674-50-8	Experimental	28 days	CO2 evolution	44 %CO2	EC C.4.C. CO2
Complex		Biodegradation			evolution/THC	Evolution Test
					O2 evolution	
Silane, trimethoxyocty l-, hydrolysis products with silica	67762-90-7	Data not availbl- insufficient	N/A	N/A	N/A	N/A
Titanium dioxide	13463-67-7	Data not availbl- insufficient	N/A	N/A	N/A	N/A

12.3 : Bioaccumulative potential

Material	CAS Number	Test type	Duration	Study Type	Test result	Protocol
Polyfunctional Aziridine	64265-57-2	Modeled Bioconcentrati on		Log Kow	0.5	ACD/Labs ChemSketch™
Amine Borane Complex	223674-50-8	Experimental Bioconcentrati on		Log Kow	>5.99	EC A.8 Partition Coefficient
Silane, trimethoxyocty l-, hydrolysis products with silica	67762-90-7	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Titanium dioxide	13463-67-7	Experimental BCF - Fish	42 days	Bioaccumulatio n factor	9.6	

12.4. Mobility in soil

Please contact manufacturer for more details

12.5 Other adverse effects

No information available.

SECTION 13: Disposal considerations

13.1. Disposal methods

In accordance with the Hazardous Substances (Disposal) Notice 2017 and the relevant criteria of the HSNO Act 1996.

Dispose of completely cured (or polymerized) material in a permitted industrial waste facility. As a disposal alternative, incinerate uncured product in a permitted waste incineration facility. Proper destruction may require the use of additional fuel during incineration processes. Empty drums/barrels/containers used for transporting and handling hazardous chemicals (chemical substances/mixtures/preparations classified as Hazardous as per applicable regulations) shall be considered, stored, treated & disposed of as hazardous wastes unless otherwise defined by applicable waste regulations. Consult with the respective regulating authorities to determine the available treatment and disposal facilities.

Packaging (that may or may not contain any residual substance) may be lawfully disposed of by householders or other consumers through public or commercial waste collection services.

SECTION 14: Transport Information

New Zealand Land Transport Rule: Dangerous Goods - Road/Rail Transport UN No.: Not applicable. Proper Shipping Name: Not applicable. Class/Division: Not applicable. Sub Risk: Not applicable. Packing Group: Not applicable.

Hazchem Code: Not applicable. IERG: Not applicable.

International Air Transport Association (IATA) - Air Transport UN No.: Not applicable. Proper Shipping Name: Not applicable. Class/Division: Not applicable. Sub Risk: Not applicable. Packing Group: Not applicable.

International Maritime Dangerous Goods Code (IMDG) - Marine Transport

UN No.: Not applicable.
Proper Shipping Name: Not applicable.
Class/Division: Not applicable.
Sub Risk: Not applicable.
Packing Group: Not applicable.
Marine Pollutant: Not applicable.

SECTION 15: Regulatory information

HSNO Approval numberHSR002657Group standard nameSurface Coatings and Colourants (Combustible) Group Standard 2020HSNO Hazard classificationRefer to Section 2: Hazard identification

NZ Inventory of Chemicals (NZIoC) Status

All applicable chemical ingredients in this material are in compliance with NZIOC listing requirements.

Controls in accordance with The Health and Safety at Work Act 2015, Health and Safety at Work (Hazardous Substances) Regulations 2017 and the HSNO Act 1996, Hazardous Substances (Hazardous Property Controls) Notice 2017

Certified handler	Required when present in any quantity, for Acute toxicity Category 2 substances Not required
Location Compliance Certificate	Not required
Hazardous atmosphere zone	Not required
Fire extinguishers	Two required for 500 L
Emergency response plan	100 L 100 L (for Hazardous to the aquatic environment Category 1 substances); or 1 000 L (for Acute toxicity Category 4, Skin sensitisation Category 1, Respiratory sensitisation Category 1, Hazardous to the aquatic environment Category 2 or Hazardous to the aquatic environment Category 3 substances); or 10 000 L (for all other substances)
Secondary containment	100 L 100 L (for Hazardous to the aquatic environment Category 1 substances); or 1 000 L (for Acute toxicity Category 4, Skin sensitisation Category 1, Respiratory sensitisation Category 1, Hazardous to the aquatic environment Category 2 or Hazardous to the aquatic environment Category 3 substances); or 10 000 L (for all other substances)
Tracking	Not required Required (for Acute toxicity Category 2 substances).
Warning signage	100 L (for Hazardous to the aquatic environment Category 1 substances); or 1 000 L (for Serious eye damage Category 1, Hazardous to the aquatic environment Category 2 or Hazardous to the aquatic environment Category 3 substances); or 10 000 L (for all other substances) 100 L (for Hazardous to the aquatic environment Category 1 substances); or 250 L (for all other substances)

SECTION 16: Other information

Revision information:

Complete document review.

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Key to abbreviations and acronyms

GHS refers to the Globally Harmonised System of Classification and Labelling of Chemicals, 7th revised edition of 2017 **HSNO** means Hazardous Substances and New Organisms Act 1996

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