

SAFETY DATA SHEET

1. Identification

Product identifier: SILCOLEASE UV CATA 221

Recommended use and restriction on use

Recommended use: Catalyst

Restrictions on use: Not known.

Manufacturer/Importer/Supplier/Distributor Information

Manufacturer

Company Name: Elkem Silicones USA Corp.
Address: 7979 Park Place Road
29745 York, SC
Telephone: +1 (803) 792-3000
Fax: +1 (803) 684-7202
Contact Person:
E-mail: product.stewardship@elkem.com

Supplier

Company Name: Elkem Silicones USA Corp.
Address: Two Tower Blvd, Suite 1601
08816-1100 East Brunswick, NJ
Telephone: +1 (732) 227-2060
Fax: +1 (732) 249-7000

Emergency telephone number: +1 (800) 424-9300 CHEMTREC

2. Hazard(s) identification

Hazard Classification

Physical Hazards

Flammable liquids Category 3

Health Hazards

Acute toxicity (Oral) Category 4
Acute toxicity (Dermal) Category 4
Serious eye irritation Category 2A
Skin sensitizer Category 1
Specific Target Organ Toxicity -
Repeated Exposure Category 2

Environmental Hazards

Acute hazards to the aquatic
environment Category 2
Chronic hazards to the aquatic
environment Category 2

Label Elements

Hazard Symbol:



Signal Word: Warning

Hazard Statement: Flammable liquid and vapor.
Harmful in contact with skin.
May cause an allergic skin reaction.
Causes serious eye irritation.
Harmful if swallowed.
May cause damage to organs through prolonged or repeated exposure.
Toxic to aquatic life.
Toxic to aquatic life with long lasting effects.

Precautionary Statements

Prevention: Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Ground and bond container and receiving equipment. Use explosion-proof electrical/ventilating/lighting/equipment. Use non-sparking tools. Take action to prevent static discharges. Wear protective gloves/protective clothing/eye protection/face protection. Avoid release to the environment.

Response: IF ON SKIN (or hair): Take off immediately all contaminated clothing. Gently wash with plenty of soap and water. If skin irritation occurs: Get medical advice/attention. IF IN EYES: Rinse cautiously with water for several minutes. If eye irritation persists: Get medical advice/attention. IF SWALLOWED: Rinse mouth. Call a POISON CENTER/doctor if you feel unwell. Collect spillage.

Storage: Store in tightly closed original container in a dry, cool and well-ventilated place.

Disposal: Dispose of contents/container to an appropriate treatment and disposal facility in accordance with applicable laws and regulations, and product characteristics at time of disposal.

Other hazards which do not result in GHS classification: No data available.

3. Composition/information on ingredients

Mixtures

Chemical Identity	CAS number	Content in percent (%)*
2-Pentanone, 4-hydroxy-4-methyl-	123-42-2	80%
(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-)	178233-72-2	20%

* All concentrations are percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

Composition Comments: Mixture of additives.

4. First-aid measures

General information: For further information refer to section 8 "Exposure-controls/personal protection".

Ingestion: Do not induce vomiting. Rinse mouth thoroughly. Get medical attention if symptoms occur.

Inhalation: Move into fresh air and keep at rest. Get medical attention if symptoms occur.

Skin Contact: Wash contact areas with soap and water. Get medical attention promptly if symptoms occur after washing.

Eye contact: In the event of contact with the eyes, rinse thoroughly with clean water. Continue to rinse for at least 15 minutes. Get medical attention promptly if symptoms occur after washing.

Most important symptoms/effects, acute and delayed

Symptoms: None known.

Hazards: No specific recommendations.

Indication of immediate medical attention and special treatment needed

Treatment: No specific recommendations.

5. Fire-fighting measures

General Fire Hazards: Vapors may travel considerable distance to a source of ignition and flash back. Containers may explode (due to the build-up of pressure) when exposed to extreme heat.

Suitable (and unsuitable) extinguishing media

Suitable extinguishing media: Extinguish with foam, carbon dioxide or dry powder.

Unsuitable extinguishing media: Do not use water jet as an extinguisher, as this will spread the fire.

Specific hazards arising from the chemical: Flammable. Hazardous Decomposition Products : oxides of carbon.

Special protective equipment and precautions for firefighters

Special fire fighting procedures: Water spray should be used to cool containers.

Special protective equipment for fire-fighters: Firefighters should wear standard protective equipment and a positive pressure self-contained breathing apparatus (SCBA).

