

## **Safety Data Sheet**

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This Safety Data Sheet has been prepared in accordance with the REACH Regulation (EC) 1907/2006 and its modifications.

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

#### 1.1. Product identifier

3M Scotch-Weld(TM) Spray 90

#### **Product Identification Numbers**

YP-2080-6128-0

7000042449

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

#### **Identified uses**

Aerosol Adhesive.

#### 1.3. Details of the supplier of the safety data sheet

Address: 3M United Kingdom PLC, 3M Centre, Cain Road, Bracknell, Berkshire, RG12 8HT.

**Telephone:** +44 (0)1344 858 000 **E Mail:** tox.uk@mmm.com **Website:** www.3M.com/uk

#### 1.4. Emergency telephone number

+44 (0)1344 858 000

## **SECTION 2: Hazard identification**

## 2.1. Classification of the substance or mixture CLP REGULATION (EC) No 1272/2008

#### **CLASSIFICATION:**

Aerosol, Category 1 - Aerosol 1; H222, H229

Serious Eye Damage/Eye Irritation, Category 2 - Eye Irrit. 2; H319

Specific Target Organ Toxicity-Single Exposure, Category 3 - STOT SE 3; H336

Hazardous to the Aquatic Environment (Chronic), Category 2 - Aquatic Chronic 2; H411

For full text of H phrases, see Section 16.

#### 2.2. Label elements

#### CLP REGULATION (EC) No 1272/2008

#### SIGNAL WORD

DANGER.

#### **Symbols:**

GHS02 (Flame) |GHS07 (Exclamation mark) |GHS09 (Environment) |

#### **Pictograms**







#### **Ingredients:**

 Ingredient
 CAS Nbr
 EC No.

 Pentane
 109-66-0
 203-692-4

 Acetone
 67-64-1
 200-662-2

#### **HAZARD STATEMENTS:**

H222 Extremely flammable aerosol.

H229 Pressurised container. may burst if heated.

H319 Causes serious eye irritation.
H336 May cause drowsiness or dizziness.

H411 Toxic to aquatic life with long lasting effects.

#### PRECAUTIONARY STATEMENTS

General:

P102 Keep out of reach of children.

**Prevention:** 

P210A Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

P211 Do not spray on an open flame or other ignition source.

P251 Do not pierce or burn, even after use.

Storage:

P410 + P412 Protect from sunlight. Do not expose to temperatures exceeding 50C/122F.

Disposal:

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

regulations.

#### SUPPLEMENTAL INFORMATION

#### **Supplemental Hazard Statements:**

EUH066 Repeated exposure may cause skin dryness or cracking.

55% of the mixture consists of components of unknown acute oral toxicity.

Contains 7% of components with unknown hazards to the aquatic environment.

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% 1

#### Notes on labelling

H304 is not required on the label because the product is an aerosol.

#### 2.3. Other hazards

None known.

## **SECTION 3: Composition/information on ingredients**

Ingredient	CAS Nbr	EC No.	REACH Registration No.	% by Wt	Classification
Dimethyl Ether	115-10-6	204-065-8		40 - 60	Flam. Gas 1, H220; Liquified gas, H280 - Nota U
Pentane	109-66-0	203-692-4		10 - 30	Flam. Liq. 2, H225; Asp. Tox. 1, H304; STOT SE 3, H336; EUH066; Aquatic Chronic 2, H411 - Nota C
Acetone	67-64-1	200-662-2	01- 2119471330- 49	7 - 13	Flam. Liq. 2, H225; Eye Irrit. 2, H319; STOT SE 3, H336; EUH066
Non-volatiles	Trade Secret			1 - 10	Substance not classified as hazardous
2-methylbutane	78-78-4	201-142-8		1 - 10	Flam. Liq. 1, H224; Asp. Tox. 1, H304; STOT SE 3, H336; EUH066; Aquatic Chronic 2, H411
Cyclohexane	110-82-7	203-806-2		1 - 10	Flam. Liq. 2, H225; Asp. Tox. 1, H304; Skin Irrit. 2, H315; STOT SE 3, H336; Aquatic Acute 1, H400,M=1; Aquatic Chronic 1, H410,M=1
Non-volatiles	Trade Secret			3 - 7	Substance not classified as hazardous
tris(nonylphenyl) phosphite	26523-78-4	247-759-6		0.01 - 0.1	Skin Sens. 1B, H317; Aquatic Acute 1, H400,M=10; Aquatic Chronic 1, H410,M=10

Please see section 16 for the full text of any H statements referred to in this section

For information on ingredient occupational exposure limits or PBT or vPvB status, see sections 8 and 12 of this SDS

## **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

Wash with soap and water. 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. Extinguishing media

Use a fire fighting agent suitable for the surrounding fire.

