



# Ice sensations - Fire & ice

## Safety Data Sheet

According to SANS 10234:2008 and SANS 11014:2010

Date of issue: 28/02/2020

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Version: 1.0

### SECTION 1: Identification

#### 1.1. Product identifier

Product form : Mixture  
Trade name : Ice sensations - Fire & ice  
Type of product : Vehicle interior air freshener  
Product code : SH564  
Product group : Trade product

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

No additional information available

#### 1.3. Supplier's details

##### Manufacturer

Shield Chemicals (Pty) Ltd  
9 London Rd  
Apex  
P.O. Box 1939  
1501 Benoni - South Africa  
T (011) 421 7111  
[info@shieldchem.co.za](mailto:info@shieldchem.co.za)

#### 1.4. Emergency telephone number

Emergency number : (011) 421 7111

### SECTION 2: Hazards identification

#### 2.1. Classification of the substance or mixture

##### Classification according to the United Nations GHS

Flammable liquids Not classified  
Skin corrosion/irritation, Category 3 H316  
Serious eye damage/eye irritation, Category 2A H319  
Skin sensitisation, Category 1 H317  
Reproductive toxicity, Category 2 H361  
Specific target organ toxicity — Repeated exposure, Category 2 H373  
Hazardous to the aquatic environment - Acute Hazard Not classified  
Hazardous to the aquatic environment — Chronic Hazard, Category 2 H411  
Full text of H statements : see section 16

#### 2.2. Label elements

##### Labelling according to the United Nations GHS

Hazard pictograms (GHS-ZA) :



GHS07

GHS08

GHS09

Signal word (GHS-ZA) : Warning

Hazard statements (GHS-ZA) :  
H316 - Causes mild skin irritation  
H317 - May cause an allergic skin reaction.  
H319 - Causes serious eye irritation.  
H361 - Suspected of damaging fertility or the unborn child.  
H373 - May cause damage to organs through prolonged or repeated exposure.  
H411 - Toxic to aquatic life with long lasting effects.

Precautionary statements (GHS-ZA) :  
P201 - Obtain special instructions before use.  
P202 - Do not handle until all safety precautions have been read and understood.  
P260 - Do not breathe vapours.  
P261 - Avoid breathing vapours.  
P264 - Wash hands, forearms and face thoroughly after handling.  
P272 - Contaminated work clothing should not be allowed out of the workplace.  
P273 - Avoid release to the environment.  
P280 - Wear eye protection, protective clothing, protective gloves.  
P302+P352 - IF ON SKIN: Wash with plenty of water.  
P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.  
P308+P313 - IF exposed or concerned: Get medical advice.

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P314 - Get medical advice if you feel unwell.  
P321 - Specific treatment (see supplemental first aid instruction on this label)  
P332+P313 - If skin irritation occurs: Get medical advice.  
P333+P313 - If skin irritation or rash occurs: Get medical advice.  
P337+P313 - If eye irritation persists: Get medical advice.  
P362+P364 - Take off contaminated clothing and wash it before reuse.  
P391 - Collect spillage.  
P405 - Store locked up.  
P501 - Dispose of contents and container to an approved waste disposal plant.

### 2.3. Other hazards

Adverse physicochemical, human health and environmental effects : Suspected of damaging fertility or the unborn child, May cause damage to organs through prolonged or repeated exposure, Causes mild skin irritation, May cause an allergic skin reaction, Causes serious eye irritation, Toxic to aquatic life with long lasting effects.

## SECTION 3: Composition/information on ingredients

### 3.1. Substances

Not applicable

### 3.2. Mixtures

Name	Product identifier	%	Classification according to the United Nations GHS
2-tert-butylcyclohexanol acetate	(CAS-No.) 88-41-5	10.0 - 20.0	Flam. Liq. 4, H227 Acute Tox. 5 (Oral), H303 Acute Tox. Not classified (Dermal)
1-(1,2,3,4,5,6,7,8-octahydro-2,3,8,8-tetramethyl-2-naphthyl)ethan-1-one		1.0 - 5.0	Skin Irrit. 2, H315 Eye Dam. 1, H318 Skin Sens. 1, H317 Aquatic Chronic 1, H410

Full text of H-statements: see section 16

## SECTION 4: First aid measures

### 4.1. Description of first aid measures

First-aid measures general : IF exposed or concerned: Get medical advice/attention.  
First-aid measures after inhalation : Remove person to fresh air and keep comfortable for breathing.  
First-aid measures after skin contact : Wash skin with plenty of water. Take off contaminated clothing. If skin irritation or rash occurs: Get medical advice/attention.  
First-aid measures after eye contact : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.  
First-aid measures after ingestion : Call a poison center or a doctor if you feel unwell.

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

Symptoms/effects after skin contact : Irritation. May cause an allergic skin reaction.  
Symptoms/effects after eye contact : Eye irritation.

