



## 1 - Identification

Identification of the substance or preparation:

Commercial product name: Cm 1000

Cyclopentasiloxane, Dimethiconol

Use of substance / preparation: Industrial.

Raw material for: cosmetics

1.2 Company/undertaking identification:

Raw material for cosmetic and pharmaceutical products

Address Ingredients To Die For, 155 Blue Dr, Searcy, Ar 72143

**Phone** 512-535-2711

 Emergency Phone
 800-424-9300; 800-633-8253

 Transportation emergency:
 (800) 424-9300 (CHEMTREC, USA)

(703) 527-3887 (CHEMTREC, international)(613) 996-6666

(CANUTEC, Canada)

This MSDS was prepared by the Product Safety Department of Wacker Chemie GmbH, Germany.

## 2 - Hazard(s) Identification

Chemical characterization (preparation):

Chemical characteristics Polydimethylsiloxane

2.2 Information on ingredients:

Type CAS No. Substance Content [wt. %] Note

 INHA
 541-02-6
 Decamethyl cyclopentasiloxane
 60.0 - 100.0

 VERU
 556-67-2
 Octamethyl cyclotetrasiloxane
 0.1 - <1.0 R</td>

Type: HYD - by-product upon hydrolysis, INHA - ingredient, NEBE - by-product, MONO - residual monomer, VERU - impurity, VUL - by-product upon

vulcanization. \*\*\* Note: C1 - IARC carcinogen, C2 - NTP carcinogen, C3 - OSHA carcinogen, NH - non-hazardous, R - reproductive toxin.



## 3 - Composition/Information on Ingredients

Hazards classifications

HMIS rating (product as packaged):

Health: 1\* Fire: 2 Reactivity: 0 PPE: B

Hazardous Materials Identification System and HMIS are registered trademarks of the National Paint and Coatings Association. (HMIS codes are

Canadian WHMIS Classification: B3, D2A

Emergency overview and potential hazards

Signal Word:

**CAUTION** 

**Physical Hazards:** 

Combustible liquid and vapor.

Acute health effects Route of entry or possible contact:

skin, eyes, inhalation, ingestion

Eye contact:

May cause slight eye irritation.

Skin contact:

No acute toxic effects are expected.

Inhalation:

In case of aerosol formation: If inhaled at high concentrations lung damage is possible. See

Chronic health effects.

Ingestion:

Not expected in industrial use.

## Additional information on acute health effects:

According to previous experience, non-mutagenic. In animal tests: Skin contact: not sensitizing . Eye contact: slightly irritating . Limit test (by

**Further information:** 

### Chronic health effects:

Oral or inhalation exposure at relatively high dosages in animal test causes increases in liver weight. Prolonged or repeated inhalation of vapors may

### Medical conditions which may be aggravated by exposure:

unknown

### Target organs affected:

Liver and Female Reproductive System.

#### Carcinogens/Reproductive toxins:

Product contains Octamethylcyclotetrasiloxane. Based on animal tests. This material contains >= 0.1% of a known animal carcinogen. This material See Section 11 for Toxicological Information, if any.

the carcinogenic potential of decamethylcyclopentasiloxane (D5) in animals can not be defined at this time.



## 4 - First-Aid Measures

#### **General information:**

Get medical attention if irritation occurs or if breathing becomes difficult.

#### After inhalation:

If inhaled, remove to fresh air. Get medical attention. Designate the product.

#### After contact with the skin:

Remove material with a waterless skin cleaner from skin and clothing. Wash then with plenty of water or water and soap. Get medical attention if

### After contact with the eyes:

If contact with eyes, immediately hold eyelids apart and flush with plenty of water. Get medical attention if irritation occurs.

After swallowing:

If swallowed, do not induce vomiting. Get medical attention if symptoms occur. Designate the product.

## 5 - Fire-Fighting Measures

Flammable properties: Method

Boiling point / boiling range......: > 200C (> 392F) at 1013 hPa (-

Lower explosion limit (LEL)........ not applicable
Upper explosion limit (UEL)......... not applicable

NFPA Hazard Class (comb./flam.liquid): IIIA

#### Fire and explosion hazards:

Combustible liquid and vapor. Consider possible formation of explosive mixtures with air, for example in uncleaned containers.

## Recommended extinguishing media:

Water - Use Fine Spray or Fog. carbon dioxide, dry chemical, alcohol-resistant foam-type extinguishing media, sand.

### Unsuitable extinguishing media:

sharp water jet .

#### Special exposure hazards arising from the substance or preparation itself, combustion products,

resulting gases:

Hazardous combustion products: carbon dioxide , carbon monoxide , silicon dioxide , formaldehyde , incompletely burnt hydrocarbons .

#### Fire fighting procedures:

Cool endangered containers with water. Fire fighters should wear full protective clothing including a self-contained breathing apparatus.



