

MATERIAL SAFETY DATA SHEET
According to regulation (EC) No. 1907/2006
Date of issue: 1st November 2018
Version 2.0

SECTION 1: Identification of substance/mixture

1.1. Product Identifier

Product name: Rapid Thaw

Product Code: RT01

1.2 Relevant Identified Uses

Pharmaceutical production, cosmetic raw material and de-icer

1.3 Details of the Supplier

Smartseal UK Ltd
Units 15-16, Annwood Lodge Business Park
Arterial Road
Rayleigh, Essex
SS6 7UA

Emergency Tel. No.: 01268 722500

Service number: 01268 722500

SECTION 2: Hazards identification

2.1 Classification of the substance under EU Legislation

This substance is not classified as dangerous according to EU Legislation.

2.2 Label Elements

Not a hazardous material under Labelling Regulation (EC) No 1272/2008.

2.3 Other Hazards

None known.

SECTION 3: Composition

INGREDIENT	Percentage	CAS No.
1,2 Propanediol	>50	57-55-6
Water	<50	n/a

SECTION 4: FIRST AID MEASURES

4.1 Description of First Aid Measures

After inhalation: fresh air.

In case of skin contact: Take off contaminated clothing. Rinse skin with water/shower.

After eye contact: Rinse out with plenty of water.

After swallowing: Make victim drink no more than 2 glasses of water. Consult medical advice if unwell.

4.2 Most important symptoms and effects, acute and delayed

We have no description of any toxic symptoms.

4.3 Indication of any medical attention needed

No information available.

SECTION 5: Firefighting Measures

5.1 Extinguishing media

Water, foam, Carbon dioxide, Dry powder

Unsuitable extinguishing media

No limitations given.

5.2 Special hazards arising from substance/mixture

Combustible above 50 degrees centigrade.

Vapours are heavier than air so may spread along floors.

5.2 Advice for firefighters

In the event of fire, wear self contained breathing apparatus.

SECTION 6: Handling & storage

6.1 Precautions for safe handling

Storage conditions: Keep container tightly closed.

Do not store at temperatures of above 50 degrees centigrade.

SECTION 7: Exposure controls/personal protection

7.1 Individual protection measures

Protective clothing needs to be selected depending on the work environment and quantities used. The chemical resistance of protective equipment should be sought from the supplier.

Eye/Face Protection

Safety glasses.

Hand protection

Glove material: Nitrile rubber
Glove thickness: 0.11 mm
Break through time: >480 mins

Respiratory Protection

Required only when vapours are generated in enclosed spaces.

Recommended filter type: Filter A-(P2)

Environmental exposure controls

Apply at the recommended rates of application.

SECTION 8: Physical & chemical properties

8.1 Physical & chemical properties

Form: Liquid
Colour: Colourless
Odour: Characteristic
Odour threshold: No information

pH: 6-8
at 100g/l
20 degrees centigrade

Melting point: -59 degrees centigrade

Boiling point: 188 degrees centigrade

Flash point: 99 degrees centigrade

Evaporation rate: No information available

Density: 1.04 g/cm³

Water solubility: at 20 degrees C miscible in all proportions

Explosive properties: Not classified as explosive

Oxidising properties: None

Ignition temperature: 371 degrees centigrade

SECTION 9: Other data

9.1 Reactivity

Forms explosive mixtures with air on intense heating.

9.2 Chemical stability

The product is chemically stable under standard ambient temperatures.

9.3 Possibility of hazardous reactions

Increased reactivity with oxidising agents, acid anhydrides and acid chlorides.

9.4 Conditions to avoid

Strong heating.

9.5 Incompatible materials

Various plastics.

9.6 Hazardous decomposition products

No information available.

SECTION 10: Toxicological information

Acute oral toxicity: LD₅₀ Rat: 19400-36,000 mg/kg

Acute inhalation toxicity LD 50 Rabbit 20,800 mg/kg

Skin irritation: Rabbit – slight

Eye irritation: Rabbit – slight irritation

Sensitisation: Negative

Germ cell mutagenicity in vitro: Result negative

Carcinogenicity: No carcinogenic effects in animal experiments (IUCLID)

Reproductive toxicity: No impairment of reproductive capacity in animal experiments

Tetragenicity: No tetrogenic effects in animal experiments

Specific target organ toxicity, single or multiple exposure: No data available

Aspiration hazard: No data available

SECTION 11. Ecological information

11.1 Toxicity

Toxicity to fish

LC0 Oncorhynchus mykiss (rainbow trout) 51,600 mg/l: 96 h OECD test guidelines

Toxicity to Daphnia & other aquatic invertebrates

EC50 Daphnia magna (Water flea) 34,00 mg/l: 48 h OECD Test Guideline

Toxicity to algae

IC50 Pseudokirchneriella aubcapita (green algae): 19,000 mg/l: 96 h OECD Test Guideline 201

Toxicity to bacteria

EC50 Photobacterium phosphoreum: 26,800 mg/l: 30 mins

EC activated sludge:>1000 mg/l: 3hr

11.2 Persistence and degradeability

Biodegradability: 86%; 20d
OECD test guidelines 301D

87-92%: 28d
OECD Test Guidelines 301C

Readily biodegradeable

11.3 Bioaccumulative potential

Partial coefficient ; n-octanol/water
Log Pow: -0.92

Lit: Bioaccumulation is not expected.

11.4 Mobility in soil

No information available.

11.5 Results of PBT and PvB assessment

Not required and not conducted.

11.6 Other adverse effects

Stability in water: 2.3 years

Additional ecological information

Biological effects: When discharged properly, no impairment in the function of biological waste water treatment plants are to be expected.

No ecological problems are to be expected when the rproduct is handles and used with due care and attention.

SECTION 12: Disposal considerations

Water treatment methods: Waste material must be disposed of in accordance with national and local regulations. Leave chemicals in original containers. No mixing with other waste. Handle uncleaned containers like the product itself.

SECTION 13:Transport Information

Land transport (ADR/RID)

14.1-14.6: Not classified as dangerous in the meaning of transport regulations

Inland Waterway transport (AND)

14.1-14.6: Not classified as dangerous in the meaning of transport regulations.

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code: Not relevant.

SECTION 14: Regulatory information

14.1 Safety, health & environmental regulations/legislation specific to substance

National legislation: Storage class 10-13

14.2 Chemical safety assessment

Not available.

SECTION 15: Other information

Training advice: Provide adequate information, instruction and training for operators.

Labelling (67/548/EC) or 1999/45/EC

The product does not need to be labelled in accordance with EC directives or respective national laws.

The information contained herein is based on the present state of our knowledge. It characterises the product with regard to appropriate safety precautions, it does not represent a guarantee of any properties of this product.