Safety Data Sheet

Document group:	32-4148-6	**Version number:**	1.00
Issue Date:	08/07/2014	**Supersedes date:**	Initial issue.

This Safety Data Sheet has been prepared in accordance with the Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice (Safe Work Australia, December 2011)

IDENTIFICATION:

1.1. Product identifier
3M(TM) Scotch-Weld(TM) Acrylic Adhesive DP8410NS Green

Product Identification Numbers
62-2860-1445-1 62-2860-3630-6

1.2. Recommended use and restrictions on use

Recommended use
Adhesive

For Industrial or Professional use only.

1.3. Supplier's details

Address: 3M Australia - Building A, 1 Rivett Road, North Ryde NSW 2113
Telephone: 136 136
E Mail: productinfo.au@mmm.com
Website: www.3m.com.au

1.4. Emergency telephone number
Company Emergency Hotline:EMERGENCY: 1800 097 146 (Australia only)

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:

32-4143-7, 32-4140-3

One or more components of this KIT is classified as a hazardous chemical according to the Model Work Health and Safety Regulations, 2011.

TRANSPORT INFORMATION

The Components of this KIT have various Dangerous Goods Transportation Classifications. Please refer to the attached component Safety Data Sheets for individual Transportation Classifications.

DISCLAIMER: The information on this Safety Data Sheet is based on our experience and is correct to the best of our knowledge at the date of publication, but we do not accept any liability for any loss, damage or injury resulting from its use (except as required by law). The information may not be valid for any use not referred to in this Safety Data Sheet or use of the product in combination with other materials. For these reasons, it is important that customers carry out their own test to satisfy themselves as to the suitability of the product for their own intended applications.

3M Australia SDSs are available at www.3m.com.au

Safety Data Sheet

Document group:	32-4140-3	**Version number:**	1.00
Issue Date:	07/07/2014	**Supersedes date:**	Initial issue.

This Safety Data Sheet has been prepared in accordance with the Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice (Safe Work Australia, December 2011)

SECTION 1: Identification

1.1. Product identifier
3M(TM) Scotch-Weld(TM) Acrylic Adhesive DP8410NS Green, Part A

1.2. Recommended use and restrictions on use

Recommended use
Adhesive

For Industrial or Professional use only.

1.3. Supplier's details

Address:	3M Australia - Building A, 1 Rivett Road, North Ryde NSW 2113
Telephone:	136 136
E Mail:	productinfo.au@mmm.com
Website:	www.3m.com.au

1.4. Emergency telephone number
EMERGENCY: 1800 097 146 (Australia only)

SECTION 2: Hazard identification

This product is classified as a hazardous chemical according to the Model Work Health and Safety Regulations, 2011.

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

2.1. Classification of the substance or mixture
Skin Sensitizer: Category 1B.

2.2. Label elements
The label elements below were prepared in accordance with the Code of Practice on Preparation of Safety Data Sheets for Hazardous Chemicals (Safe Work Australia, December 2011). This information may be different from the actual product label.

Signal word
WARNING!

Symbols
Exclamation mark |

Pictograms

Hazard statements

H317	May cause an allergic skin reaction.

Precautionary statements

Prevention:

P261	Avoid breathing dust/fume/gas/mist/vapours/spray.
P280E	Wear protective gloves.
P272	Contaminated work clothing should not be allowed out of the workplace.

Response:

P302 + P352	IF ON SKIN: Wash with plenty of soap and water.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.
P363	Wash contaminated clothing before reuse.

Disposal:

P501	Dispose of contents/container in accordance with applicable local/regional/national/international regulations.

2.3. Other assigned/identified product hazards
None known.

2.4. Other hazards which do not result in classification
May be harmful if swallowed.
Toxic to aquatic life. Toxic to aquatic life with long lasting effects.

SECTION 3: Composition/information on ingredients

This material is a mixture.

Ingredient	CAS Nbr	% by Weight
Dibenzoate Propanol	27138-31-4	45 - 65
Acrylate Polymer	25101-28-4	10 - 30
1-benzyl-5-phenyl barbituric acid	Trade Secret	1 - 15
Organic Peroxide	13122-18-4	0.1 - 10

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
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
See Section 11.1. Information on toxicological effects.

