according to Regulation (EC) No 1907/2006

#### **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **1** of **11** 

# SECTION 1: Identification of the substance/mixture and of the company

## 1.1. Product identifier

**Product Name:** 

Technovent 'FACTOR II - LSR' Silicone

**Product Code(s):** 

A-221-05 / A-223-30 / A-223-40 / A-225-50 / A-225-60

## 1.2. Relevant identified uses of the substance or mixture and uses advised against

Silicone for use in maxillofacial prosthetics

### 1.3. Details of the supplier of the safety data sheet

Company name: Technovent Ltd
Street: Unit 5 York Park

Bridgend CF31 3TB

Place: UK

Telephone: +44 1656 768566
e-mail: info@technovent.com
Internet: www.technovent.com

Emergency number: +44 1656768566

This number is only obtainable during office hours

(Monday - Thursday 9.00 am - 5.00 pm, Friday 9.00 am - 4.00 pm)

#### 1.4. Emergency telephone number

+4401656 768566

This number is only obtainable during office hours (Monday - Thursday 8.00 am - 5.00 pm, Friday 8.00 am - 4.00 pm)

## **SECTION 2: Hazards Identification**

## 2.1. Classification of the substance or mixture

Regulation (EC) No. 1272/2008

This mixture is not classified as hazardous in accordance with Regulation (EC) No. 1272/2008.

### 2.2. Label elements

Additional advice on labelling According to Regulation (EC) 1272/2008

### 2.3. Other hazards

None

according to Regulation (EC) No 1907/2006

#### **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **2** of **11** 

## **SECTION 3: Composition/information on ingredients**

## 3.2. Mixtures

#### **Chemical characterization**

Contains polydimethylsiloxane with functional groups. + fillers catalyst: platinum complex compound.

**Hazardous components** 

CAS No	Chemical Name			Quantity (%)
	EC no	Index no	REACH no	
	Classification accord	ding to Regulation (EC) no:	1272/2008 [CLP]	
68083-19-2	Vinyl terminated polyd	Vinyl terminated polydimethylsiloxane		60-70
556-67-2	Octmethylcyclotetrasil	Octmethylcyclotetrasiloxane		<1
68585-32-0	Pt concentrate		0.05-0.2	
68037-59-2	Dimethylmethylhydrogensiloxane		9-11	
68909-20-6	Hydrophobic pyrogenic silica		3-6	
	272-697-1		01-211 9379499-16-001	
112945-52-5	Silicon dioxide (also known as TSCA CAS: 7631-86-9)		4-7	

Full text of H and EUH statements: see section 16.

## **SECTION 4: First Aid Measures**

## 4.1. Description of first aid measures

#### **General information**

First aider: Pay attention to self-protection! Remove affected person from the danger area and lay down.

## After inhalation

Provide fresh air. Medical treatment necessary.

## After contact with skin

Wash with plenty of water. Immediately remove any contaminated clothing, shoes or stockings. Medical treatment necessary.

#### After contact with eyes

After eye contact: Rinse immediately carefully and thoroughly with eye-bath or water. Consult an ophthalmologist.

according to Regulation (EC) No 1907/2006

#### **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **3** of **11** 

### After ingestion

Let water be drunken in little sips (dilution effect).

Do not induce vomiting. If you feel unwell, seek medical advice.

#### 4.2. Most important symptoms and effects, both acute and delayed

No information available.

### 4.3. Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

## **SECTION 5: Firefighting Measures**

## 5.1. Extinguishing media

#### Suitable extinguishing media

Co-ordinate fire-fighting measures to the fire surroundings.

## 5.2. Special hazards arising from the substance or mixture

Non-flammable. Vapours can form explosive mixtures with air.

## 5.3. Advice for firefighters

In case of fire: Wear self-contained breathing apparatus.

