Safety Data Sheet



Revision Number: 005.0 Issue date: 08/29/2024

1. PRODUCT AND COMPANY IDENTIFICATION

Product name: LOCTITE PC 9593 A RESIN 2-Component epoxy adhesive

Restriction of Use: None identified

Company address: Henkel Corporation

One Henkel Way Rocky Hill, Connecticut 06067 **IDH number:** 2733776

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.

HAZARD CLASS	HAZARD CATEGORY
SKIN IRRITATION	2
EYE IRRITATION	2A
SKIN SENSITIZATION	1

PICTOGRAM(S)



Precautionary Statements

Prevention: Avoid breathing vapors, mist, or spray. Wash affected area thoroughly after handling.

Contaminated work clothing should not be allowed out of the workplace. Wear protective

gloves, eye protection, and face protection.

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

minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If skin irritation or rash occurs: Get medical attention. If eye irritation persists: Get medical attention. Take off

contaminated clothing.

Storage: Not prescribed

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).

See Section 11 for additional toxicological information.

3. COMPOSITION / INFORMATION ON INGREDIENTS

Hazardous Component(s)	CAS Number	Percentage*	
Aluminium oxide - non fibrous form	1344-28-1	30 - 60	
Bisphenol-F Epichlorhydrin resin	9003-36-5	10 - 30	
Silicon carbide	409-21-2	5 - 10	
2,2'-[(1-Methylethylidene)bis(4,1-phenyleneoxymethylene)]bisoxirane	1675-54-3	5 - 10	
Talc	14807-96-6	5 - 10	

Silicon dioxide, crystalline	7631-86-9	1 - 5
Magnesium oxide	1309-48-4	1 - 5
Calcium oxide	1305-78-8	1 - 5
Quartz (SiO2), <1% respirable	14808-60-7	0.1 - 1

^{*} 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. If symptoms develop and persist, get medical attention.

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

contaminated clothing and footwear. If symptoms develop and persist, get medical attention. Wash clothing before reuse. Thoroughly clean shoes before

reuse.

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.

Unusual fire or explosion hazards: Closed containers may rupture (due to build up of pressure) when exposed to

extreme heat. In case of fire, keep containers cool with water spray.

Hazardous combustion products: Oxides of carbon. Phenolics. Toxic fumes. Aldehydes. Halogenated

compounds. Hydrocarbons. Irritating vapors.

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: Ensure adequate ventilation. Wear appropriate personal protective equipment.

Refer to Section 8 "Exposure Controls / Personal Protection" prior to clean up. Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Scrape up spilled material and place in a closed

container for disposal.

7. HANDLING AND STORAGE

Handling: Prevent contact with eyes, skin and clothing. Do not breathe vapor and mist.

Wash thoroughly after handling. Use only with adequate ventilation. Keep

container closed.

Storage: Keep container tightly closed and in a cool, well-ventilated place away from

incompatible materials. Keep away from heat, spark and flame. Protect from

direct sunlight.

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
Aluminium oxide - non fibrous form	1 mg/m3 TWA Respirable fraction. 3 mg/m3 TWA Respirable particles. 10 mg/m3 TWA Inhalable particles.	5 mg/m3 PEL Respirable fraction. 15 mg/m3 PEL Total dust. 50 MPPCF TWA Total dust. 15 MPPCF TWA Respirable fraction. 15 mg/m3 TWA Total dust. 5 mg/m3 TWA Respirable fraction.	None	None
Bisphenol-F Epichlorhydrin resin	None	None	None	None
Silicon carbide	3 mg/m3 TWA Respirable fraction. 10 mg/m3 TWA Inhalable fraction. 0.1 FIBERS/CM3 TWA Fiber. 3 mg/m3 TWA Respirable particles. 10 mg/m3 TWA Inhalable particles.	5 mg/m3 PEL Respirable fraction. 15 mg/m3 PEL Total dust. 5 mg/m3 TWA Respirable fraction. 15 MPPCF TWA Respirable fraction. 15 mg/m3 TWA Total dust. 50 MPPCF TWA Total dust.	None	None
2,2'-[(1-Methylethylidene)bis(4,1-	None	None	None	None
phenyleneoxymethylene)]bisoxirane Talc	2 mg/m3 TWA Respirable fraction.	0.1 mg/m3 TWA Respirable 20 MPPCF TWA 2.4 MPPCF TWA Respirable	None	50 ppm
Silicon dioxide, crystalline	3 mg/m3 TWA Respirable particles. 10 mg/m3 TWA Inhalable particles. 6 mg/m3 TWA	15 MPPCF TWA Respirable fraction. 50 MPPCF TWA Total dust. 15 mg/m3 TWA Total dust. 5 mg/m3 TWA Respirable fraction. 20 MPPCF TWA 0.8 mg/m3 TWA	None	None
Magnesium oxide	10 mg/m3 TWA Inhalable fraction.	15 mg/m3 PEL Total particulate. 50 MPPCF TWA Total dust. 5 mg/m3 TWA Respirable fraction. 15 mg/m3 TWA Total dust. 15 MPPCF TWA Respirable fraction.	None	None
Calcium oxide	2 mg/m3 TWA	5 mg/m3 PEL	None	None
Quartz (SiO2), <1% respirable	0.025 mg/m3 TWA Respirable fraction.	0.05 mg/m3 TWA (Respirable dust.) (Respirable dust.) 0.025 mg/m3 OSHA_ACT (Respirable dust.) 0.05 mg/m3 PEL Respirable dust. 2.4 MPPCF TWA Respirable 0.1 mg/m3 TWA Respirable	None	None

Engineering controls: Use local ventilation if general ventilation is insufficient to maintain vapor

concentration below established 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.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical state:

Color:

Odor:

Odorless
Odor threshold:

Paste
Blue
Odorless
Odorless
Not available.

pH:

Vapor pressure:Not available.Boiling point/range:Not available.Melting point/ range:Not available.Specific gravity:2.04

Vapor density: Not available.