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
Part of the oxygen for combustion is supplied by the peroxide itself.

Hazardous Decomposition or By-Products

Substance	Condition
Carbon monoxide.	During combustion.
Carbon dioxide.	During combustion.

5.3. Special protective actions for fire-fighters
No special protective actions for fire-fighters are anticipated.

Hazchem Code: •3Z

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 vapours, in accordance with good industrial hygiene practice. Warning: A motor could be an ignition source and could cause flammable gases or vapours 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. 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.

SECTION 7: Handling and storage

7.1. Precautions for safe handling
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.)

7.2. Conditions for safe storage including any incompatibilities
Keep cool. Store away from heat. Store away from acids. Store away from strong bases. Store away from oxidising agents.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limits
No occupational exposure limit values exist for any of the components listed in Section 3 of this Safety Data Sheet.

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.

Select and use eye protection in accordance with AS/NZS 1336. Eye protection should comply with the performance specifications of AS/NZS 1337.

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.
Gloves made from the following material(s) are recommended: Nitrile rubber.

Select and use gloves according to AS/NZ 2161.

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.
Select and use respirators according to AS/NZS 1715. Respirators should comply with AS/NZS 1716 performance specifications. For information about respirators, call 3M on 1800 024 464.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	Liquid.
Specific Physical Form:	Paste
Appearance/Odour	Blue hydrocarbon odour
Odour threshold	*No data available.*
pH	*Not applicable.*
Melting point/Freezing point	*Not applicable.*
Boiling point/Initial boiling point/Boiling range	>=65.6 ºC
Flash point	> 93.3 ºC [*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	*No data available.*
Density	1.08 g/ml
Relative density	1.08 [*Ref Std:*WATER=1]
Water solubility	Nil
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	20 - 25 Pa-s
Hazardous air pollutants	0 % weight
VOC less H2O & exempt solvents	60.5 g/l [*Test Method:*calculated SCAQMD rule 443.1]
VOC less H2O & exempt solvents	< 25 g/l [*Details:*when used as intended with Part B]

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. Conditions to avoid
Heat.
Sparks and/or flames.

10.4. Possibility of hazardous reactions
Hazardous polymerisation will not occur.

10.5 Incompatible materials
Amines.
Strong acids.
Strong bases.
Strong oxidising agents.

10.6 Hazardous decomposition products

Substance	**Condition**
None known.	

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.

Skin contact
Contact with the skin during product use is not expected to result in significant irritation. Allergic skin reaction (non-photo induced): Signs/symptoms may include redness, swelling, blistering, and itching.

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

Ingestion
May be harmful if swallowed.

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 ATE2,000 - 5,000 mg/kg
Dibenzoate Propanol	Dermal	Rat	LD50 > 2,000 mg/kg
Dibenzoate Propanol	Inhalation-Dust/Mist (4 hours)	Rat	LC50 > 200 mg/l
Dibenzoate Propanol	Ingestion	Rat	LD50 3,295 mg/kg
Acrylate Polymer	Ingestion	Rat	LD50 > 5,000 mg/kg
	Ingestion	Rat	LD50 > 2,000 mg/kg

ATE = acute toxicity estimate

Skin Corrosion/Irritation

Name	Species	Value
Dibenzoate Propanol	Rabbit	No significant irritation

Serious Eye Damage/Irritation

Name	Species	Value
Dibenzoate Propanol	Rabbit	No significant irritation

Skin Sensitisation

Name	Species	Value
Dibenzoate Propanol	Guinea pig	Not sensitizing

	Mouse	Not sensitizing

Respiratory Sensitisation

Name	Species	Value

Germ Cell Mutagenicity

Name	Route	Value
Dibenzoate Propanol	In Vitro	Not mutagenic
	In Vitro	Not mutagenic

