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NOVAGARD

Reviewed on 08/25/2023

- **1** Identification
 - Product identifier
 - Trade name: NovaFlex Seam Sealer Series
 - Details of the supplier of the safety data sheet
 - Manufacturer/Supplier: Novagard Solutions Inc 5109 Hamilton Avenue CLEVELAND, OH 44114 USA
 - · Information department: R&D Department
 - Emergency telephone number:
 CHEMTREC 1-800-424-9300 (USA) +1 703-741-5970 (International)

2 Hazard(s) identification

· Classification of the substance or mixture

GHS08 Health hazard

Toxic to Reproduction 2 H361 Suspected of damaging fertility or the unborn child.

GHS09 Environment

Aquatic Chronic 2 H411 Toxic to aquatic life with long lasting effects.

GHS07

Skin Irritation 2H315 Causes skin irritation.Eye Irritation 2AH319 Causes serious eye irritation.

· Label elements

· GHS label elements

The product is classified and labeled according to the Globally Harmonized System (GHS).

Hazard pictograms



- · Signal word Warning
- Hazard-determining components of labeling: octamethylcyclotetrasiloxane

Hazard statements

Causes skin irritation. Causes serious eye irritation. Suspected of damaging fertility or the unborn child. Toxic to aquatic life with long lasting effects.

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· Precautionary statements
Obtain special instructions before use.
Do not handle until all safety precautions have been read and understood.
Wash thoroughly after handling.
Avoid release to the environment.
Wear protective gloves/protective clothing/eye protection/face protection.
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 exposed or concerned: Get medical advice/attention.
Specific treatment (see on this label).
Take off contaminated clothing and wash it before reuse.
If skin irritation occurs: Get medical advice/attention.
If eye irritation persists: Get medical advice/attention.
Collect spillage.
Store locked up.
Dispose of contents/container in accordance with local/regional/national/international regulations.
· Classification system:
NFPA ratings (scale 0 - 4)
Health = 2
Fire = 1
2 Reactivity = 0
· HMIS-ratings (scale 0 - 4)
HEALTH = 2 Health = 2
FIRE 1 Fire = 1
REACTIVITY 0 Reactivity = 0
· Other hazards
Results of PBT and vPvB assessment
· PBT:
556-67-2 octamethylcyclotetrasiloxane
· vPvB:
556-67-2 octamethylcyclotetrasiloxane

3 Composition/information on ingredients

· Chemical characterization: Mixture

· **Description:** Mixture of the substances listed below with nonhazardous additions.

· Dangerous components:			
22984-54-9	butan-2-one O,O',O''-(methylsilylidyne)trioxime	2–6%	
919-30-2	3-aminopropyltriethoxysilane	0.5–1.49%	
13822-56-5	3-(trimethoxysilyl)propylamine	0.5–1.49%	
34206-40-1	butan-2-one O,O',O'',O'''-silanetetrayltetraoxime	0.4–1%	
556-67-2	octamethylcyclotetrasiloxane	0.03–0.3%	

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4 First-aid measures

- · Description of first aid measures
- · General information: Immediately remove any clothing soiled by the product.
- After inhalation: In case of unconsciousness place patient stably in side position for transportation.
- After skin contact: Immediately wash with water and soap and rinse thoroughly.
- After eye contact:

Rinse opened eye for several minutes under running water. If symptoms persist, consult a doctor.

- After swallowing: If symptoms persist consult doctor.
- · Information for doctor:
- **Most important symptoms and effects, both acute and delayed** No further relevant information available.
- Indication of any immediate medical attention and special treatment needed No further relevant information available.

5 Fire-fighting measures

- · Extinguishing media
- Suitable extinguishing agents: Use fire fighting measures that suit the environment.
- Special hazards arising from the substance or mixture No further relevant information available.
- · Advice for firefighters
- · Protective equipment: No special measures required.

6 Accidental release measures

- \cdot Personal precautions, protective equipment and emergency procedures Not required.
- Environmental precautions:

Do not allow product to reach sewage system or any water course.

Inform respective authorities in case of seepage into water course or sewage system. Do not allow to enter sewers/ surface or ground water.

- Methods and material for containment and cleaning up: Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust). Dispose contaminated material as waste according to item 13.
- Reference to other sections
 See Section 7 for information on safe handling.
 See Section 8 for information on personal protection equipment.
 See Section 13 for disposal information.

7 Handling and storage

- · Handling:
- Precautions for safe handling Open and handle receptacle with care.
- Information about protection against explosions and fires: Keep respiratory protective device available.
- · Conditions for safe storage, including any incompatibilities
- · Storage:
- Requirements to be met by storerooms and receptacles: No special requirements.
- Information about storage in one common storage facility: Not required.
- Further information about storage conditions: Keep receptacle tightly sealed.

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· Specific end use(s) No further relevant information available.