#### 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**

<b>Substance</b>	<u>Condition</u>
Aldehydes.	During combustion.
Hydrocarbons.	During combustion.
Formaldehyde	During combustion.
Carbon monoxide.	During combustion.
Carbon dioxide.	During combustion.

#### 5.3. Advice 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.

## **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.

#### 6.3. Methods and material for containment and cleaning up

If possible, seal leaking container. Place leaking containers in a well-ventilated area, preferably an operating exhaust hood, or if necessary outdoors on an impermeable surface until appropriate packaging for the leaking container or its contents is available. 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.

#### 6.4. Reference to other sections

Refer to Section 8 and Section 13 for more information

## **SECTION 7: Handling and storage**

#### 7.1. Precautions for safe handling

Keep out of reach of children. Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Do not spray on an open flame or other ignition source. Do not pierce or burn, even after use. 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. Avoid release to the environment. Avoid contact with oxidising agents (eg. chlorine, chromic acid etc.)

#### 7.2. Conditions for safe storage including any incompatibilities

Store in a well-ventilated place. Keep container tightly closed. Protect from sunlight. Do not expose to temperatures exceeding 50C/122F. Store away from heat. Store away from acids. Store away from oxidising agents.

#### 7.3. Specific end use(s)

See information in Section 7.1 and 7.2 for handling and storage recommendations. See Section 8 for exposure controls and personal protection recommendations.

## **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	<b>Additional comments</b>
Pentane	109-66-0	UK HSC	TWA:1800 mg/m <sup>3</sup> (600 ppm)	
Cyclohexane	110-82-7	UK HSC	TWA:350 mg/m <sup>3</sup> (100	
			ppm);STEL:1050 mg/m <sup>3</sup> (300	
			ppm)	
Dimethyl Ether	115-10-6	UK HSC	TWA:766 mg/m <sup>3</sup> (400	
			ppm);STEL:958 mg/m <sup>3</sup> (500	
			ppm)	
Acetone	67-64-1	UK HSC	TWA:1210 mg/m <sup>3</sup> (500	
			ppm);STEL:3620 mg/m <sup>3</sup> (1500	
			ppm)	
2-methylbutane	78-78-4	UK HSC	TWA:1800 mg/m <sup>3</sup> (600 ppm)	
UK HSC: UK Health and Safety Commiss	ion			

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

CEIL: Ceiling

#### **Biological limit values**

No biological 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

Do not remain in area where available oxygen may be reduced. 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:

Indirect vented goggles.

#### 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:

MaterialThickness (mm)Breakthrough TimeNitrile rubber.No data availableNo data available

#### 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 vapours and particulates

Half facepiece or full facepiece supplied-air respirator

Organic vapour respirators may have short service life.

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

#### **SECTION 9: Physical and chemical properties**

#### 9.1. Information on basic physical and chemical properties

Physical stateLiquid.Specific Physical Form:Aerosol

Appearance/Odour Solvent odour: Clear **Odour threshold** No data available. Not applicable. pΗ Boiling point/boiling range Not applicable. **Melting point** Not applicable. Not applicable. Flammability (solid, gas) **Explosive properties** Not classified Not classified **Oxidising properties** 

Flash point >= -55 °C [Test Method:Closed Cup]

Autoignition temperatureNo data available.Flammable Limits(LEL)No data available.Flammable Limits(UEL)No data available.

**Relative density** 0.71 [*Ref Std*:WATER=1]

Water solubility Ni

Solubility- non-waterNot applicable.Partition coefficient: n-octanol/waterNo data available.Evaporation rateNo data available.Vapour densityNo data available.Decomposition temperatureNo data available.