Carcinogenicity

Name	Route	Species	Value

Reproductive Toxicity

Reproductive and/or Developmental Effects

Name	Route	Value	Species	Test result	Exposure Duration
Dibenzoate Propanol	Ingestion	Not toxic to female reproduction	Rat	NOAEL 500 mg/kg/day	2 generation
Dibenzoate Propanol	Ingestion	Not toxic to male reproduction	Rat	NOAEL 400 mg/kg/day	2 generation
Dibenzoate Propanol	Ingestion	Some positive developmental data exist, but the data are not sufficient for classification	Rat	NOAEL 1,000 mg/kg/day	during gestation

Target Organ(s)

Specific Target Organ Toxicity - single exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
	Ingestion	nervous system	Some positive data exist, but the data are not sufficient for classification	Rat	NOAEL 2,000 mg/kg	not applicable

Specific Target Organ Toxicity - repeated exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Dibenzoate Propanol	Ingestion	hematopoietic system | liver	Some positive data exist, but the data are not sufficient for classification	Rat	NOAEL 2,500 mg/kg/day	90 days

Aspiration Hazard

Name	Value

Exposure Levels
Refer Section **8.1 Control Parameters** of this Safety Data Sheet.

Interactive Effects
Not determined.

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

Acute aquatic hazard:
GHS Acute 2: Toxic to aquatic life with long lasting effects.

Chronic aquatic hazard:
GHS Chronic 2: Toxic to aquatic life with long lasting effects.

No product test data available.

Material	CAS Number	Organism	Type	Exposure	Test endpoint	Test result
Dibenzoate Propanol	27138-31-4	Water flea	Experimental	48 hours	EC50	19.31 mg/l
Dibenzoate Propanol	27138-31-4	Fathead minnow	Experimental	96 hours	LC50	3.7 mg/l
Dibenzoate Propanol	27138-31-4	Green Algae	Experimental	72 hours	EC50	4.9 mg/l
	Trade Secret		Data not available or insufficient for classification			
Acrylate Polymer	25101-28-4		Data not available or insufficient for classification			
Organic Peroxide	13122-18-4		Data not available or insufficient for classification			

12.2. Persistence and degradability

Material	CAS Number	Test type	Duration	Study Type	Test result	Protocol
Organic Peroxide	13122-18-4	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Acrylate Polymer	25101-28-4	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Dibenzoate Propanol	27138-31-4	Experimental Biodegradation	28 days	CO2 evolution	85 % weight	OECD 301B - Modified sturm or CO2
	Trade Secret	Modeled Biodegradation	28 days	BOD	30.6 % weight	OECD 301C - MITI test (I)

12.3 : Bioaccumulative potential

Material	CAS Number	Test type	Duration	Study Type	Test result	Protocol
Organic Peroxide	13122-18-4	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Acrylate Polymer	25101-28-4	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Dibenzoate Propanol	27138-31-4	Estimated Bioconcentration		Bioaccumulation factor	8	Estimated: Bioconcentration factor
	Trade Secret	Modeled Bioconcentration		Bioaccumulation factor	4.84	Other methods

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
Dispose of contents/ container in accordance with the local/regional/national/international regulations.

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. If no other disposal options are available, waste product that has been completely cured or polymerized may be placed in a landfill properly designed for industrial waste.

SECTION 14: Transport Information

Australian Dangerous Goods Code (ADG) - Road/Rail Transport
UN No.: UN3082
Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. , (Tert-Butyl Peroxy-3,5,5-Trimethylhexanoate)
Class/Division: 9
Sub Risk: Not applicable.
Packing Group: III
Special Instructions: Limited quantity may apply
Hazchem Code: •3Z
IERG: 47

International Air Transport Association (IATA) - Air Transport
UN No.: UN3082
Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. , (Tert-Butyl Peroxy-3,5,5-Trimethylhexanoate)
Class/Division: 9
Sub Risk: Not applicable.
Packing Group: III

International Maritime Dangerous Goods Code (IMDG)- Marine Transport
UN No.: UN3082
Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. , (Tert-Butyl Peroxy-3,5,5-Trimethylhexanoate)
Class/Division: 9
Sub Risk: Not applicable.
Packing Group: III
Marine Pollutant: Tert-Butyl Peroxy-3,5,5-Trimethylhexanoate
Special Instructions: Limited quantity may apply

SECTION 15: Regulatory information

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

Australian Inventory Status:
An ingredient(s) in this product is being introduced under Section 21U of the Industrial Chemicals (Notification and Assessment) Act 1989 as amended.