6. Accidental release measures

- Personal precautions, protective equipment and emergency procedures:** Extinguish all ignition sources. Avoid sparks, flames, heat and smoking. Ventilate. Do not breathe vapor. Use personal protective equipment. See Section 8 of the SDS for Personal Protective Equipment.
- Methods and material for containment and cleaning up:** Use non-sparking tools. Absorb with sand or other inert absorbent and place into containers. For waste disposal, see Section 13 of the SDS.
- Notification Procedures:** Caution: Contaminated surfaces may be slippery. For waste disposal, see Section 13 of the SDS.
- Environmental Precautions:** Collect spillage. Do not allow to enter drains, sewers or watercourses. Spills may be reportable to the National Response Center (800-424-8802). and to state and/or local agencies.

7. Handling and storage

- Precautions for safe handling:** Use explosion-proof electrical/ventilating/lighting/equipment. Ground container and transfer equipment to eliminate static electric sparks. Use only with adequate ventilation. Avoid forming spray/aerosol mists. See Section 8 of the SDS for Personal Protective Equipment.
- Conditions for safe storage, including any incompatibilities:** Avoid heat, sparks, open flames and other ignition sources. Store in original tightly closed container. Store in a cool, dry place with adequate ventilation. Nitrogen blanketing of containers is recommended.

8. Exposure controls/personal protection

Control Parameters

Occupational Exposure Limits

Chemical Identity	Type	Exposure Limit Values	Source
2-Pentanone, 4-hydroxy-4-methyl-	TWA	50 ppm	US. ACGIH Threshold Limit Values (01 2010)
	REL	50 ppm 240 mg/m3	US. NIOSH: Pocket Guide to Chemical Hazards (2005)
	PEL	50 ppm 240 mg/m3	US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000) (02 2006)
(4-(1-methylethyl phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) - Inhalable fraction.	TWA	50 ppm 240 mg/m3	US. OSHA Table Z-1-A (29 CFR 1910.1000) (1989)
	STEL	6 mg/m3	US. ACGIH Threshold Limit Values (01 2010)
	TWA	2 mg/m3	US. ACGIH Threshold Limit Values (01 2010)

- Appropriate Engineering Controls** Use explosion-proof ventilation equipment.

Individual protection measures, such as personal protective equipment

- General information:** Provide sufficient ventilation during operations which cause vapor formation.
- Eye/face protection:** Wear safety glasses with side shields (or goggles).
- Skin Protection**

Hand Protection:	Protective gloves are recommended.
Other:	Wear appropriate clothing to prevent any possibility of skin contact.
Respiratory Protection:	If ventilation is insufficient, suitable respiratory protection must be provided.
Hygiene measures:	Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

9. Physical and chemical properties

9.1 Information on basic physical and chemical properties:

Appearance

Physical state:	Liquid
Form:	Mobile
Color:	Colorless
Odor:	Slight odor
Odor threshold:	No data available.
pH:	Not applicable
Freezing point:	52 °F (11 °C)
Boiling Point:	331 °F (166 °C)
Flash Point:	131 °F (55 °C) (Closed Cup)
Evaporation rate:	No data available.
Flammability (solid, gas):	No data available.
Flammability limit - upper (%):	6.9 %(V)
Flammability limit - lower (%):	1.8 %(V)
Vapor pressure:	No data available.
Vapor density:	No data available.
Density:	Approximate 0.94 kg/dm ³ (68 °F (20 °C))
Solubility(ies)	
Solubility in water:	Slightly Soluble
Solubility (other):	No data available.
Partition coefficient (n-octanol/water):	No data available.
Auto-ignition temperature:	No data available.
Decomposition temperature:	No data available.
Viscosity:	No data available.

Other information

Oxidizing properties:	According to the data on the components Not considered as oxidizing. (according to EC criteria)
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10. Stability and reactivity

Reactivity:	No data available.
Chemical Stability:	Stable
Possibility of hazardous reactions:	Will not occur.

Conditions to avoid:	Avoid heat, sparks, open flames and other ignition sources.
Incompatible Materials:	Strong oxidizing agents.
Hazardous Decomposition Products:	Thermal decomposition or combustion may liberate carbon oxides and other toxic gases or vapors.

11. Toxicological information

Information on likely routes of exposure

Ingestion:	No data available.
Inhalation:	No data available.
Skin Contact:	No data available.
Eye contact:	No data available.