**Viscosity** Not applicable. **Density** 0.71 g/ml

9.2. Other information

Percent volatile 89.6 % weight

## **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 oxidising agents.

#### 10.6 Hazardous decomposition products

Substance

**Condition** 

None known.

Refer to section 5.2 for hazardous decomposition products during combustion.

## **SECTION 11: Toxicological information**

The information below may not agree with the EU material classification in Section 2 and/or the ingredient classifications in Section 3 if specific ingredient classifications are mandated by a competent authority. In addition, statements and data presented in Section 11 are based on UN GHS calculation rules and classifications derived from 3M assessments.

#### 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

Intentional concentration and inhalation may be harmful or fatal. Simple asphyxiation: Signs/symptoms may include increased heart rate, rapid respirations, drowsiness, headache, incoordination, altered judgement, nausea, vomiting, lethargy, seizures, coma, and may be fatal. Respiratory tract irritation: Signs/symptoms may include cough, sneezing, nasal discharge, headache, hoarseness, and nose and throat pain. May cause additional health effects (see below).

#### Skin contact

Dermal Defatting: Signs/symptoms may include localised redness, itching, drying and cracking of skin.

#### 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. May cause additional health effects (see below).

#### **Additional Health Effects:**

#### Single exposure may cause target organ effects:

Central nervous system (CNS) depression: Signs/symptoms may include headache, dizziness, drowsiness, incoordination, nausea, slowed reaction time, slurred speech, giddiness, and unconsciousness.

#### **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 >5,000 mg/kg
Dimethyl Ether	Inhalation- Gas (4	Rat	LC50 164,000 ppm
	hours)		
Pentane	Dermal	Rabbit	LD50 3,000 mg/kg
Pentane	Inhalation-	Rat	LC50 > 18 mg/l
	Vapour (4		
D	hours) Ingestion	Rat	I D50 > 2 000 /l
Pentane	- U		LD50 > 2,000 mg/kg
Acetone	Dermal	Rabbit	LD50 > 15,688 mg/kg
Acetone	Inhalation-	Rat	LC50 76 mg/l
	Vapour (4		
A	hours)	Rat	I D50 5 900 /l
Acetone	Ingestion	Rabbit	LD50 5,800 mg/kg
2-methylbutane	Dermal		LD50 3,000 mg/kg
2-methylbutane	Inhalation-	Rat	LC50 > 18 mg/l
	Vapour (4 hours)		
2-methylbutane	Ingestion	Rat	LD50 > 2,000 mg/kg
Non-volatiles	Dermal	Kat	LD50 > 2,000 mg/kg  LD50 estimated to be > 5,000 mg/kg
		<u> </u>	, , ,
Non-volatiles	Ingestion	Rat	LD50 > 34,000 mg/kg
Cyclohexane	Dermal	Rat	LD50 > 2,000 mg/kg
Cyclohexane	Inhalation-	Rat	LC50 > 32.9  mg/l
	Vapour (4		
	hours)		
Cyclohexane	Ingestion	Rat	LD50 6,200 mg/kg
Non-volatiles	Dermal	Rabbit	LD50 > 2,000 mg/kg
Non-volatiles	Ingestion	Rat	LD50 > 5,000 mg/kg
tris(nonylphenyl) phosphite	Dermal	Rabbit	LD50 > 2,000 mg/kg
tris(nonylphenyl) phosphite	Ingestion	Rat	LD50 19,500 mg/kg

ATE = acute toxicity estimate

#### **Skin Corrosion/Irritation**

Name	Species	Value
Pentane	Rabbit	Minimal irritation
Acetone	Mouse	Minimal irritation
2-methylbutane	Rabbit	Minimal irritation
Cyclohexane	Rabbit	Mild irritant
Non-volatiles	Professio	No significant irritation
	nal	
	judgemen	
	t	

tris(nonylphenyl) phosphite	Rabbit	No significant irritation

## **Serious Eye Damage/Irritation**

Name	Species	Value
Pentane	Rabbit	Mild irritant
Acetone	Rabbit	Severe irritant
2-methylbutane	Rabbit	Mild irritant
Cyclohexane	Rabbit	Mild irritant
tris(nonylphenyl) phosphite	Rabbit	No significant irritation