Poison Schedule: This product has not been assessed for poisons scheduling as the product is intended for industrial and professional use only.

SECTION 16: Other information

Revision information:
Initial issue.

DISCLAIMER: The information on this Safety Data Sheet is based on our experience and is correct to the best of our knowledge at the date of publication, but we do not accept any liability for any loss, damage or injury resulting from its use (except as required by law). The information may not be valid for any use not referred to in this Safety Data Sheet or use of the product in combination with other materials. For these reasons, it is important that customers carry out their own test to satisfy themselves as to the suitability of the product for their own intended applications.

3M Australia SDSs are available at www.3m.com.au

Safety Data Sheet

Document group:	32-4143-7	**Version number:**	1.00
Issue Date:	07/07/2014	**Supersedes date:**	Initial issue.

This Safety Data Sheet has been prepared in accordance with the Preparation of Safety Data Sheets for Hazardous Chemicals Code of Practice (Safe Work Australia, December 2011)

SECTION 1: Identification

1.1. Product identifier
3M(TM) Scotch-Weld(TM) Acrylic Adhesive DP8410NS Green, 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 Australia - Building A, 1 Rivett Road, North Ryde NSW 2113
Telephone:	136 136
E Mail:	productinfo.au@mmm.com
Website:	www.3m.com.au

1.4. Emergency telephone number
EMERGENCY: 1800 097 146 (Australia only)

SECTION 2: Hazard identification

This product is classified as a hazardous chemical according to the Model Work Health and Safety Regulations, 2011.

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

2.1. Classification of the substance or mixture
Flammable Liquid: Category 2.
Serious Eye Damage/Irritation: Category 2.
Skin Sensitizer: Category 1.
Specific Target Organ Toxicity (repeated exposure): Category 1.

2.2. Label elements
The label elements below were prepared in accordance with the Code of Practice on Preparation of Safety Data Sheets for Hazardous Chemicals (Safe Work Australia, December 2011). This information may be different from the actual product label.

Signal word
DANGER!

Symbols
Flame | Exclamation mark | Health Hazard |

Pictograms

Hazard statements

H225	Highly flammable liquid and vapour.
H319	Causes serious eye irritation.
H317	May cause an allergic skin reaction.
H372	Causes damage to organs through prolonged or repeated exposure: sensory organs |

Precautionary statements

Prevention:

P210	Keep away from heat/sparks/open flames/hot surfaces. - No smoking.
P240	Ground/bond container and receiving equipment.
P242	Use only non-sparking tools.
P243	Take precautionary measures against static discharge.
P233	Keep container tightly closed.
P241	Use explosion-proof electrical/ventilating/lighting equipment.
P260	Do not breathe dust/fume/gas/mist/vapours/spray.
P280B	Wear protective gloves and eye/face protection.
P270	Do not eat, drink or smoke when using this product.
P264	Wash thoroughly after handling.
P272	Contaminated work clothing should not be allowed out of the workplace.

Response:

P303 + P361 + P353	IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.
P305 + P351 + P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P337 + P313	If eye irritation persists: Get medical advice/attention.
P302 + P352	IF ON SKIN: Wash with plenty of soap and water.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.
P363	Wash contaminated clothing before reuse.
P314	Get medical advice/attention if you feel unwell.
P370 + P378G	In case of fire: Use a fire fighting agent suitable for flammable liquids such as dry chemical or carbon dioxide to extinguish.

Storage:

P403 + P235	Store in a well-ventilated place. Keep cool.

Disposal:

P501	Dispose of contents/container in accordance with applicable local/regional/national/international regulations.

2.3. Other assigned/identified product hazards
None known.

2.4. Other hazards which do not result in classification
Causes mild skin irritation. May cause respiratory irritation. Very toxic to aquatic life. Very toxic to aquatic life with long lasting effects.