8 Exposure controls/personal protection

• Additional information about design of technical systems: No further data; see item 7.

· Control parameters

· Components with limit values that require monitoring at the workplace:

The following constituent is the only constituent of the product which has a PEL, TLV or other recommended exposure limit.

At this time, the other constituents have no known exposure limits.

556-67-2 octamethylcyclotetrasiloxane

WEEL Long-term value: 10* ppm ***OARS WEEL**

• Additional information: The lists that were valid during the creation were used as basis.

Exposure controls

- · Personal protective equipment:
- · General protective and hygienic measures:

Keep away from foodstuffs, beverages and feed. Immediately remove all soiled and contaminated clothing. Wash hands before breaks and at the end of work. Store protective clothing separately. Avoid contact with the eyes and skin.

- · Breathing equipment: Not required.
- · Protection of hands:



Protective gloves

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation. Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

Material of gloves

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

· Penetration time of glove material

The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

• Eye protection:



Tightly sealed goggles

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9 Physical and chemical prope	erties			
 Information on basic physical and chemical properties General Information 				
 Appearance: Form: Color: Odor: Odor threshold: 	Highly viscous According to product specification Mild Not determined.			
· pH-value:	Not determined.			
 Change in condition Melting point/Melting range: Boiling point/Boiling range: 	Undetermined. Undetermined.			
· Flash point:	Not applicable.			
· Flammability (solid, gaseous):	Not applicable.			
· Decomposition temperature:	Not determined.			
· Ignition temperature:	Product is not selfigniting.			
· Danger of explosion:	Product does not present an explosion hazard.			
 Explosion limits: Lower: Upper: 	Not determined. Not determined.			
· Vapor pressure:	Not determined.			
 Density: Relative density Vapor density Evaporation rate 	Not determined. Not determined. Not determined. Not determined.			
 Solubility in / Miscibility with Water: 	Not miscible or difficult to mix.			
· Partition coefficient (n-octanol/wat	ter): Not determined.			
 Viscosity: Dynamic: Kinematic: 	Not determined. Not determined.			
· Other information	No further relevant information available.			

10 Stability and reactivity

· Reactivity No further relevant information available.

- · Chemical stability
- Thermal decomposition / conditions to be avoided:

No decomposition if used according to specifications.

- Possibility of hazardous reactions No dangerous reactions known.
- · Conditions to avoid No further relevant information available.
- · **Incompatible materials:** No further relevant information available.

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· Hazardous decomposition products:

Combustion may evolve carbo monoxide, carbon dioxide, silicone dioxide and formaldehyde.

11 Toxicological information

· Information on toxicological effects

· Acute toxicity:

· LD/LC50 values that are relevant for classification:

ATE (Acute Toxicity Estimate)

Oral LD50 119,463–356,000 mg/kg (rat)

Dermal LD50 4,286–12,500 mg/kg

919-30-2 3-aminopropyltriethoxysilane

Oral LD50 1,780 mg/kg (rat)

Dermal LD50 4,000 mg/kg (rabbit)

· Primary irritant effect:

- on the skin: Irritant to skin and mucous membranes.
- · on the eye: Irritating effect.
- · Sensitization: No sensitizing effects known.

• Additional toxicological information:

The product shows the following dangers according to internally approved calculation methods for preparations:

Irritant

· Carcinogenic categories

· IARC (International Agency for Research on Cancer)

14807-96-6 Talc (Mg3H2(SiO3)4)

· NTP (National Toxicology Program)

None of the ingredients is listed.

· OSHA-Ca (Occupational Safety & Health Administration)

None of the ingredients is listed.

12 Ecological information

- · Toxicity
- Aquatic toxicity: No further relevant information available.
- Persistence and degradability No further relevant information available.
- · Behavior in environmental systems:
- · Bioaccumulative potential No further relevant information available.
- · Mobility in soil No further relevant information available.
- Ecotoxical effects:
- · Remark: Toxic for fish
- · Additional ecological information:
- · General notes:

Do not allow product to reach ground water, water course or sewage system, even in small quantities. Danger to drinking water if even extremely small quantities leak into the ground. Also poisonous for fish and plankton in water bodies.

Toxic for aquatic organisms

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$^{\cdot}$ Results of PBT and vPvB assessment

· PBT:

556-67-2 octamethylcyclotetrasiloxane

· vPvB:

556-67-2 octamethylcyclotetrasiloxane

• Other adverse effects No further relevant information available.

13 Disposal considerations

· Waste treatment methods

· Recommendation:

Must not be disposed of together with household garbage. Do not allow product to reach sewage system.

· Uncleaned packagings:

• **Recommendation:** Disposal must be made according to official regulations.