#### **Skin Sensitisation**

Name	Species	Value
Pentane	Guinea	Not classified
	pig	
2-methylbutane	Guinea	Not classified
	pig	
tris(nonylphenyl) phosphite	Guinea	Sensitising
	pig	

## **Respiratory Sensitisation**

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

**Germ Cell Mutagenicity** 

Name	Route	Value	
Dimethyl Ether	In Vitro	Not mutagenic	
Dimethyl Ether	In vivo	Not mutagenic	
Pentane	In vivo	Not mutagenic	
Pentane	In Vitro	Some positive data exist, but the data are not sufficient for classification	
Acetone	In vivo	Not mutagenic	
Acetone	In Vitro	Some positive data exist, but the data are not sufficient for classification	
2-methylbutane	In vivo	Not mutagenic	
2-methylbutane	In Vitro	Some positive data exist, but the data are not sufficient for classification	
Cyclohexane	In Vitro	Not mutagenic	
Cyclohexane	In vivo	Some positive data exist, but the data are not sufficient for classification	
tris(nonylphenyl) phosphite	In Vitro	Not mutagenic	

Carcinogenicity

Name	Route	Species	Value
Dimethyl Ether	Inhalation	Rat	Not carcinogenic
Acetone	Not specified.	Multiple animal species	Not carcinogenic
tris(nonylphenyl) phosphite	Ingestion	Rat	Not carcinogenic

## **Reproductive Toxicity**

Reproductive and/or Developmental Effects

Name	Route	Value	Species	Test result	Exposure Duration
Dimethyl Ether	Inhalation	Not classified for development	Rat	NOAEL 40,000 ppm	during organogenesis
Pentane	Ingestion	Not classified for development	Rat	NOAEL 1,000 mg/kg/day	during organogenesis
Pentane	Inhalation	Not classified for development	Rat	NOAEL 30	during

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				mg/l	organogenesis
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-methylbutane	Ingestion	Not classified for development	Rat	NOAEL 1,000 mg/kg/day	during organogenesis
2-methylbutane	Inhalation	Not classified for development	Rat	NOAEL 30 mg/l	during organogenesis
Cyclohexane	Inhalation	Not classified for female reproduction	Rat	NOAEL 24 mg/l	2 generation
Cyclohexane	Inhalation	Not classified for male reproduction	Rat	NOAEL 24 mg/l	2 generation
Cyclohexane	Inhalation	Not classified for development	Rat	NOAEL 6.9 mg/l	2 generation
tris(nonylphenyl) phosphite	Ingestion	Not classified for development	Rat	NOAEL 1,000 mg/kg/day	1 generation
tris(nonylphenyl) phosphite	Ingestion	Not classified for female reproduction	Rat	NOAEL 200 mg/kg/day	1 generation
tris(nonylphenyl) phosphite	Ingestion	Not classified for male reproduction	Rat	NOAEL 1,000 mg/kg/day	1 generation

## Target Organ(s)

**Specific Target Organ Toxicity - single exposure** 

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration	
Dimethyl Ether	Inhalation	central nervous system depression	May cause drowsiness or dizziness	Rat	LOAEL 10,000 ppm	30 minutes	
Dimethyl Ether	Inhalation	cardiac sensitisation	Some positive data exist, but the data are not sufficient for classification	Dog	NOAEL 100,000 ppm	5 minutes	
Pentane	Inhalation	central nervous system depression	May cause drowsiness or dizziness	Multiple animal species	NOAEL Not available	not available	
Pentane	Inhalation	respiratory irritation	Some positive data exist, but the data are not sufficient for classification	Not available	NOAEL Not available	not available	
Pentane	Inhalation	cardiac sensitisation	1 10		NOAEL Not available	not available	
Pentane	Ingestion	central nervous system depression			NOAEL Not available	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	
2-methylbutane	Inhalation	central nervous system depression	May cause drowsiness or dizziness	Multiple animal species	NOAEL Not available	not available	
2-methylbutane	Inhalation	respiratory irritation	Some positive data exist, but the data are not sufficient for classification	Not available	NOAEL Not available	not available	
2-methylbutane	Inhalation	cardiac sensitisation	Not classified	Dog	NOAEL Not available	not available	