SECTION 3: Composition/information on ingredients

This material is a mixture.

Ingredient	CAS Nbr	% by Weight
Methyl Methacrylate	80-62-6	45 - 65
Fillers	Trade Secret	1 - 20
Acrylonitrile-Butadiene Polymer	9003-18-3	1 - 20
Bisphenol A Polyethylene Glycol Diether Dimethacrylate	41637-38-1	0.1 - 10
Hydroxyethyl Methacrylate	868-77-9	0.1 - 10
Phosphate Esters of PPG Methacrylate	Trade Secret	0.1 - 5
Dispersing Agent	Trade Secret	0.1 - 5
Copper Naphthenates	1338-02-9	< 0.2

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. Remove contact lenses if easy to do. Continue rinsing. 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
See Section 11.1. Information on toxicological effects.

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

Substance	Condition
Carbon monoxide.	During combustion.
Carbon dioxide.	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.

Hazchem Code: •3YE

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 vapours, in accordance with good industrial hygiene practice. Warning: A motor could be an ignition source and could cause flammable gases or vapours 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. An appropriate aqueous film forming foam (AFFF) is recommended. 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.

SECTION 7: Handling and storage

7.1. Precautions for safe handling
Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Use only non-sparking tools. Take precautionary measures against static discharge. 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. Avoid contact with oxidising agents (eg. chlorine, chromic acid etc.) Wear low static or properly grounded shoes. To minimize the risk of ignition, determine applicable electrical classifications for the process using this product and select specific local exhaust ventilation equipment to avoid flammable vapor accumulation. Ground/bond container and receiving equipment if there is potential for static electricity accumulation during transfer.

7.2. Conditions for safe storage including any incompatibilities
Store in a well-ventilated place. Keep cool. Keep container tightly closed. Protect from sunlight. Store away from heat. Store away from acids. Store away from strong bases. Store away from oxidising agents.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limits

Ingredient	CAS Nbr	Agency	Limit type	Additional comments
Methyl Methacrylate	80-62-6	ACGIH	TWA:50 ppm;STEL:100 ppm	A4: Not class. as human carcin, Sensitizer
Methyl Methacrylate	80-62-6	Australia OELs	TWA(8 hours):208 mg/m3(50 ppm);STEL(15 minutes):416 mg/m3(100 ppm)	Skin Notation
Dispersing Agent	Trade Secret	ACGIH	TWA:10 mg/m³	A4: Not class. as human carcin
Dispersing Agent	Trade Secret	Australia OELs	TWA(Inspirable dust)(8 hours):10 mg/m3	
Fillers	Trade Secret	ACGIH	TWA(respirable fraction):2 mg/m3	A4: Not class. as human carcin
Fillers	Trade Secret	Australia OELs	TWA(Inspirable dust)(8 hours):10 mg/m3	

ACGIH : American Conference of Governmental Industrial Hygienists
AIHA : American Industrial Hygiene Association
Australia OELs : Australia. Adopted National Exposure Standards for Atmospheric Contaminants in the Occupational Environment
CMRG : Chemical Manufacturer's Recommended Guidelines
TWA: Time-Weighted-Average
STEL: Short Term Exposure Limit
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. Use explosion-proof ventilation 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:
Indirect vented goggles.

Select and use eye protection in accordance with AS/NZS 1336. Eye protection should comply with the performance specifications of AS/NZS 1337.

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.
Gloves made from the following material(s) are recommended: Polymer laminate

Select and use gloves according to AS/NZ 2161.

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.
Select and use respirators according to AS/NZS 1715. Respirators should comply with AS/NZS 1716 performance specifications. For information about respirators, call 3M on 1800 024 464.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	Liquid.
Specific Physical Form:	Paste
Appearance/Odour	White methacrylate odour
Odour threshold	*No data available.*
pH	*Not applicable.*
Melting point/Freezing point	*Not applicable.*
Boiling point/Initial boiling point/Boiling range	>=37.8 ºC
Flash point	>=10 ºC [*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	*No data available.*
Density	1.07 g/ml
Relative density	1.07 [*Ref Std:*WATER=1]
Water solubility	Nil
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	50 - 80 Pa-s
Hazardous air pollutants	50 - 55 % weight
VOC less H2O & exempt solvents	17.2 g/l [*Details:*when used as intended with Part A]

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. Conditions to avoid
Heat.
Sparks and/or flames.