#### **Additional information**

Use water spray jet to protect personnel and to cool endangered containers. Suppress gases/vapours/mists

with water spray jet. Collect contaminated fire extinguishing water separately. Do not allow entering drains or surface water.

#### **SECTION 6: Accidental Release Measures**

## 6.1. Personal precautions, protective equipment and emergency procedures

Provide adequate ventilation. Do not breathe gas/fumes/vapour/spray. Avoid contact with skin, eyes and clothes. Use personal protection equipment.

## 6.2. Environmental precautions

Do not allow to enter into surface water or drains.

## 6.3. Methods and material for containment and cleaning up

Absorb with liquid-binding material (e.g. sand, diatomaceous earth, acid- or universal binding agents). Treat the recovered material as prescribed in the section on waste disposal.

## 6.4. Reference to other sections

Safe handling: see section 7

Personal protection equipment: see section 8

Disposal: see section 13

## **SECTION 7: Handling & Storage**

according to Regulation (EC) No 1907/2006

#### **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **4** of **11** 

#### 7.1. Precautions for safe handling

#### Advice on safe handling

If handled uncovered, arrangements with local exhaust ventilation have to be used. Do not breathe qas/fumes/vapour/spray.

## Advice on protection against fire and explosion

No special fire protection measures are necessary.

## 7.2. Conditions for safe storage, including any incompatibilities

#### Requirements for storage rooms and vessels

Keep container tightly closed. Keep locked up. Store in a place accessible by authorized persons only. Provide adequate ventilation as well as local exhaustion at critical locations.

### Advice on storage compatibility

Do not store with acids, lyes, alcohols, metallic powders and metallic oxides (release of hydrogen is favoured).

## Further information on storage conditions

Keep only in the original container in a cool, dry and well-ventilated place, away from foodstuffs.

### 7.3. Specific end use(s)

Silicone for oral impression taking. For use by trained specialist staff.

## **SECTION 8: Exposure Control/Personal Protection**

### 8.1. Control parameters

#### 8.2. Exposure controls

#### Appropriate engineering controls

If handled uncovered, arrangements with local exhaust ventilation have to be used. Do not breathe gas/fumes/vapour/spray.

#### Protective and hygiene measures

Remove contaminated, saturated clothing immediately. Draw up and observe skin protection programme. Wash hands and face before breaks and after work and take a shower if necessary . When using do not eat or drink.

#### **Eye/face protection**

Wear eye/face protection.

### Hand protection

When handling with chemical substances, protective gloves must be worn with the CE-label including the four control digits. The quality of the protective gloves resistant to chemicals must be chosen as a function of the specific working place concentration and quantity of hazardous substances. For special purposes,

according to Regulation (EC) No 1907/2006

#### **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **5** of **11** 

it is recommended to check the resistance to chemicals of the protective gloves mentioned above together with the supplier of these gloves.

Suitable are gloves of the following material: NBR (Nitrile rubber)

#### Skin protection

Wear suitable protective clothing.

## **Respiratory protection**

In case of inadequate ventilation wear respiratory protection.

# **SECTION 9: Physical/Chemical Properties**

## 9.1. Information on basic physical and chemical properties

Physical state: Paste
Colour: Colourless
Odour: characteristic

Test method

pH-Value: not determined

Changes in the physical state

Melting point: not determined Initial boiling point and boiling range: not determined

Flash point: >100 °C DIN 51755

**Flammability** 

Solid: not applicable Gas: not applicable

Lower explosion limits: not determined Upper explosion limits: not determined

Ignition temperature: >400 °C DIN 51794

**Auto-ignition temperature** 

Solid: not applicable Gas: not applicable

Decomposition temperature: >180 °C

**Oxidizing properties** 

Not oxidizing.

