

Material Safety Data Sheet

Infosafe No. 2LT1W Issue Date: March 2005
Product Name: **LOCTITE 7471 ACTIVATOR**

ISSUED by LOCTITE

Classified as hazardous

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND COMPANY

Product Name

LOCTITE 7471 ACTIVATOR

Product Code

24062

Product Use

Used to cure LOCTITE anaerobic adhesives on inactive surfaces and speed their cure on active surfaces.

Company Name

HENKEL AUSTRALIA PTY LTD (ABN 82 001 302 996)

Address

1 Clyde Street Silverwater
NSW 2229 Australia

Emergency Tel.

See CONTACT POINT

Telephone/Telex Number

Tel: 1300 885 556 Fax: (03) 9761 5877

Other Information

IMPORTANT NOTICE: This Material Safety Data Sheet (MSDS) is issued by Henkel Australia Pty Ltd in accordance with National Occupational Health and Safety Commission (NOHSC) guidelines. The information contained herein must not be altered, deleted or added to. Henkel Australia will issue new MSDSs when there is a change in product specifications and/or NOHSC guidelines/regulations. Henkel Australia has no objection to its MSDS being copied if: (a) the copy is made for safety related purposes; and (b) no alterations or amendments are made to the text or format of the MSDS. Henkel Australia does not guarantee the accuracy of any MSDS for our products which: (a) is not prepared by Henkel Australia; (b) is not authorised by Henkel Australia; (c) is not in the format originally supplied by Henkel Australia; or (d) has otherwise been amended or altered by a third party. Copyright [c] Henkel Australia Pty Ltd.

2. COMPOSITION/INFORMATION ON INGREDIENTS

Product Name : LOCTITE 7471 ACTIVATOR

Ingredients	<u>Name</u>	<u>CAS</u>	<u>Proportion</u>	<u>Hazard</u>	<u>R</u> <u>Phrase</u>
	Acetone	67-64-1	60-100 %		
	Isopropyl alcohol	67-63-0	10-30 %		
	Ethanol, 2,2'-[(4-methylphenyl)imino]bis-	3077-12-1	1-5 %		
	2-Mercaptobenzothiazole	149-30-4	0.1-1 %		

3. HAZARDS IDENTIFICATION

Classified as hazardous according to the criteria of NOHSC.

Classified as a dangerous good according to the ADG Code.

Risk phrases:

R11 Highly flammable.

R36 Irritating to eyes.

R43 May cause sensitization by skin contact.

R66 Repeated exposure may cause skin dryness and cracking.

R67 Vapours may cause drowsiness and dizziness

Safety phrases:

S16 Keep away from sources of ignition - No smoking.

S2 Keep out of reach of children.

S23 Do not breathe gas/fumes/vapour/spray

S24/25 Avoid contact with skin and eyes.

S26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

S29 Do not empty into drains.

S33 Take precautionary measures against static discharges.

S37/39 Wear suitable gloves and eye/face protection.

S51 Use only in well ventilated areas.

4. FIRST AID MEASURES

Inhalation

Remove the source of contamination or move the victim to fresh air. Ensure airways are clear and have qualified person give oxygen through a face mask if breathing is difficult. If symptoms develop seek medical attention.

Ingestion

Do NOT induce vomiting. Wash out mouth with water. Seek medical attention.

Skin

Wash affected area thoroughly with copious amounts of running water. Remove contaminated clothing and wash before reuse or discard. If symptoms develop seek medical attention.

Eye

If contact with the eye(s) occurs, wash with copious amounts of water holding eyelid(s) open. Take care not to rinse contaminated water into the non-affected eye. If symptoms persist seek medical attention.

First Aid**Facilities**

Eye wash and normal washroom facilities.

Advice to Doctor

Treat symptomatically or consult a Poisons Information Centre (Phone 131 126).

5. FIRE FIGHTING MEASURES

Extinguishing**Media**

Use foam, carbon dioxide and dry chemical. Do not use water jets. Keep containers cool with water spray.

Specific Hazards

This product is highly flammable. Vapours are heavier than air and will 'travel' to low-level areas e.g. sumps, drains, etc. and flashback. Precautions should be taken to eliminate the build up of explosive mixtures.

Hazardous**Combustion****Products**

Under fire conditions this product may emit toxic and/or irritating fumes including carbon monoxide, carbon dioxide and oxides of nitrogen and sulphur.

Precautions in connection with**Fire**

Fire-fighters should wear full protective clothing and self contained breathing apparatus (SCBA) operated in positive pressure mode.