2-methylbutane	Ingestion	central nervous	May cause drowsiness or	Professio	NOAEL Not	not available
		system depression	dizziness	nal	available	
				judgeme		
				nt		
Cyclohexane	Inhalation	central nervous	May cause drowsiness or	Human	NOAEL Not	
		system depression	dizziness	and	available	
				animal		
Cyclohexane	Inhalation	respiratory irritation	Some positive data exist, but the	Human	NOAEL Not	
			data are not sufficient for	and	available	
			classification	animal		
Cyclohexane	Ingestion	central nervous	May cause drowsiness or	Professio	NOAEL Not	
		system depression	dizziness	nal	available	
				judgeme		
				nt		

**Specific Target Organ Toxicity - repeated exposure** 

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Dimethyl Ether	Inhalation	hematopoietic system	Not classified	Rat	NOAEL 25,000 ppm	2 years
Dimethyl Ether	Inhalation	liver	Not classified	Rat	NOAEL 20,000 ppm	30 weeks
Pentane	Inhalation	peripheral nervous system	Not classified	Human	NOAEL Not available	occupational exposure
Pentane	Inhalation	heart   skin   endocrine system   bone, teeth, nails, and/or hair   hematopoietic system   liver   immune system   muscles   nervous system   eyes   kidney and/or bladder   respiratory system	Not classified	Rat	NOAEL 20 mg/l	13 weeks
Pentane	Ingestion	kidney and/or bladder	Not classified	Rat	NOAEL 2,000 mg/kg/day	28 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
2-methylbutane	Inhalation	peripheral nervous system	Not classified	Human	NOAEL Not available	occupational exposure
2-methylbutane	Inhalation	heart   skin   endocrine system   bone, teeth, nails, and/or hair   hematopoietic system   liver   immune system   muscles   nervous system   eyes   kidney and/or bladder   respiratory system	Not classified	Rat	NOAEL 20 mg/l	13 weeks
2-methylbutane	Ingestion	kidney and/or bladder	Not classified	Rat	NOAEL 2,000 mg/kg/day	28 days
Cyclohexane	Inhalation	liver	Not classified	Rat	NOAEL 24 mg/l	90 days
Cyclohexane	Inhalation	auditory system	Not classified	Rat	NOAEL 1.7 mg/l	90 days
Cyclohexane	Inhalation	kidney and/or bladder	Not classified	Rabbit	NOAEL 2.7 mg/l	10 weeks
Cyclohexane	Inhalation	hematopoietic system	Not classified	Mouse	NOAEL 24 mg/l	14 weeks
Cyclohexane	Inhalation	peripheral nervous system	Not classified	Rat	NOAEL 8.6 mg/l	30 weeks
tris(nonylphenyl) phosphite	Ingestion	liver	Not classified	Rat	NOAEL 500 mg/kg/day	2 years
tris(nonylphenyl) phosphite	Ingestion	kidney and/or bladder	Not classified	Rat	NOAEL 200 mg/kg/day	1 generation
tris(nonylphenyl) phosphite	Ingestion	respiratory system	Not classified	Rat	NOAEL 500 mg/kg/day	2 years

#### **Aspiration Hazard**

Name	Value
Pentane	Aspiration hazard
2-methylbutane	Aspiration hazard
Cyclohexane	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 agree with the EU material classification in Section 2 and/or the ingredient classifications in Section 3 if specific ingredient classifications are mandated by a competent authority. In addition, statements and data presented in Section 12 are based on UN GHS calculation rules and classifications derived from 3M assessments.

#### 12.1. Toxicity

No product test data available.

