

Revision Number: 008.0 Issue date: 01/22/2018

# 1. PRODUCT AND COMPANY IDENTIFICATION

Loctite(R) 545 Thread Sealant **Product name:** IDH number: 303420 Product type: Anaerobic Sealant Item number: 32429 Restriction of Use: None identified

Company address: Henkel Corporation

One Henkel Wav

Rocky Hill, Connecticut 06067

Region: **United States** Contact information:

Telephone: +1 (860) 571-5100

MEDICAL EMERGENCY Phone: Poison Control Center 1-877-671-4608 (toll free) or 1-303-592-1711 TRANSPORT EMERGENCY Phone: CHEMTREC

1-800-424-9300 (toll free) or 1-703-527-3887 Internet: www.henkelna.com

## 2. HAZARDS IDENTIFICATION

**EMERGENCY OVERVIEW** 

WARNING: CAUSES SKIN IRRITATION.

MAY CAUSE AN ALLERGIC SKIN REACTION.

CAUSES SERIOUS EYE IRRITATION. SUSPECTED OF CAUSING CANCER.

MAY CAUSE DAMAGE TO ORGANS THROUGH PROLONGED OR

REPEATED EXPOSURE.

HAZARD CLASS	HAZARD CATEGORY
SKIN IRRITATION	2
EYE IRRITATION	2A
SKIN SENSITIZATION	1
CARCINOGENICITY	2
SPECIFIC TARGET ORGAN TOXICITY - REPEATED EXPOSURE	2





#### **Precautionary Statements**

Prevention: Obtain special instructions before use. Do not handle until all safety precautions have been

read and understood. Do not breathe vapors, mist, or spray. Wash affected area thoroughly after handling. Contaminated work clothing should not be allowed out of the workplace. Wear

protective gloves, clothing, eye and face protection.

IF ON SKIN: Wash with plenty of water. IF IN EYES: Rinse cautiously with water for several Response:

minutes. Remove contact lenses, if present and easy to do. Continue rinsing. IF exposed or concerned: Get medical attention. If skin irritation or rash occurs: Get medical attention. If eve

irritation persists: Get medical attention. Take off contaminated clothing.

Storage: Store locked up.

Disposal: Dispose of contents and/or container according to Federal, State/Provincial and local

governmental regulations.

Classification complies with OSHA Hazard Communication Standard (29 CFR 1910.1200) and is consistent with the provisions of the United Nations Globally Harmonized System of Classification and Labeling of Chemicals (GHS).

## 3. COMPOSITION / INFORMATION ON INGREDIENTS

Hazardous Component(s)	CAS Number	Percentage*	
Polyglycol dioctanoate	18268-70-7	40 - 50	
2-Hydroxyethyl methacrylate	868-77-9	10 - 20	
Silica, amorphous, fumed, crystal-free	112945-52-5	1 - 5	
Cumene hydroperoxide	80-15-9	1 - 5	
1-Acetyl-2-phenylhydrazine	114-83-0	0.1 - 1	
Cumene	98-82-8	0.1 - 1	
Methacrylic acid	79-41-4	0.1 - 1	

<sup>\*</sup> Exact percentages may vary or are trade secret. Concentration range is provided to assist users in providing appropriate protections.

# 4. FIRST AID MEASURES

Inhalation: Move to fresh air. If not breathing, give artificial respiration. If breathing is

difficult, give oxygen. Get medical attention.

Skin contact: Immediately flush skin with plenty of water (using soap, if available). Remove

contaminated clothing and footwear. Wash clothing before reuse. Get medical

attention.

Eye contact: Rinse immediately with plenty of water, also under the eyelids, for at least 15

minutes. Get medical attention.

**Ingestion:** DO NOT induce vomiting unless directed to do so by medical personnel.

Never give anything by mouth to an unconscious person. Get medical

attention.

Symptoms: See Section 11.

# 5. FIRE FIGHTING MEASURES

Extinguishing media: Water spray (fog), foam, dry chemical or carbon dioxide.

Special firefighting procedures: Wear self-contained breathing apparatus and full protective clothing, such as

turn-out gear. In case of fire, keep containers cool with water spray.

Uncontrolled polymerization may occur at high temperatures resulting in

explosions or rupture of storage containers.

Hazardous combustion products: Oxides of carbon. Oxides of sulfur. Oxides of nitrogen. Irritating organic

vapours. Phenolics.

# 6. ACCIDENTAL RELEASE MEASURES

Use personal protection recommended in Section 8, isolate the hazard area and deny entry to unnecessary and unprotected personnel.

**Environmental precautions:** Do not allow product to enter sewer or waterways.

Clean-up methods: Remove all sources of ignition. Evacuate and ventilate spill area; dike spill to

prevent entry into water system; wear full protective equipment during cleanup. Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Scrape up as much material as possible. Store in a partly filled, closed container until disposal. Refer to Section 8 "Exposure

Controls / Personal Protection" prior to clean up.