10.4. Possibility of hazardous reactions
Hazardous polymerisation will not occur.

10.5 Incompatible materials
Amines.
Strong acids.

Strong bases.
Strong oxidising agents.

10.6 Hazardous decomposition products

Substance	Condition
None known.	

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. May cause target organ effects after inhalation.

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
Severe eye irritation: Signs/symptoms may include significant redness, swelling, pain, tearing, cloudy appearance of the cornea, and impaired vision.

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

Target Organ Effects:

Prolonged or repeated exposure may cause:
Olfactory effects: Signs/symptoms may include decreased ability to detect odours and complete loss of smell.

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 ATE >5,000 mg/kg
Overall product	Inhalation-Vapor(4 hr)		No data available; calculated ATE >50 mg/l
Overall product	Ingestion		No data available; calculated ATE >5,000 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
Acrylonitrile-Butadiene Polymer	Dermal	Rabbit	LD50 > 15,000 mg/kg
Acrylonitrile-Butadiene Polymer	Ingestion	Rat	LD50 > 30,000 mg/kg
Bisphenol A Polyethylene Glycol Diether Dimethacrylate	Ingestion	Rat	LD50 > 2,000 mg/kg
Fillers	Dermal		LD50 estimated to be > 5,000 mg/kg
Fillers	Ingestion	Human	LD50 > 15,000 mg/kg
Hydroxyethyl Methacrylate	Dermal	Rabbit	LD50 > 5,000 mg/kg
Hydroxyethyl Methacrylate	Ingestion	Rat	LD50 5,564 mg/kg
Copper Naphthenates	Dermal		estimated to be > 5,000 mg/kg
Copper Naphthenates	Inhalation-Dust/Mist		estimated to be > 12.5 mg/l
Copper Naphthenates	Inhalation-Vapor		estimated to be > 50 mg/l
Copper Naphthenates	Ingestion		estimated to be 300 - 2,000 mg/kg

ATE = acute toxicity estimate

Skin Corrosion/Irritation

Name	Species	Value
Methyl Methacrylate	Human and animal	Mild irritant
Acrylonitrile-Butadiene Polymer		No significant irritation
Fillers		No significant irritation
Hydroxyethyl Methacrylate	Rabbit	Minimal irritation

Serious Eye Damage/Irritation

Name	Species	Value
Methyl Methacrylate	Rabbit	Moderate irritant
Acrylonitrile-Butadiene Polymer		No significant irritation
Fillers		No significant irritation
Hydroxyethyl Methacrylate	Rabbit	Moderate irritant

Skin Sensitisation

Name	Species	Value
Methyl Methacrylate	Human and animal	Sensitising
Bisphenol A Polyethylene Glycol Diether Dimethacrylate	Guinea pig	Not sensitizing
Hydroxyethyl Methacrylate	Human and animal	Sensitising

Respiratory Sensitisation

Name	Species	Value
Methyl Methacrylate	Human	Some positive data exist, but the data are not sufficient for classification

Germ Cell Mutagenicity

Name	Route	Value
Methyl Methacrylate	In vivo	Not mutagenic
Methyl Methacrylate	In Vitro	Some positive data exist, but the data are not sufficient for classification
Bisphenol A Polyethylene Glycol Diether Dimethacrylate	In Vitro	Not mutagenic
Hydroxyethyl Methacrylate	In vivo	Not mutagenic
Hydroxyethyl Methacrylate	In Vitro	Some positive data exist, but the data are not sufficient for classification

Carcinogenicity

Name	Route	Species	Value
Methyl Methacrylate	Ingestion	Rat	Not carcinogenic
Methyl Methacrylate	Inhalation	Human and animal	Not carcinogenic
Fillers	Inhalation	Multiple animal species	Not carcinogenic