Vapour pressure: <10 hPa (at 20 °C)

Density (at 20 °C): 1,1 g/cm<sup>3</sup> DIN 51757

Water solubility: practically insoluble

according to Regulation (EC) No 1907/2006

#### **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **6** of **11** 

Solubility in other solvents not determined

Partition coefficient: not determined

Viscosity / dynamic: Variable depending on product code

(at 23 °C)

Vapour density: not determined

Evaporation rate: not determined

9.2. Other information

Solid content: not determined

# **SECTION 10: Stability & Reactivity**

### 10.1. Reactivity

No hazardous reaction when handled and stored according to provisions.

## 10.2. Chemical stability

The product is stable under storage at normal ambient temperatures.

### 10.3. Possibility of hazardous reactions

Reacts with: Acids, alkalis, alcohols, powdered metals or metal oxides with release of hydrogen.

#### 10.4. Conditions to avoid

Temperatures > 150°C/ 302 °F.

## 10.5. Incompatible materials

No information available.

## 10.6. Hazardous decomposition products

In case of thermic decomposition hydrogen is released.

At a temperature of approx. 150°C/ 302°F a small amount of formaldehyde can be released by oxidative degradation.

# **SECTION 11: Toxicological Information**

#### 11.1. Information on toxicological effects

### **Acute toxicity**

Based on available data, the classification criteria are not met.

For the product itself no toxicological data are available. In products with a comparable composition, a LD50

(orally, species rat) of > 5000 mg/kg has been found.

according to Regulation (EC) No 1907/2006

#### **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **7** of **11** 

CAS No	Chemical name					
	Exposure route	Dose		Species	Source	Method
556-67-2	octamethylcyclotetrasiloxane					
	oral	LD50 mg/kg	4800	Rat		OECD 401
	dermal	LD50 mg/kg	>2400	Rabbit		OECD 402
	inhalation (4 h) vapour	LC50	36 mg/l	Rat	GESTIS	OECD 403

#### Irritation and corrosivity

Based on available data, the classification criteria are not met.

#### Sensitising effects

Based on available data, the classification criteria are not met.

## Carcinogenic/mutagenic/toxic effects for reproduction

Based on available data, the classification criteria are not met.

### STOT-single exposure

Based on available data, the classification criteria are not met.

#### STOT-repeated exposure

Based on available data, the classification criteria are not met.

Due to physical form (paste) classification with H372 is not appropriate. An inhalation of the product is not possible.

EC regulation 1272/2008 annex 1, section 1.1.1.5: "For the purpose of classification of health hazards (part 3),

the route of exposure, information on mechanisms and metabolism studies are useful for determining the relevance of effects in humans. If this information raises doubts as to their relevance in humans, in spite of the

indisputable data legitimacy and quality, a lower classification may be justified. When there is scientific evidence that the mechanism or mode of action is not relevant to humans, the substance or mixture

according to Regulation (EC) No 1907/2006

#### **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **8** of **11** 

should not be classified."

## **Aspiration hazard**

Based on available data, the classification criteria are not met.

# **SECTION 12: Ecological Information**

#### 12.1. Toxicity

The product is not: Ecotoxic.

## 12.2. Persistence and degradability

The product has not been tested.

CAS No	Chemical name			
	Method	Value	d	Source
	Evaluation			
556-67-2	octamethylcyclotetrasiloxane			
		3,7%	29	
	Not readily biodegradable (according to OECD criteria)			

## 12.3. Bioaccumulative potential

The product has not been tested.

## 12.4. Mobility in soil

The product has not been tested.

## 12.5. Results of PBT and vPvB assessment

Octamethylcyclotetrasiloxane (D4) fulfills the current criteria set forth under Annex XIII of the EU REACH Regulation for PBT and vPvB substances and was included in the candidate list of SVHCs. According to our knowledge of the state of the art, however, D4 cannot be compared with known PBT and/or vPvB substances.

The interpretation of the available data by the silicone industry reveals that scientific evidence obtained from field tests essentially points out that D4 does not lead to biomagnification in aquatic and terrestrial food chains.