### 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 : Water spray. Dry powder. Foam. Carbon dioxide.

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

No additional information available

### 5.3. Advice for firefighters

Protection during firefighting : Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing.

## SECTION 6: Accidental release measures

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

No additional information available

#### 6.1.1. For non-emergency personnel

Emergency procedures : Ventilate spillage area. Do not breathe vapours. Avoid contact with skin and eyes.

#### 6.1.2. For emergency responders

Protective equipment : Do not attempt to take action without suitable protective equipment. For further information refer to section 8: "Exposure controls/personal protection".

### 6.2. Environmental precautions

Avoid release to the environment.

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

For containment	: Collect spillage.
Methods for cleaning up	: Take up liquid spill into absorbent material. Notify authorities if product enters sewers or public waters.
Other information	: Dispose of materials or solid residues at an authorized site.

## SECTION 7: Handling and storage

### 7.1. Precautions for safe handling

Precautions for safe handling	: Ensure good ventilation of the work station. Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Wear personal protective equipment. Do not breathe vapours. Avoid contact with skin and eyes.
Hygiene measures	: Wash contaminated clothing before reuse. Contaminated work clothing should not be allowed out of the workplace. Do not eat, drink or smoke when using this product. Always wash hands after handling the product.

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

Storage conditions	: Store locked up. Store in a well-ventilated place. Keep cool.
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## SECTION 8: Exposure controls/personal protection

### 8.1. Control parameters

No additional information available

### 8.2. Appropriate engineering controls

Appropriate engineering controls	: Ensure good ventilation of the work station.
Environmental exposure controls	: Avoid release to the environment.

### 8.3. Individual protection measures, such as personal protective equipment (PPE)

Hand protection	: Protective gloves
Eye protection	: Safety glasses
Skin and body protection	: Wear suitable protective clothing
Respiratory protection	: [In case of inadequate ventilation] wear respiratory protection.

### 8.4. Exposure limit values for the other components

No additional information available

## SECTION 9: Physical and chemical properties

### 9.1. Information on basic physical and chemical properties

Physical state	: Liquid
Appearance	: Liquid.
Colour	: No data available
Odour	: characteristic.
Odour threshold	: No data available
pH	: No data available
pH solution	: No data available
Relative evaporation rate (butylacetate=1)	: No data available
Relative evaporation rate (ether=1)	: No data available
Melting point	: Not applicable
Freezing point	: No data available
Boiling point	: No data available
Flash point	: ≈ 96 °C closed cup
Auto-ignition temperature	: No data available
Decomposition temperature	: No data available
Flammability (solid, gas)	: Not applicable
Vapour pressure	: ≈ 0.1 hPa
Vapour pressure at 50 °C	: No data available
Relative vapour density at 20 °C	: No data available
Relative density	: No data available
Relative density of saturated gas/air mixture	: No data available
Density	: 0.972 - 0.982 g/cm <sup>3</sup>
Relative gas density	: No data available
Solubility	: Insoluble in water.

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Log Pow	: No data available
Log Kow	: No data available
Viscosity, kinematic	: No data available
Viscosity, dynamic	: No data available
Explosive properties	: No data available
Oxidising properties	: No data available
Explosive limits	: No data available
Lower explosive limit (LEL)	: No data available
Upper explosive limit (UEL)	: No data available

### 9.2. Other information

No additional information available

## SECTION 10: Stability and reactivity

### 10.1. Reactivity

The product is non-reactive under normal conditions of use, storage and transport.

### 10.2. Chemical stability

Stable under normal conditions.

### 10.3. Possibility of hazardous reactions

No dangerous reactions known under normal conditions of use.

### 10.4. Conditions to avoid

None under recommended storage and handling conditions (see section 7).

### 10.5. Incompatible materials

No additional information available

### 10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

## SECTION 11: Toxicological information

### 11.1. Information on toxicological effects

Acute toxicity (oral)	: Not classified
Acute toxicity (dermal)	: Not classified
Acute toxicity (inhalation)	: Not classified

2-tert-butylcyclohexanol acetate (88-41-5)	
LD50 oral rat	4600 mg/kg (Equivalent or similar to OECD 401, Rat, Experimental value, Oral, 14 day(s))
LD50 dermal rabbit	> 5000 mg/kg (Equivalent or similar to OECD 402, Rabbit, Experimental value, Dermal)

Skin corrosion/irritation	: Causes mild skin irritation.
Serious eye damage/irritation	: Causes serious eye irritation.
Respiratory or skin sensitisation	: May cause an allergic skin reaction.
Germ cell mutagenicity	: Not classified
Carcinogenicity	: Not classified
Reproductive toxicity	: Suspected of damaging fertility or the unborn child.
STOT-single exposure	: Not classified
STOT-repeated exposure	: May cause damage to organs through prolonged or repeated exposure.
Aspiration hazard	: Not classified

## SECTION 12: Ecological information

### 12.1. Toxicity

Ecology - general	: Toxic to aquatic life with long lasting effects.
Hazardous to the aquatic environment, short-term (acute)	: Not classified.
Hazardous to the aquatic environment, long-term (chronic)	: Toxic to aquatic life with long lasting effects.