IDH number: 303420 Product name: Loctite(R) 545 Thread Sealant

# 7. HANDLING AND STORAGE

Handling: Use only with adequate ventilation. Prevent contact with eyes, skin and

clothing. Do not breathe vapor and mist. Wash thoroughly after handling.

Keep container closed. Refer to Section 8.

Storage: For safe storage, store between 0 °C (32°F) and 32 °C (89.6 °F)

Keep in a cool, well ventilated area away from heat, sparks and open flame.

Keep container tightly closed until ready for use.

# 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Employers should complete an assessment of all workplaces to determine the need for, and selection of, proper exposure controls and protective equipment for each task performed.

Hazardous Component(s)	ACGIH TLV	OSHA PEL	AIHA WEEL	OTHER
Polyglycol dioctanoate	None	None	None	None
2-Hydroxyethyl methacrylate	None	None	None	3 ppm Ceiling
Silica, amorphous, fumed, crystal-free	10 mg/m3 TWA Inhalable dust. 3 mg/m3 TWA Respirable fraction.	20 MPPCF TWA 0.8 mg/m3 TWA	None	None
Cumene hydroperoxide	None	None	1 ppm (6 mg/m3) TWA (SKIN)	None
1-Acetyl-2-phenylhydrazine	None	None	None	None
Cumene	50 ppm TWA	50 ppm (245 mg/m3) PEL (SKIN)	None	None
Methacrylic acid	20 ppm TWA	None	None	None

Engineering controls: Provide adequate local exhaust ventilation to maintain worker exposure below

exposure limits.

Respiratory protection: Use NIOSH approved respirator if there is potential to exceed exposure

limit(s).

Eye/face protection: Safety goggles or safety glasses with side shields. Full face protection should

be used if the potential for splashing or spraying of product exists. Safety

showers and eye wash stations should be available.

**Skin protection:**Use chemical resistant, impermeable clothing including gloves and either an

apron or body suit to prevent skin contact. Neoprene gloves.

# 9. PHYSICAL AND CHEMICAL PROPERTIES

Physical state:LiquidColor:PurpleOdor:Mild

Odor threshold:Not available.pH:Not applicableVapor pressure:< 5 mm hg (27 °)</th>

Vapor pressure: $< 5 \text{ mm hg} (27 \,^{\circ}\text{C} (80.6 \,^{\circ}\text{F}))$ Boiling point/range: $> 149 \,^{\circ}\text{C} (> 300.2 \,^{\circ}\text{F})$ 

Melting point/ range: Not available.

Specific gravity: 1.02

Vapor density: Not available.

Flash point: > 93.3 °C (> 199.94 °F) Tagliabue closed cup

Flammable/Explosive limits - lower:
Flammable/Explosive limits - upper:
Autoignition temperature:
Flammability:
Flammability:
Evaporation rate:
Solubility in water:

Not available.
Not applicable
Not available.
Slight

Partition coefficient (n-octanol/water):

VOC content:

Viscosity:

Decomposition temperature:

Not available.

Not available.

Not available.

# 10. STABILITY AND REACTIVITY

Stability: Stable under normal conditions of storage and use.

Hazardous reactions: None under normal processing. Polymerization may occur at elevated temperature or in the

presence of incompatible materials.

Hazardous decomposition

products:

Oxides of carbon. Oxides of sulfur. Oxides of nitrogen. Phenolics. Irritating organic vapours.

Incompatible materials: Strong oxidizing agents. Reducing agents. Acids. Bases. Rust. Zinc. Aluminum. Iron. Copper.

Alkalis. Aldehydes. Amines. Free radical initiators. Peroxides.

Reactivity: Not available.

Conditions to avoid: Elevated temperatures. Heat, flames, sparks and other sources of ignition. Store away from

incompatible materials.

# 11. TOXICOLOGICAL INFORMATION

Relevant routes of exposure: Skin, Inhalation, Eyes, Ingestion

IDH number: 303420 Product name: Loctite(R) 545 Thread Sealant

# Potential Health Effects/Symptoms

Inhalation of vapors or mists of the product may be irritating to the respiratory system. Causes skin irritation. May cause allergic skin reaction. Inhalation:

Skin contact:

Causes serious eye irritation. Eye contact:

Ingestion: May cause gastrointestinal tract irritation if swallowed.