Reproductive Toxicity

Reproductive and/or Developmental Effects

Name	Route	Value	Species	Test result	Exposure Duration
Methyl Methacrylate	Inhalation	Not toxic to male reproduction	Mouse	NOAEL 36.9 mg/l	
Methyl Methacrylate	Inhalation	Not toxic to development	Rat	NOAEL 8.3 mg/l	during organogenesis
Hydroxyethyl Methacrylate	Ingestion	Not toxic to female reproduction	Rat	NOAEL 1,000 mg/kg/day	premating & during gestation
Hydroxyethyl Methacrylate	Ingestion	Not toxic to male reproduction	Rat	NOAEL 1,000 mg/kg/day	49 days
Hydroxyethyl Methacrylate	Ingestion	Not toxic to development	Rat	NOAEL 1,000 mg/kg/day	premating & during gestation

Target Organ(s)

Specific Target Organ Toxicity - single exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Methyl Methacrylate	Inhalation	respiratory irritation	May cause respiratory irritation	Human	NOAEL Not available	occupational exposure

Specific Target Organ Toxicity - repeated exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Methyl Methacrylate	Dermal	peripheral nervous system	Some positive data exist, but the data are not sufficient for classification	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	Some positive data exist, but the data are not sufficient for classification	Multiple animal species	NOAEL Not available	14 weeks
Methyl Methacrylate	Inhalation	liver	Some positive data exist, but the data are not sufficient for classification	Mouse	NOAEL 12.3 mg/l	14 weeks
Methyl Methacrylate	Inhalation	respiratory system	Some positive data exist, but the data are not sufficient for classification	Human	NOAEL Not available	occupational exposure
Fillers	Inhalation	pneumoconiosis	Causes damage to organs through prolonged or repeated exposure	Human	NOAEL NA	occupational exposure
Fillers	Inhalation	pulmonary	Some positive	Rat	NOAEL Not	

		fibrosis	data exist, but the data are not sufficient for classification		available	

Aspiration Hazard

Name	Value

Exposure Levels
Refer Section **8.1 Control Parameters** of this Safety Data Sheet.

Interactive Effects
Not determined.

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

Acute aquatic hazard:
GHS Acute 1: Very toxic to aquatic life.

Chronic aquatic hazard:
GHS Chronic 1: Very toxic to aquatic life with long lasting effects.

No product test data available.

Material	CAS Number	Organism	Type	Exposure	Test endpoint	Test result
Copper Naphthenates	1338-02-9	Fish	Experimental	96 hours	LC50	0.00034 mg/l
Copper Naphthenates	1338-02-9	Water flea	Experimental	48 hours	EC50	0.34 mg/l
Hydroxyethyl Methacrylate	868-77-9	Fathead minnow	Experimental	96 hours	LC50	227 mg/l
Hydroxyethyl Methacrylate	868-77-9	Water flea	Experimental	48 hours	EC50	380 mg/l
Methyl Methacrylate	80-62-6	Green algae	Experimental	96 hours	EC50	170 mg/l
Methyl Methacrylate	80-62-6	Water flea	Experimental	48 hours	EC50	69 mg/l
Methyl Methacrylate	80-62-6	Bluegill	Experimental	96 hours	LC50	191 mg/l
Hydroxyethyl Methacrylate	868-77-9	Green Algae	Experimental	72 hours	EC50	345 mg/l
Hydroxyethyl Methacrylate	868-77-9	Green Algae	Experimental	72 hours	NOEC	160 mg/l
Hydroxyethyl Methacrylate	868-77-9	Water flea	Experimental	21 days	NOEC	24.1 mg/l
Methyl Methacrylate	80-62-6	Water flea	Experimental	21 days	NOEC	37 mg/l

Acrylonitrile-Butadiene Polymer	9003-18-3		Data not available or insufficient for classification			
Bisphenol A Polyethylene Glycol Diether Dimethacrylate	41637-38-1		Data not available or insufficient for classification			
Dispersing Agent	Trade Secret		Data not available or insufficient for classification			
Fillers	Trade Secret		Data not available or insufficient for classification			