Symptoms related to the physical, chemical and toxicological characteristics

Ingestion:	No data available.
Inhalation:	No data available.
Skin Contact:	No data available.
Eye contact:	No data available.

Information on toxicological effects

Acute toxicity (list all possible routes of exposure)

Oral

Product: No data available.

Specified substance(s):

2-Pentanone, 4-hydroxy-4-methyl- LD 50 (Rat): 4.0 g/kg

(4-(1-methylethyl)phenyl)-(4-methylphenyl)iodonium tetrakis(pentafluorophenyl)borate(1-) LD 50 (Rat): 200 - 2,000 mg/kg

Dermal

Product: No data available.

Specified substance(s):

(4-(1-methylethyl)phenyl)-(4-methylphenyl)iodonium tetrakis(pentafluorophenyl)borate(1-) LD 50 (Rat): 400 - 2,000 mg/kg

Inhalation

Product: No data available.

Repeated dose toxicity

Product: No data available.

Specified substance(s):

(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) NOAEL (Rat, Oral): 60 mg/kg

Skin Corrosion/Irritation

Product: No data available.

Specified substance(s):

(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) (Rabbit, 4 h): Not irritating

Serious Eye Damage/Eye Irritation

Product: No data available.

Specified substance(s):

2-Pentanone, 4-hydroxy-4-methyl- (Human): 100 ppm for 15 minutes

Specified substance(s):

(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) (Rabbit, 4 h): Not irritating

Respiratory or Skin Sensitization

Product: No data available.

Specified substance(s):

(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) (Guinea Pig)Sensitizing

Carcinogenicity

Product: No data available.

IARC Monographs on the Evaluation of Carcinogenic Risks to Humans:

No carcinogenic components identified

US. National Toxicology Program (NTP) Report on Carcinogens:

No carcinogenic components identified

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050):

No carcinogenic components identified

Germ Cell Mutagenicity

In vitro

Product: No data available.

Specified substance(s):

(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) Bacteria: No mutagenic components identified.
Chromosomal aberration: No mutagenic components identified.

In vivo

Product: No data available.

Reproductive toxicity

Product: No data available.

Specific Target Organ Toxicity - Single Exposure

Product: No data available.

Specific Target Organ Toxicity - Repeated Exposure

Product: No data available.

Aspiration Hazard

Product: No data available.

Other effects: No data available.

12. Ecological information

Ecotoxicity:

Acute hazards to the aquatic environment:

Fish

Product: No data available.

Specified substance(s):

2-Pentanone, 4-hydroxy-4-methyl- LC 50 (Goldfish (Carassius auratus), 24 h): > 5,000 mg/l Mortality
LC 50 (Bluegill (Lepomis macrochirus), 96 h): 420 mg/l Mortality
LC 50 (Inland silverside (Menidia beryllina), 96 h): 420 mg/l Mortality
LC 50 (Carp (Leuciscus idus melanotus), 48 h): 12,220 mg/l Mortality
LC 50 (Carp (Leuciscus idus melanotus), 48 h): 8,930 mg/l Mortality

(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) LC 50 (Fish): < 1 mg/l

Aquatic Invertebrates

Product: No data available.

Specified substance(s):
2-Pentanone, 4-hydroxy-4-methyl- LC 50 (Water flea (Daphnia magna), 24 h): 9,000 mg/l Mortality

(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) LC 50 (Water flea (Daphnia magna)): < 1 mg/l

Chronic hazards to the aquatic environment:

Fish
Product: No data available.

Aquatic Invertebrates
Product: No data available.

Toxicity to Aquatic Plants
Product: No data available.

Specified substance(s):
(4-(1-methylethyl) phenyl)-(4-methylphenyl) iodonium tetrakis (pentafluorophenyl) borate(1-) EC 50 (Alga, 72 h): > 0.55 mg/l

Persistence and Degradability

Biodegradation
Product: No data available.

BOD/COD Ratio
Product: No data available.

Bioaccumulative potential

Bioconcentration Factor (BCF)
Product: No data available.

Partition Coefficient n-octanol / water (log Kow)
Product: No data available.

Specified substance(s):
2-Pentanone, 4-hydroxy-4-methyl- Log Kow: -0.098

Mobility in soil: No data available.