## 6 - Accidental Release Measures

#### Precautions:

Wear personal protection equipment (see section 8). Avoid contact with eyes and skin. Avoid inhaling mists and vapours. If material is released **Containment:** 

Prevent spills from entering surface waters, drains or sewers, and open soil. Dam in any fluid that runs out using suitable material (e.g. earth). Retain Spills of material which could reach surface waters must be reported to the United States Coast

Guard National Response Center's toll free phone number (800) 424-8802.

#### Methods for cleaning up:

Do not flush away with water. In the case of small amounts: Absorb with a liquid binding material such as diatomaceous earth and dispose of

#### Further information:

Eliminate all sources of ignition.

# 7 - Handling and Storage

#### Handling

#### Precautions for safe handling:

Ensure adequate ventilation. Spilled substance increases risk of slipping.

#### Precautions against fire and explosion:

Vapors may form in closed rooms with air mixtures, leading to explosion in the presence of sources of ignition, even in empty, uncleaned vessels.

#### Storage

#### Conditions for storage rooms and vessels:

none known

## Advice for storage of incompatible materials:

not applicable

#### Further information for storage:

Keep container tightly closed and store in a cool, well ventilated place.



# 8 - Exposure Controls/Personal Protection

### **Engineering controls**

Ventilation:

Use with adequate ventilation.

Local exhaust:

No special ventilation required.

Associate substances with specific control parameters such as limit values

Further information:

Maximum concentration at workplace recommended by producer: octamethylcyclotetrasiloxane (D4,

CAS no. 556-67-2) = 10 ppm (123 mg/m3).

Personal protection equipment (PPE)

Respiratory protection:

A NIOSH approved air purifying respirator equipped with universal multi-contaminant multigas/

vapor cartridges is recommended if overexposure to chemical vapors could occur.

Hand protection:

rubber gloves .

Eye protection:

chemical safety goggles .

Other protective clothing or equipment:

Provide eye bath and safety shower. Additional protective clothing or equipment is not normally required.

General hygiene and protection measures:

Avoid contact with eyes, skin and clothing. Avoid breathing dust/vapor/mist/gas/aerosol. Do not eat, drink or smoke when handling.



# 9 - Physical and Chemical Properties

Appearance		
Physical state / form:	liquid	
Colour:	colourless	
Odour:	pleasant	
9.2 Safety parameters Method		
Boiling point / boiling range:	> 200C (> 392F) at 1013 hPa	(-)
Flash point	73C (163F)	(DIN 51758)
Autoignition temperature:	390C (734F)	(DIN 51794)
Lower explosion limit (LEL):	not applicable	
Upper explosion limit (UEL):	not applicable	
Vapour pressure:	approx. 0.3 hPa at 20C (68F)	(-)
Density	approx. 0.96 g/cm3 at 25C (77F)	(-)
Water solubility / miscibility:	virtually insoluble	
Viscosity (dynamic)	approx. 5000 mPa*s at 25C (77F)	(-)

# 10 - Stability and Reactivity

#### General information:

If stored and handled in accordance with standard industrial practices no hazardous reactions are known.

## Conditions to avoid:

none known

## Materials to avoid:

none known

#### Hazardous decomposition products:

If stored and handled in accordance with standard industrial practices and local regulations where applicable: none known . Measurements have

## Further information:

Hazardous polymerization cannot occur.



## 11 - Toxicological Information

#### General information:

Toxicological testing has not been conducted with this material. Data valid for main component.

The toxicology information listed below is based on the components of the material.

#### Toxicological data:

Acute toxicity (LD50/LC50-values relevant to classification):

Exposition Value/value range Species Source

oral > 2000 mg/kg rat dermal > 2000 mg/kg

#### Additional information / remarks:

Inhalation toxicity: In a female rat gender-specific range finding study (inhalation exposure) with OMCTS/D4 decreases in mean live litter size and in

Toxicity to reproduction/fertility: In a two generation reproductive study via inhalation with OMCTS/D4 in rats, decreased mean live litter size and

Chronic toxicity / carcinogenicity: In a two year combined chronic toxicity and carcinogenicity inhalation study with decamethylcyclopentasiloxane (D5) in rats, an increased incidence for (uterine) endometrial tumors was observed in the highest exposure level of 160 ppm in female rats. The same

## 12 - Ecological Information

#### Behaviour in environmental compartments

Further information:

## Ecotoxicological effects:

According to past experience toxicity to fish is improbable.

#### Effects in sewage treatment plants (bacteria toxicity: respiration-/reproduction inhibition):

According to present experience, adverse effects on water purification plants are not expected.

#### Further ecological information

#### **General information:**

No environmental problems expected if handled and treated in accordance with standard industrial practices and local regulations where applicable.



# 13 - Disposal Considerations

## **Product disposal**

#### Recommendation:

Dispose of according to regulations by incineration in a special waste incinerator. Observe local/state/federal regulations.

#### Packaging diposal

#### Recommendation:

Completely discharge containers (no tear drops, no powder rest, scraped carefully). Containers may be recycled or re-used. Observe local/state/federal regulations.