2-tert-butylcyclohexanol acetate (88-41-5)	
BCF fish 1	384.6 l/kg (BCFBAF v3.01, Calculated value, Fresh weight)
Log Pow	4.42 (Estimated value, KOWWIN)
Log Koc	2.644 (log Koc, SRC PCKOCWIN v2.0, Calculated value)

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### 12.2. Persistence and degradability

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Persistence and degradability	No additional information available

#### 2-tert-butylcyclohexanol acetate (88-41-5)

Persistence and degradability	Not readily biodegradable in water.
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### 12.3. Bioaccumulative potential

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Bioaccumulative potential	No additional information available

#### 2-tert-butylcyclohexanol acetate (88-41-5)

BCF fish 1	See section 12.1 on ecotoxicology
Log Pow	See section 12.1 on ecotoxicology
Log Koc	See section 12.1 on ecotoxicology
Bioaccumulative potential	Low potential for bioaccumulation (BCF < 500).

### 12.4. Mobility in soil

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Mobility in soil	No additional information available

#### 2-tert-butylcyclohexanol acetate (88-41-5)

Log Pow	See section 12.1 on ecotoxicology
Log Koc	See section 12.1 on ecotoxicology
Ecology - soil	Low potential for adsorption in soil.

### 12.5. Other adverse effects

Ozone	: Not classified
Other adverse effects	: No additional information available




## SECTION 13: Disposal considerations

### 13.1. Disposal methods

Waste treatment methods	: Dispose of contents/container in accordance with licensed collector's sorting instructions.
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## SECTION 14: Transport information

In accordance with SANS / IMDG / IATA

SANS	IMDG	IATA
<b>14.1. UN number</b> 3082	3082	3082
<b>14.2. Proper Shipping Name</b> ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.	Environmentally hazardous substance, liquid, n.o.s.
<b>14.3. Transport hazard class(es)</b> 9 	9 	9  Not applicable
<b>14.4. Packing group</b> III	III	III
<b>14.5. Environmental hazards</b> Dangerous for the environment : Yes	Dangerous for the environment : No :	Dangerous for the environment : No
No supplementary information available		

### 14.6. Special precautions for user

#### - SANS

Special provisions (SANS)	: 179, 274, 331, 335
Limited quantities (SANS)	: 5 L
Limited quantities (SANS)	: 5 L
Packagings, large packagings and IBCs	: P001, IBC03, LP01
Packing instructions (SANS)	

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Packagings, large packagings and IBCs Special : PP1  
packing instructions (SANS)  
Portable tank and bulk containers instructions : T4  
(SANS)  
Portable tank and bulk container special : TP1, TP29  
provisions (SANS)

### - IMDG

Special provisions (IMDG) : 274, 335, 969  
Limited quantities (IMDG) : 5 L  
Excepted quantities (IMDG) : E1  
Packing instructions (IMDG) : LP01, P001  
Special packing provisions (IMDG) : PP1  
IBC packing instructions (IMDG) : IBC03  
Tank instructions (IMDG) : T4  
Tank special provisions (IMDG) : TP2, TP29  
EmS-No. (Fire) : F-A - FIRE SCHEDULE Alfa - GENERAL FIRE SCHEDULE  
EmS-No. (Spillage) : S-F - SPILLAGE SCHEDULE Foxtrot - WATER-SOLUBLE MARINE POLLUTANTS  
Stowage category (IMDG) : A

### - IATA

PCA Excepted quantities (IATA) : E1  
PCA Limited quantities (IATA) : Y964  
PCA limited quantity max net quantity (IATA) : 30kgG  
PCA packing instructions (IATA) : 964  
PCA max net quantity (IATA) : 450L  
CAO packing instructions (IATA) : 964  
CAO max net quantity (IATA) : 450L  
Special provisions (IATA) : A97, A158, A197  
ERG code (IATA) : 9L

### 14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Not applicable

## SECTION 15: Regulatory information

### 15.1. Safety, health, and environmental national regulations specific for the product

No additional information available

## SECTION 16: Other information

Date of issue : 28/02/2020  
Revision date : 28/02/2022

Full text of H-statements:

H226	Flammable liquid and vapour.
H227	Combustible liquid
H302	Harmful if swallowed.
H303	May be harmful if swallowed
H313	May be harmful in contact with skin
H315	Causes skin irritation.
H316	Causes mild skin irritation
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H335	May cause respiratory irritation.
H361	Suspected of damaging fertility or the unborn child.
H373	May cause damage to organs through prolonged or repeated exposure.
H400	Very toxic to aquatic life.
H401	Toxic to aquatic life
H402	Harmful to aquatic life
H410	Very toxic to aquatic life with long lasting effects.
H411	Toxic to aquatic life with long lasting effects.

SDS South Africa

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*This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.*