· UN-Number	
DOT	not regulated
· IMDG, IATA	UN3082
· UN proper shipping name	
DOT	not regulated
· IMDG	ENVIRONMENTALLY HAZARDOUS SUBSTAN LIQUID, N.O.S. (octamethylcyclotetrasiloxa dibutyltin dilaurate), MARINE POLLUTANT ENVIRONMENTALLY HAZARDOUS SUBSTAN
	LIQUID, N.O.S. (octamethylcyclotetrasiloxa dibutyltin dilaurate)
· Transport hazard class(es)	
DOT	
· Class	not regulated
· IMDG, IATA	
· Class	9 Miscellaneous dangerous substances and articles
· Label	9
· Packing group	
DOT	not regulated
· IMDG, IATA	III
· Environmental hazards:	

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• Special marking (IATA):	Symbol (fish and tree)
· Special precautions for user	Warning: Miscellaneous dangerous substances and articles
Hazard identification number (Kemler code):	
 EMS Number: Stowage Category 	F-A,S-F A
 Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code 	Not applicable.
· Transport/Additional information:	
 IMDG Limited quantities (LQ) Excepted quantities (EQ) 	5L Code: E1 Maximum net quantity per inner packaging: 30 ml Maximum net quantity per outer packaging: 1000 ml
· UN "Model Regulation":	UN 3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (OCTAMETHYLCYCLOTETRASILOXANE, DIBUTYLTIN DILAURATE), 9, III

15 Regulatory information

• Safety, health and environmental regulations/legislation specific for the substance or mixture No further relevant information available.

· Sara

• Section 355 (extremely hazardous substances):

None of the ingredients is listed.

Section 313 (Specific toxic chemical listings):

None of the ingredients is listed.

• TSCA (Toxic Substances Control Act):

All components have the value ACTIVE.

· Hazardous Air Pollutants

None of the ingredients is listed.

· Proposition 65

· Chemicals known to cause cancer:

None of the ingredients is listed.

· Chemicals known to cause reproductive toxicity for females:

None of the ingredients is listed.

· Chemicals known to cause reproductive toxicity for males:

None of the ingredients is listed.

· Chemicals known to cause developmental toxicity:

None of the ingredients is listed.

· Carcinogenic categories

· EPA (Environmental Protection Agency)

None of the ingredients is listed.

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TLV (Thres	hold Limit Value)	
-	Talc (Mg3H2(SiO3)4)	A
77-58-7	dibutyltin dilaurate	A
NIOSH-Ca	National Institute for Occupational Safety and Health)	I
	ingredients is listed.	
GHS label of The product Hazard pict	is classified and labeled according to the Globally Harmonized System (GHS	S).
GHS07 G	HS08 GHS09	
Signal wore	d Warning	
octamethylo Hazard stat Causes skir Causes seri Suspected o		
Precaution Obtain spec Do not hand Wash thoro	ary statements ial instructions before use. lle until all safety precautions have been read and understood. ughly after handling. se to the environment.	
If on skin: W If in eyes: R to do. Contin IF exposed	ctive gloves/protective clothing/eye protection/face protection. /ash with plenty of water. inse cautiously with water for several minutes. Remove contact lenses, if pr nue rinsing. or concerned: Get medical advice/attention. atment (see on this label).	esent and ea
Take off cor If skin irritat	ntaminated clothing and wash it before reuse. on occurs: Get medical advice/attention. on persists: Get medical advice/attention. age.	
Dispose of o	contents/container in accordance with local/regional/national/international reg afety assessment: A Chemical Safety Assessment has not been carried out	

16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

- · Department issuing SDS: Regulatory Compliance Department
- · Contact: novagard@novagard.net
- · Date of preparation / last revision 08/25/2023
- Abbreviations and acronyms: IMDG: International Maritime Code for Dangerous Goods DOT: US Department of Transportation IATA: International Air Transport Association EINECS: European Inventory of Existing Commercial Chemical Substances

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⁻ US

US

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ELINCS: European List of Notified Chemical Substances		
CAS: Chemical Abstracts Service (division of the American Chemical Society)		
NFPA: National Fire Protection Association (USA)		
HMIS: Hazardous Materials Identification System (USA)		
LC50: Lethal concentration, 50 percent		
LD50: Lethal dose, 50 percent		
PBT: Persistent, Bioaccumulative and Toxic		
vPvB: very Persistent and very Bioaccumulative		
NIOSH: National Institute for Occupational Safety		
OSHA: Occupational Safety & Health		
TLV: Threshold Limit Value		
PEL: Permissible Exposure Limit		
REL: Recommended Exposure Limit		
Skin Irritation 2: Skin corrosion/irritation – Category 2		
Eye Irritation 2A: Serious eye damage/eye irritation – Category 2A		
Toxic to Reproduction 2: Reproductive toxicity – Category 2		
Aquatic Chronic 2: Hazardous to the aquatic environment - long-term aquatic hazard – Category 2		
** Data compared to the previous version altered.		