Material	CAS Nbr	Organism	Туре	Exposure	Test endpoint	Test result
tris(nonylpheny	26523-78-4	Water flea	Experimental	48 hours	EC50	0.3 mg/l
l) phosphite						
tris(nonylpheny	26523-78-4	Zebra Fish	Experimental	96 hours	LC50	10 mg/l
l) phosphite						

tris(nonylpheny	26523-78-4	Green algae	Experimental	72 hours	NOEC	100 mg/l
l) phosphite						
Non-volatiles	Trade Secret		Data not			
			available or			
			insufficient for			
			classification			
Non-volatiles	Trade Secret		Data not			
			available or			
			insufficient for			
			classification			
Acetone	67-64-1	Water flea	Experimental	48 hours	EC50	13,500 mg/l
Acetone	67-64-1	Rainbow trout	Experimental	96 hours	LC50	5,540 mg/l
Acetone	67-64-1	Algae other	Experimental	96 hours	EC50	11,493 mg/l
Acetone	67-64-1	Water flea	Experimental	21 days	NOEC	1,000 mg/l
Dimethyl Ether	115-10-6	Guppy	Experimental	96 hours	LC50	>4,000 mg/l
Dimethyl Ether	115-10-6	Water flea	Experimental	48 hours	EC50	>4,000 mg/l
Cyclohexane	110-82-7	Water flea	Experimental	48 hours	EC50	0.9 mg/l
Cyclohexane	110-82-7	Green Algae	Experimental	72 hours	EC50	3.4 mg/l
Cyclohexane	110-82-7	Fathead	Experimental	96 hours	LC50	4.53 mg/l
		minnow				
Pentane	109-66-0	Rainbow trout	Experimental	96 hours	LC50	4.26 mg/l
Pentane	109-66-0	Water flea	Experimental	48 hours	EC50	2.7 mg/l
Pentane	109-66-0	Green Algae	Experimental	72 hours	EC50	7.51 mg/l
Pentane	109-66-0	Green Algae	Experimental	72 hours	NOEC	2.04 mg/l
2-methylbutane	78-78-4		Data not			
-			available or			
			insufficient for			
			classification			

## 12.2. Persistence and degradability

Material	CAS Nbr	Test type	Duration	Study Type	Test result	Protocol
Pentane	109-66-0	Experimental Photolysis		Photolytic half- life (in air)	8.07 days (t 1/2)	Other methods
Pentane	109-66-0	Experimental Biodegradation	28 days	BOD	96 % weight	OECD 301C - MITI test (I)
Cyclohexane	110-82-7	Experimental Photolysis		Photolytic half- life (in air)	4.14 days (t 1/2)	Other methods
Cyclohexane	110-82-7	Experimental Biodegradation	28 days	BOD	77 % weight	OECD 301F - Manometric respirometry
Dimethyl Ether	115-10-6	Experimental Photolysis		Photolytic half- life (in air)	10.77 days (t 1/2)	Other methods
tris(nonylpheny l) phosphite	26523-78-4	Experimental Hydrolysis		Hydrolytic half-life	14 hours (t 1/2)	Other methods
tris(nonylpheny l) phosphite	26523-78-4	Experimental Biodegradation	28 days	Dissolv. Organic Carbon Deplet	<4 % weight	OECD 301D - Closed bottle test
Non-volatiles	Trade Secret	Experimental Biodegradation	28 days	BOD	0 % weight	OECD 301C - MITI test (I)
Acetone	67-64-1	Experimental Biodegradation	28 days	BOD	96 % weight	OECD 301C - MITI test (I)
2-methylbutane	78-78-4	Experimental Photolysis		Photolytic half- life (in air)	8.11 days (t 1/2)	Other methods

#### 12.3 : Bioaccumulative potential

Material	CAS Nbr	Test type	Duration	Study Type	Test result	Protocol
Pentane	109-66-0	Estimated		Bioaccumulatio	26	Estimated:
		Bioconcentrati		n factor		Bioconcentration factor
		on				
Cyclohexane	110-82-7	Experimental	56 days	Bioaccumulatio	<129	Other methods
		BCF-Carp		n factor		
Dimethyl Ether	115-10-6	Experimental		Log Kow	0.2	Other methods
		Bioconcentrati				
		on				
tris(nonylpheny	26523-78-4	Estimated		Bioaccumulatio	7.64	Estimated:
l) phosphite		Bioconcentrati		n factor		Bioconcentration factor
		on				
Non-volatiles	Trade Secret	Data not	N/A	N/A	N/A	N/A
		available or				
		insufficient for				
		classification				
Acetone	67-64-1	Experimental		Bioaccumulatio	0.65	Other methods
		BCF - Other		n factor		
2-methylbutane	78-78-4	Estimated BCF		Bioaccumulatio	65	Estimated:
		- Other		n factor		Bioconcentration factor
Non-volatiles	Trade Secret	Data not	N/A	N/A	N/A	N/A
		available or				
		insufficient for				
		classification				

#### 12.4. Mobility in soil

Please contact manufacturer for more details

#### 12.5. Results of the PBT and vPvB assessment

No information available at this time, contact manufacturer for more details

#### 12.6. Other adverse effects

No information available.