12.2. Persistence and degradability

Material	CAS Number	Test type	Duration	Study Type	Test result	Protocol
Acrylonitrile-Butadiene Polymer	9003-18-3	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Bisphenol A Polyethylene Glycol Diether Dimethacrylate	41637-38-1	Calculated Biodegradation	28 days	BOD	38 % weight	OECD 301C - MITI test (I)
Dispersing Agent	Trade Secret	Experimental Biodegradation	24 days	CO2 evolution	91 % weight	OECD 301B - Modified sturm or CO2
Hydroxyethyl Methacrylate	868-77-9	Experimental Hydrolysis		Hydrolytic half-life	10.9 days (t 1/2)	Other methods
Hydroxyethyl Methacrylate	868-77-9	Experimental Biodegradation	14 days	BOD	95 % weight	OECD 301C - MITI test (I)
Fillers	Trade Secret	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Methyl Methacrylate	80-62-6	Estimated Photolysis		Photolytic half-life (in air)	1.23 days (t 1/2)	Other methods
Methyl Methacrylate	80-62-6	Experimental Biodegradation	28 days	BOD	88 % weight	OECD 301D - Closed bottle test
Copper Naphthenates	1338-02-9	Data not available or insufficient for classification	N/A	N/A	N/A	N/A

12.3 : Bioaccumulative potential

Material	CAS Number	Test type	Duration	Study Type	Test result	Protocol
Bisphenol A Polyethylene Glycol Diether Dimethacrylate	41637-38-1	Calculated Bioconcentration		Bioaccumulation factor	6.7	Estimated: Bioconcentration factor
Dispersing	Trade Secret	Data not	N/A	N/A	N/A	N/A

Agent		available or insufficient for classification				
Hydroxyethyl Methacrylate	868-77-9	Experimental Bioconcentration		Log Kow	0.47	Other methods
Fillers	Trade Secret	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Methyl Methacrylate	80-62-6	Experimental Bioconcentration		Log Kow	1.38	Other methods
Copper Naphthenates	1338-02-9	Experimental Bioconcentration		Log Kow	4.1	Other methods

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
Dispose of contents/ container in accordance with the local/regional/national/international regulations.

Incinerate uncured product in a permitted waste incineration facility. 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. If no other disposal options are available, waste product that has been completely cured or polymerized may be placed in a landfill properly designed for industrial waste.

SECTION 14: Transport Information

Australian Dangerous Goods Code (ADG) - Road/Rail Transport
UN No.: UN1133
Proper shipping name: ADHESIVES
Class/Division: 3
Sub Risk: Not applicable.
Packing Group: II
Special Instructions: Limited quantity may apply
Hazchem Code: •3YE
IERG: 14

International Air Transport Association (IATA) - Air Transport
UN No.: UN1133
Proper shipping name: ADHESIVES
Class/Division: 3
Sub Risk: Not applicable.
Packing Group: II

International Maritime Dangerous Goods Code (IMDG)- Marine Transport

UN No.: UN1133
Proper shipping name: ADHESIVES
Class/Division: 3
Sub Risk: Not applicable.
Packing Group: II
Marine Pollutant: Copper Salt
Special Instructions: Limited quantity may apply

SECTION 15: Regulatory information

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

Australian Inventory Status:
The chemical components contained within this product are listed on the Australian Inventory of Chemical Substances and are in compliance with the requirements of the Industrial Chemicals (Notification and Assessment) Act 1989 as amended.

Poison Schedule: This product is intended for Industrial or Professional Use only and therefore is not packaged and labelled in accordance with the requirements of the Standard for the Uniform Scheduling of Medicines and Poisons.

SECTION 16: Other information

Revision information:
Initial issue.

DISCLAIMER: The information on this Safety Data Sheet is based on our experience and is correct to the best of our knowledge at the date of publication, but we do not accept any liability for any loss, damage or injury resulting from its use (except as required by law). The information may not be valid for any use not referred to in this Safety Data Sheet or use of the product in combination with other materials. For these reasons, it is important that customers carry out their own test to satisfy themselves as to the suitability of the product for their own intended applications.

3M Australia SDSs are available at www.3m.com.au