6. ACCIDENTAL RELEASE MEASURES

Wear appropriate personal protective equipment and clothing to minimise exposure. Extinguish or remove all sources of ignition and stop leak if safe to do so. Increase ventilation. Evacuate all unnecessary personnel. If possible contain the spill. Place inert absorbent material onto spillage. Use clean non-sparking tools to collect the material and place into a suitable labelled container. Do not dilute material but contain. Dispose of waste according to federal, Environmental Protection Authority and state regulations. If large quantities of this material enter the waterways contact the Environmental Protection Authority, or your local Waste Management Authority.

7. HANDLING AND STORAGE

Handling

Open containers cautiously as contents may be under pressure. Use only in a well ventilated area. DO NOT store or use in confined spaces. Do not enter these areas without respiratory protection or until the atmosphere has been checked. Keep tank covered and containers sealed when not in use. Build up of mists or vapours in the atmosphere must be prevented. Avoid inhalation of vapour and mists. Do not use near welding or other ignition sources and avoid sparks. Do NOT pressurise, cut, heat or weld containers as they may contain hazardous residues. Do not smoke. When dealing with large quantities, repeated or prolonged exposure without protection should be prevented in order to lessen the possibility of disorders. It is essential that all who come into contact with this material maintain high standards of personal hygiene ie. Washing hands prior to eating, drinking, smoking or using toilet facilities.

Storage

Store in a cool, dry, well-ventilated area away from sources of ignition, oxidising agents, foodstuffs, and clothing and out of direct sunlight. Keep containers closed when not in use and securely sealed and protected against physical damage. Inspect regularly for deficiencies such as damage or leaks. Always keep in containers made of the same material as the supply container. Have appropriate fire extinguishers available in and near the storage area. Take precautions against static electricity discharges. Use proper grounding procedures. For information on the design of the storeroom, reference may be made to Australian Standard AS1940 - The storage and handling of flammable and combustible liquids. Reference should also be made to all State and Federal regulations.

8. EXPOSURE CONTROLS, PERSONAL PROTECTION

Exposure Limits

No exposure limits have been established for this material by the National Occupational Health And Safety Commission (NOHSC), however for the constituents;

SUBSTANCE	TWA		STEL	
	ppm	mg/m ³	ppm	mg/m ³
Acetone	500	1185	1000	2375
Isopropyl alcohol	400	983	500	1230

Other Exposure Information

TWA - the Time-Weighted Average airborne concentration over an eight-hour working day, for a five-day working week over an entire working life.

STEL (Short Term Exposure Limit) - the average airborne concentration over a 15 minute period which should not be exceeded at any time during a normal eight-hour workday.

Respiratory Protection

If engineering controls are not effective in controlling airborne exposure then respiratory protective equipment should be used suitable for protecting against airborne contaminants. Final choice of appropriate breathing protection is

dependant upon actual airborne concentrations and the type of breathing protection required will vary according to individual circumstances. Expert advice may be required to make this decision. Reference should be made to Australian Standards AS/NZS 1715, Selection, Use and maintenance of Respiratory Protective Devices; and AS/NZS 1716, Respiratory Protective Devices.

Eye Protection

Safety glasses with side shields, goggles or full-face shield as appropriate recommended. Final choice of appropriate eye/face protection will vary according to individual circumstances i.e. methods of handling or engineering controls and according to risk assessments undertaken. Eye protection should conform with Australian/New Zealand Standard AS/NZS 1337 - Eye Protectors for Industrial Applications.

Hand Protection

Wear gloves of impervious material. Final choice of appropriate gloves will vary according to individual circumstances i.e. methods of handling or according to risk assessments undertaken. Reference should be made to AS/NZS 2161.1: Occupational protective gloves - Selection, use and maintenance.

Body Protection

Wear appropriate clothing including chemical resistant apron where clothing is likely to be contaminated. It is advisable that a local supplier of personal protective clothing is consulted regarding the choice of material.

Eng. Controls

Provide sufficient ventilation to keep airborne levels below the exposure limit. Where vapours or mists are generated, particularly in enclosed areas, and natural ventilation is inadequate, a flameproof exhaust ventilation system is required. Refer to AS 1940 - The storage and handling of flammable and combustible liquids and AS/NZS 2430.3.1:1997 : Classification of hazardous areas - Examples of area classification - General, for further information concerning ventilation requirements.

Other Information

Biological Limit Values: No biological limit allocated.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance

Yellow/amber liquid

Odour

Acetone odour

Melting Point

Not available

Boiling Point

Not available

Solubility in**Water**

Miscible

Product Name : LOCTITE 7471 ACTIVATOR

**Specific Gravity
(H₂O=1)**

0.795

pH Value

Not available

Vapour Pressure

172 mmHg @ 25°C

**Vapour Density
(Air=1)**

Not available

Flash Point

-8.3°C

Flammability

HIGHLY FLAMMABLE. This product should be stored and used in a well ventilated area away from naked flames, sparks and other sources of ignition. Electrically link and ground metal containers for transfers of the product to prevent accumulation of static electricity. Keep the container tightly closed.