## **SECTION 13: Disposal considerations**

#### 13.1 Waste treatment methods

See Section 11.1 Information on toxicological effects

Incinerate in a permitted waste incineration facility. Facility must be capable of handling aerosol cans. As a disposal alternative, utilize an acceptable permitted waste disposal facility. 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.

The coding of a waste stream is based on the application of the product by the consumer. Since this is out of the control of 3M, no waste code(s) for products after use will be provided. Please refer to the European Waste Code (EWC - 2000/532/EC and amendments) to assign the correct waste code to your waste stream. Ensure national and/or regional regulations are complied with and always use a licensed waste contractor.

#### EU waste code (product as sold)

08 04 09\* Waste adhesives and sealants containing organic solvents or other dangerous substances
16 05 04\* Gases in pressure containers (including halons) containing dangerous substances

## EU waste code (product container after use)

15 01 04 Metallic packaging

## **SECTION 14: Transportation information**

YP-2080-6128-0

ADR/RID: UN1950, AEROSOLS, LIMITED QUANTITY, 2.1, (E), ADR Classification Code: 5F.

IMDG-CODE: UN1950, AEROSOLS, 2.1, IMDG-Code segregation code: NONE, LIMITED QUANTITY, EMS: FD,SU.

ICAO/IATA: UN1950, AEROSOLS, FLAMMABLE, 2.1.

## **SECTION 15: Regulatory information**

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

#### Carcinogenicity

IngredientCAS NbrClassificationRegulationNon-volatilesTrade SecretGr. 3: Not classifiableInternational Agency<br/>for Research on Cancer

#### Global inventory status

Contact 3M for more information.

#### 15.2. Chemical Safety Assessment

Not applicable

DIMINA

## **SECTION 16: Other information**

#### List of relevant H statements

EUH066	Repeated exposure may cause skin dryness or cracking
H220	Extremely flammable gas.
H222	Extremely flammable aerosol.
H224	Extremely flammable liquid and vapour.
H225	Highly flammable liquid and vapour.
H229	Pressurised container. may burst if heated.
H280	Contains gas under pressure; may explode if heated.
H304	May be fatal if swallowed and enters airways.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H336	May cause drowsiness or dizziness.
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
H411	Toxic to aquatic life with long lasting effects.

#### **Revision information:**

Section 01: SAP Material Numbers information was added.

CLP: Ingredient table information was modified.

- Section 3: Composition/Information of ingredients table information was added.
- Section 3: Composition/Information of ingredients table information was deleted.
- Section 3: Reference to section 15 for Nota info information was deleted.
- Section 6: Accidental release personal information information was modified.
- Section 9: Property description for optional properties information was added.
- Section 9: Property description for optional properties information was deleted.
- Section 9: Relative density information information was modified.
- Section 11: Acute Toxicity table information was modified.
- Section 11: Carcinogenicity Table information was modified.
- Section 11: Germ Cell Mutagenicity Table information was modified.
- Section 11: Reproductive Toxicity Table information was modified.
- Section 11: Serious Eye Damage/Irritation Table information was modified.
- Section 11: Skin Corrosion/Irritation Table information was modified.
- Section 11: Skin Sensitization Table information was modified.
- Section 11: Target Organs Repeated Table information was modified.
- Section 11: Target Organs Single Table information was modified.
- Section 12: Component ecotoxicity information information was modified.
- Section 12: Persistence and Degradability information information was modified.
- Section 12:Bioccumulative potential information information was modified.

Two-column table displaying the unique list of H Codes and statements (std phrases) for all components of the given material. information was modified.

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 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 United Kingdom MSDSs are available at www.3M.com/uk