In air, D4 is decomposed by naturally occurring processes in the atmosphere. D-residues which do not decompose in this way in the air are not expected to accumulate from the air in water, the soil or living organisms.

#### 12.6. Other adverse effects

No information available.

#### **Further information**

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil.

## **SECTION 13: Disposal Considerations**

according to Regulation (EC) No 1907/2006

## **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **9** of **11** 

## 13.1. Waste treatment methods

## Advice on disposal

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil. Dispose of waste according to applicable legislation.

## **Contaminated packaging**

This material and its container must be disposed of as hazardous waste. Handle contaminated packages in the same way as the substance itself.

# **SECTION 14: Transport Information**

Land	transport	(ADR/RID)
------	-----------	-----------

14.1. UN number:	No dangerous good in sense of this transport regulation.
14.2. UN proper shipping name:	No dangerous good in sense of this transport regulation
14.3. Transport hazard class(es):	No dangerous good in sense of this transport regulation.
14.4. Packing group:	No dangerous good in sense of this transport regulation.
Inland waterways transport (ADN)	
14.1. UN number:	No dangerous good in sense of this transport regulation.
14.2. UN proper shipping name:	No dangerous good in sense of this transport regulation.
14.3. Transport hazard class(es):	No dangerous good in sense of this transport regulation.
14.4. Packing group:	No dangerous good in sense of this transport regulation.
Marine transport (IMDG)	
14.1. UN number:	No dangerous good in sense of this transport regulation.
14.2. UN proper shipping name:	No dangerous good in sense of this transport regulation.
14.3. Transport hazard class(es):	No dangerous good in sense of this transport regulation.
14.4. Packing group:	No dangerous good in sense of this transport regulation.
Air transport (ICAO-TI/IATA-DGR)	
14.1. UN number:	No dangerous good in sense of this transport regulation.
14.2. UN proper shipping name:	No dangerous good in sense of this transport regulation.
14.3. Transport hazard class(es):	No dangerous good in sense of this transport regulation.

according to Regulation (EC) No 1907/2006

#### TECHNOVENT 'FACTOR II - LSR' SILICONES

Revision date: 02.11.2020 Page **10** of **11** 

#### 14.4. Packing group:

No dangerous good in sense of this transport regulation.

#### 14.6. Special precautions for user

No dangerous good in sense of this transport regulation.

# 14.7. Transport in bulk according to Annex II of Marpol and the IBC Code

No dangerous good in sense of this transport regulation.

## **SECTION 15: Regulatory Information**

## 15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

### **EU** regulatory information

#### **Additional information**

To follow: 850/2004/EC, 79/117/EEC, 689/2008/EC

The mixture contains substances of very high concern (SVHC candidates):

Octamethylcyclotetrasiloxane (D4), CAS no. 556-67-2

#### **National regulatory information**

Employment restrictions:

Observe restrictions to employment for juvenils according to the ' juvenile work protection guideline' (94/33/EC).

Water contaminating class (D):

2 - clearly water contaminating

### 15.2. Chemical safety assessment

Chemical safety assessments for substances in this mixture were not carried out.

#### **SECTION 16: Other Information**

### Abbreviations and acronyms

ADR: Accord européen sur le transport des marchandises dangereuses par Route

(European Agreement concerning the International Carriage of Dangerous Goods by Road )

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

GHS: Globally Harmonized System of Classification and Labelling of Chemicals EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service LC50: Lethal concentration, 50%

LD50: Lethal dose, 50%

### Relevant H and EUH statements (number and full text)

H372 Causes damage to organs (lung) through prolonged or repeated exposure if inhaled.

according to Regulation (EC) No 1907/2006

## **TECHNOVENT 'FACTOR II - LSR' SILICONES**

Revision date: 02.11.2020 Page **11** of **11** 

## **Further Information**

The information is based on present level of our knowledge. It does not, however, give assurances of product properties and establishes no contract legal rights. The receiver of our product is singulary responsible for adhering to existing laws and regulations.