Ignition**Temperature**

Not available

Flammable Limits**LEL**

Not available

Flammable Limits**UEL**

Not available

10. STABILITY AND REACTIVITY

Stability

Stable under normal conditions of storage and handling.

Hazardous**Polymerization**

Will not occur.

Materials to Avoid

Avoid contact with strong oxidising agents.

Hazardous**Decomposition****Products**

Thermal decomposition may result in the release of toxic and/or irritating fumes including carbon monoxide, carbon dioxide and oxides of nitrogen and sulphur.

Hazardous Reaction

Will react with strong oxidising agents.

Conditions to Avoid

Heat, direct sunlight, open flames or other sources of ignition.

11. TOXICOLOGICAL INFORMATION

Toxicology Information

No toxicity data is available for this specific product, however toxicity data for constituents are stated below:

Acetone:

LD50 (oral, rat): 5,800 mg/kg

LC50 (Inhalation, rat): 50,100 mg/m³/8H

LD50 (dermal, rabbit): 20,000 mg/kg

Isopropyl alcohol:

LD50 (oral, rat): 5,045 mg/kg

LC50 (Inhalation, rat): 16,000 ppm/8H

LD50 (dermal, rabbit): 12,800 mg/kg

Inhalation

May cause irritation to the mucous membrane and upper airways, especially where vapours or mists are generated. Symptoms include sneezing, coughing, wheezing, shortness of breath, headache, dizziness, nausea and vomiting.

Ingestion

Ingestion of this product may irritate the gastric tract causing nausea and vomiting.

Skin

May cause redness, itching and irritation. Prolonged contact with skin may cause blistering, and repeated contact may have a defatting effect causing dryness and cracking.

Eye

Irritating to eyes. On eye contact this product will cause tearing, stinging, blurred vision, and redness.

Chronic Effects

Prolonged or repeated skin contact may lead to allergic contact dermatitis and sensitisation in some individuals. Prolonged inhalation may cause central nervous system depression with symptoms including dizziness, drowsiness, nausea and headaches.

12. ECOLOGICAL INFORMATION

Environ. Protection

Do not allow product to enter drains, waterways or sewers.

Product Name : LOCTITE 7471 ACTIVATOR

Mobility

No data is available for this material.

**Persistence /
Degradability**

No data is available for this material.

Ecotoxicity

No data is available for this material.

13. DISPOSAL CONSIDERATIONS

Dispose of waste according to federal, EPA and state regulations. Labels should not be removed from containers until they have been cleaned. Do not cut, puncture or weld on or near containers. Empty containers may contain hazardous residues. Contaminated containers must not be treated as household waste. Containers should be cleaned by appropriate methods and then re-used or disposed of by landfill or incineration as appropriate. Do not incinerate closed containers. Advise highly flammable nature.

14. TRANSPORT INFORMATION

This material is classified as a Class 3 (Flammable Liquid) Dangerous Good according to the Australian Code for the Transport of Dangerous Goods by Road and Rail. Dangerous goods of Class 3 (Flammable Liquid) are incompatible in a placard load with any of the following:

- Class 1, Explosive
- Class 2.1, Flammable Gas, if both the Class 3 and Class 2.1 dangerous goods are in bulk
- Class 2.3, Toxic Gas
- Class 4.2, Spontaneously Combustible Substance
- Class 5.1, Oxidising Agent
- Class 5.2, Organic Peroxide
- Class 6, Toxic and Infectious Substances, if the Class 3 dangerous goods are nitromethane
- Class 7, Radioactive Substance

U.N. Number

1993

**Proper Shipping
Name**

FLAMMABLE LIQUIDS, N.O.S. - (CONTAINS ACETONE AND ISOPROPYL ALCOHOL)

DG Class

3

Hazchem Code

3[Y]E

EPG Number

Product Name : LOCTITE 7471 ACTIVATOR

3A1

Packing Group

II

IERG Number

14

15. REGULATORY INFORMATION

Risk Phrase

R11 Highly flammable.

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Safety Phrase

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S51 Use only in well ventilated areas.

Poisons Schedule

S5

Hazard Category

Irritant

16. OTHER INFORMATION

Contact**Person/Point**

Technical Services Manager: Gerard Buys 1300 885 556 / 0411 669 002

SDS History

MSDS Review: March 2005

Supersedes: March 2000

...End Of MSDS...