Known or predicted distribution to environmental compartments

2-Pentanone, 4-hydroxy-4-methyl-
(4-(1-methylethyl) phenyl)-
(4-methylphenyl) iodonium
tetrakis (pentafluorophenyl)
borate(1-)

No data available.
No data available.

Other adverse effects: No data available.

13. Disposal considerations

Disposal instructions: Dispose of waste at an appropriate treatment and disposal facility in accordance with applicable laws and regulations, and product characteristics at time of disposal. Disposal of unused product may be subject to RCRA regulations (40 CFR 261). Disposal of the used product may also be regulated due to ignitability. Contaminated packages should be as empty as possible.

RCRA Information

Waste code:

EPA RCRA HAZARDOUS WASTE CODE: D001

14. Transport information

DOT

UN Number: UN 1148
UN Proper Shipping Name: DIACETONE ALCOHOL SOLUTION
Transport Hazard Class(es)
Class: 3
Label(s): 3
Packing Group: III
Marine Pollutant: Not a Marine Pollutant
Special precautions for user: -

IMDG

UN Number: UN 1148
UN Proper Shipping Name: DIACETONE ALCOHOL SOLUTION
Transport Hazard Class(es)
Class: 3
Label(s): 3
EmS No.:
Packing Group: III
Marine Pollutant: Not a Marine Pollutant
Limited quantity
Excepted quantity
Special precautions for user: -

IATA

UN Number: UN 1148
Proper Shipping Name: DIACETONE ALCOHOL SOLUTION
Transport Hazard Class(es):
Class: 3
Label(s): 3
Marine Pollutant: No other information noted.
Packing Group: III
Limited quantity
Excepted quantity
Special precautions for user: -
Other information

Passenger and cargo aircraft: Allowed.
Cargo aircraft only: Allowed.

Environmental hazards: Not a Marine Pollutant

Special precautions for user: No special precautions.

15. Regulatory information

US Federal Regulations

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

None present or none present in regulated quantities.

CERCLA Hazardous Substance List (40 CFR 302.4):

None present or none present in regulated quantities.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories

Acute (Immediate) Chronic (Delayed) Fire Reactive Pressure Generating

SARA 302 Extremely Hazardous Substance

None present or none present in regulated quantities.

SARA 304 Emergency Release Notification

None present or none present in regulated quantities.

SARA 313 (TRI Reporting)

None present or none present in regulated quantities.

Clean Water Act Section 311 Hazardous Substances (40 CFR 117.3)

None present or none present in regulated quantities.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130):

None present or none present in regulated quantities.

US State Regulations

US. California Proposition 65

No ingredient regulated by CA Prop 65 present.

US. New Jersey Worker and Community Right-to-Know Act

Chemical Identity

2-Pentanone, 4-hydroxy-4-methyl-

US. Massachusetts RTK - Substance List

No ingredient regulated by MA Right-to-Know Law present.

US. Pennsylvania RTK - Hazardous Substances

Chemical Identity

2-Pentanone, 4-hydroxy-4-methyl-

US. Rhode Island RTK

No ingredient regulated by RI Right-to-Know Law present.

Inventory Status:

US TSCA Inventory: On or in compliance with the inventory.

Canada NDSL Inventory: On or in compliance with the inventory.

EU EINECS List: On or in compliance with the inventory.

Korea Existing Chemicals Inv. (KECI): On or in compliance with the inventory.

16. Other information, including date of preparation or last revision

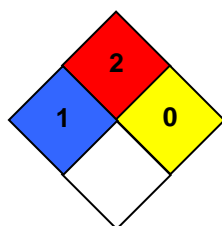
HMIS Hazard ID

Health	2
Flammability	2
Physical Hazards	0
PERSONAL PROTECTION	C

C - Safety Glasses, Gloves & Apron

Hazard rating: 0 - Minimal; 1 - Slight; 2 - Moderate; 3 - Serious; 4 - Severe; RNP - Rating not possible; *Chronic health effect

NFPA Hazard ID



Flammability
 Health
 Reactivity
 Special hazard.

Hazard rating: 0 - Minimal; 1 - Slight; 2 - Moderate; 3 - Serious; 4 - Severe; RNP - Rating not possible

Issue Date: 06/05/2018

Revision Date: No data available.

Version #: 14.0

Further Information: No data available.

Disclaimer: The information given is based on data available for the material, the components of the material, and similar materials. The information is believed to be correct. It is given in good faith. This information should be used to make an independent determination of the methods to safeguard workers and the environment.