## 14 - Transport Information

US DOT & CANADA TDG SURFACE		
Valuation	Hazardous product	
Proper Shipping Name:	Combustible Liquid, N.O.S.	
Technical name:	(Decamethylcyclopentasiloxane)	
Class	3	
UN no	1993	
Packaging Group:	III	
Label	**USA-TL only at bulk containers > 119 gal.:Combustible liquid/3	
NAERG Page	128	
Other Information:	Not regulated in containers up to 119 Gal./450 L each! DOT	
	regulated as a Combustible Liquid when packaged in bulk containers (> 119 Gallons).	
Transport by sea IMDG-Code		
Valuation:	not Regulated	
Marine Pollutant:	no	
Air transport ICAO-TI/IATA-DGR		
Valuation:	not Regulated	



## 15 - Regulatory Information

#### U.S. Federal regulations

#### TSCA inventory status and TSCA information:

This material or its components are listed on or are in compliance with the requirements of the

TSCA Chemical Substance Inventory.

#### TSCA 12(b) Export Notification:

This material does not contain any TSCA 12(b) regulated chemicals.

#### **CERCLA Regulated Chemicals:**

This material does not contain any CERCLA regulated chemicals.

#### SARA 302 EHS Chemicals:

This material does not contain any SARA extremely hazardous substances.

### SARA 311/312 Hazard Class:

Fire hazard.

#### SARA 313 Chemicals:

This material does not contain any SARA 313 chemicals above de minimus levels.

#### HAPS:

This material does not contain any hazardous air pollutants.

## U.S. State regulations

#### California Proposition 65 Carcinogens:

This material does not contain any chemicals known to the state of California to cause cancer.

#### California Proposition 65 Reproductive Toxins:

This material does not contain any chemicals known to the state of California to cause reproductive effects.

#### Massachusetts Substance List:

This material contains no listed components.

### New Jersey Right-to-Know Hazardous Substance List:

This material contains no listed components.

### Pennsylvania Right-to-Know Hazardous Substance List:

This material contains no listed components.

### Canadian regulations

This product has been classified in accordance with the Hazard criteria of the CPR and the MSDS contains all the information required by the CPR.

#### **WHMIS Hazard Classes:**

B3, D2A

**DSL Status:** 





This material or its components are listed on the Canadian Domestic Substances List.

### Non-DSL Chemicals:

This material does not contain any non-DSL chemicals.

#### **Canadian Ingredient Disclosure List:**

This material contains no listed components.

**EU Risk Phrases:** 

R-Phrase Description

R-

**EU Safety Phrases:** 

S-Phrase Description

S-

Listed on the following inventories:

IECSC - China

PICCS - Philippines

ECL - Korea

ENCS - Japan

**EINECS - Europe** 

AICS - Australia

HSNO - New Zealand



## 16 - Other Information

Additional information:

This Material Safety Data Sheet (MSDS) meets the requirements of the Federal OSHA Hazard Communication Standard (29 CFR 1910.1200). This

#### Glossary of Terms:

ACGIH - American Conference of Governme ppm - Parts per Million

SARA - Superfund Amendments and Reauthorization Act Industrial Hygienists

DOT - Department of Transportation STEL - Short Term Exposure Limit TSCA - Toxic Substances Control Act hPa - Hectopascals mPa\*s - Milli Pascal-Seconds TWA - Time Weighted Average

OSHA - Occupational Safety and Health WHMIS - Canadian Workplace Hazardous Materials

PEL - Permissible Exposure Limit Identification System

Flash point determination methods Common name

ASTM D56 Tagliabue (Tag) closed cup

ASTM D92, DIN 51376, ISO 2592 Cleveland open cup

ASTM D93, DIN 51758, ISO 2719 Pensky-Martens closed cup ASTM D3278, DIN 55680, ISO 3679 Setaflash or Rapid closed cup

DIN 51755 Abel-Pensky closed cup

Conversion table:

Pressure: 1 hPa \* 0.75 = 1 mm Hg = 1 Torr; 1 bar = 1000 hPa

Viscosity: 1 mPa\*s = 1 Centipoise (Cp)

## DISCLAIMER

Technical information and suggestions for use including any formulations and / or procedures are believed to be correct. However this does not constitute a quarantee of the accuracy of the information contained herein and confirming tests in your own laboratory or facility are recommended.

No statement or suggestion of use should be construed as a recommendation or inducement to violate any patent rights and no patent liability may be assumed.

The information contained in this Certificate of Analysis and Material Safety Data Sheet are obtained from current and reliable sources. As the ordinary or otherwise use(s) of this product is outside the control of Ingredients To Die For, no representation or warranty, expressed or implied is made as to the effect(s)of such use(s) (including damage or injury), or the results obtained.

Ingredients To Die For expressly disclaims responsibility as to the ordinary or otherwise use(s). Furthermore, Ingredients To Die For as to the fitness for any use should consider nothing contained herein as a recommendation. The liability of Ingredients To Die For is limited to the value of the goods and does not include any consequential loss.