Hazardous Component(s)	LD50s and LC50s	Immediate and Delayed Health Effects
Polyglycol dioctanoate	None	Irritant
2-Hydroxyethyl methacrylate	Oral LD50 (Mouse) = 3,275 mg/kg Oral LD50 (Rat) = 11.2 g/kg Oral LD50 (Rat) = 5,050 mg/kg	Irritant, Allergen
Silica, amorphous, fumed, crystal-free	None	Nuisance dust
Cumene hydroperoxide	Inhalation LC50 (Mouse, 4 h) = 200 mg/l	Allergen, Central nervous system, Corrosive, Irritant, Mutagen
1-Acetyl-2-phenylhydrazine	Oral LD50 (Mouse) = 270 mg/kg	Allergen, Blood, Kidney, Mutagen, Some evidence of carcinogenicity
Cumene	Oral LD50 (Rat) = 2.91 g/kg Oral LD50 (Rat) = 1,400 mg/kg Inhalation LC50 (Rat, 4 h) = 8000 ppm	Central nervous system, Irritant, Lung
Methacrylic acid	Oral LD50 (Mouse) = 1,332 mg/kg Oral LD50 (Mouse) = 1,600 mg/kg Oral LD50 (Mouse) = 1,250 mg/kg Oral LD50 (Rabbit) = 1,200 mg/kg Oral LD50 (Rat) = 1,060 mg/kg Oral LD50 (Rat) = 2,224 mg/kg Dermal LD50 (Rabbit) = 500 mg/kg Inhalation LC50 (Rat, 4 h) = 7.1 mg/l	Corrosive, Irritant, Allergen

Hazardous Component(s)	NTP Carcinogen	IARC Carcinogen	OSHA Carcinogen (Specifically Regulated)
Polyglycol dioctanoate	No	No	No
2-Hydroxyethyl methacrylate	No	No	No
Silica, amorphous, fumed, crystal-free	No	No	No
Cumene hydroperoxide	No	No	No
1-Acetyl-2-phenylhydrazine	No	No	No
Cumene	Reasonably Anticipated to be a Human Carcinogen.	Group 2B	No
Methacrylic acid	No	No	No

# 12. ECOLOGICAL INFORMATION

**Ecological information:** 

IDH number: 303420

Not available.

## 13. DISPOSAL CONSIDERATIONS

Information provided is for unused product only.

**Recommended method of disposal:** Follow all local, state, federal and provincial regulations for disposal.

**Hazardous waste number:**Not a RCRA hazardous waste.

## 14. TRANSPORT INFORMATION

The transport information provided in this section only applies to the material/formulation itself, and is not specific to any package/configuration.

U.S. Department of Transportation Ground (49 CFR)

Proper shipping name: RQ, Environmentally hazardous substance, liquid, n.o.s.

Hazard class or division: 9
Identification number: UN 3082

Packing group:

**DOT Hazardous Substance(s):** alpha,alpha-Dimethylbenzylhydroperoxide

International Air Transportation (ICAO/IATA)

Proper shipping name: RQ, Environmentally hazardous substance, liquid, n.o.s.

Hazard class or division: 9
Identification number: UN 3082
Packing group: III

Water Transportation (IMO/IMDG)

Proper shipping name: RQ, ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.

Hazard class or division: 9
Identification number: UN 3082
Packing group: III

# 15. REGULATORY INFORMATION

**United States Regulatory Information** 

TSCA 8 (b) Inventory Status: All components are listed or are exempt from listing on the Toxic Substances Control Act

Inventory.

TSCA 12 (b) Export Notification: None above reporting de minimis

CERCLA/SARA Section 302 EHS: None above reporting de minimis.
CERCLA/SARA Section 311/312: Immediate Health, Delayed Health
CERCLA/SARA Section 313: This product contains the following

ERCLA/SARA Section 313: This product contains the following toxic chemicals subject to the reporting requirements of

section 313 of the Emergency Planning and Community Right-To-Know Act of 1986 (40

CFR 372). Cumene hydroperoxide (CAS# 80-15-9).

CERCLA Reportable quantity: Cumene hydroperoxide (CAS# 80-15-9) 10 lbs. (4.54 kg)

California Proposition 65: This product contains a chemical known in the State of California to cause cancer.

**Canada Regulatory Information** 

CEPA DSL/NDSL Status: Contains one or more components listed on the Non-Domestic Substances List. All other

components are listed on or are exempt from listing on the Domestic Substances List. Components listed on the NDSL must be tracked by all Canadian Importers of Record as required by Environment Canada. They may be imported into Canada in limited quantities.

Please contact Regulatory Affairs for additional details.

# 16. OTHER INFORMATION

This safety data sheet contains changes from the previous version in sections: 2

Prepared by: Product Safety and Regulatory Affairs

**Issue date:** 01/22/2018

**DISCLAIMER:** The data contained herein are furnished for information only and are believed to be reliable. However, Henkel Corporation and its affiliates ("Henkel") does not assume responsibility for any results obtained by persons over whose methods Henkel has no control. It is the user's responsibility to determine the suitability of Henkel's products or any production methods mentioned herein for a particular purpose, and to adopt such precautions as may be advisable for the protection of property and persons against any hazards that may be involved in the handling and use of any Henkel's products. In light of the foregoing, Henkel specifically disclaims all warranties, express or implied, including warranties of merchantability and fitness for a particular purpose, arising from sale or use of Henkel's products. Henkel further disclaims any liability for consequential or incidental damages of any kind, including lost profits.

IDH number: 303420 Product name: Loctite(R) 545 Thread Sealant