Flash point: > 93.33 °C (> 199.99 °F)

Flammable/Explosive limits - lower:
Flammable/Explosive limits - upper:
Autoignition temperature:
Flammability:
Flammability:
Evaporation rate:
Solubility in water:
Partition coefficient (n-octanol/water):
Not available.
Not available.
Not available.

VOC content: 0 %

Viscosity:Not available.Decomposition temperature: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. Phenolics. Aldehydes. Halogenated compounds. Hydrocarbons. Toxic

fumes. Irritating vapors.

Incompatible materials: Oxidizing agents. Acids. Bases. Amines.

Reactivity: Not available.

Conditions to avoid: Keep away from heat, ignition sources and incompatible materials. Protect from direct sunlight.

11. TOXICOLOGICAL INFORMATION

Relevant routes of exposure: Skin, Inhalation, Eyes

Potential Health Effects/Symptoms

Inhalation: Inhalation of vapors or mists of the product may be irritating to the respiratory system. Abrasion

of cured material such as by sanding or grinding could release respirable particles of silica quartz, a cancer hazard by inhalation. Normal use of this product causes no such release. Causes skin irritation. May cause allergic skin reaction.

Skin contact:

Eye contact: Causes serious eye irritation.

Ingestion: Not expected under normal conditions of use. May cause gastrointestinal tract irritation if

swallowed.

Hazardous Component(s)	LD50s and LC50s	Immediate and Delayed Health Effects	
Aluminium oxide - non fibrous form	None	Irritant, Nuisance dust, Corrosive	
Bisphenol-F Epichlorhydrin resin	None	Allergen, Irritant	
Silicon carbide	None	Nuisance dust	
2,2'-[(1-Methylethylidene)bis(4,1-phenyleneoxymethylene)]bisoxirane	Oral LD50 (Rabbit) = 1,980 mg/kg Oral LD50 (Mouse) = 15,600 mg/kg Oral LD50 (Rat) = > 1,000 mg/kg Oral LD50 (Mouse) = > 500 mg/kg Dermal LD50 (Rabbit) = 20 mg/kg Dermal LD50 (Rat) = > 1,600 mg/kg Dermal LD50 (Mouse) = > 800 mg/kg	No Data	
Talc	None	Irritant, Lung, Some evidence of carcinogenicity	
Silicon dioxide, crystalline	Oral LD50 (Rat) = > 22,500 mg/kg Oral LD50 (Mouse) = > 15,000 mg/kg Inhalation LC50 (Rat, 4 h) = > 2.08 mg/l Inhalation LC50 (Rat, 4 h) = > 0.69 mg/l	Nuisance dust	
Magnesium oxide	None	Blood, Central nervous system, Immune system, Irritant	
Calcium oxide	Inhalation LC50 (Rat, 4 h) = 40 mg/m3 Inhalation LC50 (Rat, 4 h) = 160 mg/m3	Irritant, Corrosive, Eyes	
Quartz (SiO2), <1% respirable	None	Immune system, Lung, Some evidence of carcinogenicity	

Hazardous Component(s)	NTP Carcinogen	IARC Carcinogen	OSHA Carcinogen (Specifically Regulated)
Aluminium oxide - non fibrous form	No	No	No
Bisphenol-F Epichlorhydrin resin	No	No	No
Silicon carbide	No	Group 2A	No
2,2'-[(1-Methylethylidene)bis(4,1-phenyleneoxymethylene)]bisoxirane	No	No	No
Talc	No	No	No
Silicon dioxide, crystalline	No	No	No
Magnesium oxide	No	No	No
Calcium oxide	No	No	No
Quartz (SiO2), <1% respirable	Known To Be Human Carcinogen.	Group 1	Yes

12. ECOLOGICAL INFORMATION

Ecological information: 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.

TRANSPORT INFORMATION

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

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

Proper shipping name: Not regulated

Hazard class or division:

Identification number:

Packing group:

None

International Air Transportation (ICAO/IATA)

Proper shipping name: Not regulated

Hazard class or division: None Identification number: None Packing group: None

Water Transportation (IMO/IMDG)

Proper shipping name:Not regulatedHazard class or division:NoneIdentification number:NonePacking group:None

15. REGULATORY INFORMATION

United States Regulatory Information

TSCA 12 (b) Export Notification:

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

Control Act (TSCA) inventory.

None above reporting de minimis

CERCLA/SARA Section 302 EHS: None above reporting de minimis.

CERCLA/SARA Section 311/312: Immediate Health

CERCLA/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). Aluminium oxide - non fibrous form (CAS# 1344-28-1).

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

product contains a chemical known to the State of California to cause birth defects or other

reproductive harm.

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: 5,10,11,14,15

Prepared by: Product Safety and Regulatory Affairs

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