

Date: 20th September 2017 Supersedes: V1, June 2015 Version number: 2

## **SAFETY DATA SHEET**

## **IKO SprayFast IBA Green**

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

#### 1.1. Product identifier

Product name IKO SprayFast IBA Green Canister

Product number 58800102

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

**Identified uses** Adhesive.

**Uses advised against** Use only for intended applications.

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

Supplier IKO PLC

Head Office

Appley Lane North Appley Bridge Wigan

Lancashire WN6 9AB

UKTechnical@iko.com

#### 1.4. Emergency telephone number Tel: +44 (0)1257 256864 Opening Times: 0900 - 1700 Monday to Friday

## SECTION 2: Hazards identification

## 2.1. Classification of the substance or mixture

## Classification (EC 1272/2008)

Physical hazards Aerosol 1 - H222, H229

Health hazards Acute Tox. 4 - H332 Skin Irrit. 2 - H315 Eye Irrit. 2 - H319 Resp. Sens. 1 - H334 Skin Sens. 1

- H317 Carc. 2 - H351 STOT SE 3 - H335 STOT RE 2 - H373

Environmental hazards Not Classified

#### 2.2. Label elements

## **Pictogram**







Signal word

Danger



Hazard statements H222 Extremely flammable aerosol.

H229 Pressurised container: may burst if heated

H315 Causes skin irritation.

H317 May cause an allergic skin reaction.

H319 Causes serious eye irritation. H332 Harmful if inhaled.

H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled.

H335 May cause respiratory irritation. H351 Suspected of causing cancer.

H373 May cause damage to organs through prolonged or repeated exposure.

**Precautionary statements** 

P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No

smoking.

P211 Do not spray on an open flame or other ignition source.

P251 Do not pierce or burn, even after use.

P260 Do not breathe spray.

P280 Wear protective gloves/ protective clothing/ eye protection/ face protection.

P302+P352 IF ON SKIN: Wash with plenty of water.

P410+P412 Protect from sunlight. Do not expose to temperatures exceeding 50°C/122°F.

P501 Dispose of contents/ container in accordance with national regulations.

Supplemental label

information

For the safe disposal of the canister, please refer to the appropriate technical literature

EUH204 Contains isocyanates. May produce an allergic reaction.

RCH002b For professional users only.

Contains DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

Supplementary precautionary

statements

P201 Obtain special instructions before use.

P202 Do not handle until all safety precautions have been read and understood.

P261 Avoid breathing spray.

P264 Wash contaminated skin thoroughly after handling. P271 Use only outdoors or in a well-ventilated area.

P272 Contaminated work clothing should not be allowed out of the workplace.

P284 [In case of inadequate ventilation] wear respiratory protection.

P304+P340 IF INHALED: Remove person to fresh air and keep comfortable for breathing. 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/ attention.

P312 Call a POISON CENTER/ doctor if you feel unwell.
P314 Get medical advice/ attention if you feel unwell.
P321 Specific treatment (see medical advice on this label).
P332+P313 If skin irritation occurs: Get medical advice/ attention.
P333+P313 If skin irritation or rash occurs: Get medical advice/ attention.

P337+P313 If eye irritation persists: Get medical advice/ attention.

P342+P311 If experiencing respiratory symptoms: Call a POISON CENTER/ doctor.

P362+P364 Take off contaminated clothing and wash it before reuse. P403+P233 Store in a well-ventilated place. Keep container tightly closed.

P405 Store locked up.

## 2.3. Other hazards

## SECTION 3: Composition/information on ingredients

## 3.2. Mixtures



# DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

30-60%

CAS number: 9016-87-9 REACH registration number: 01-

2119457024-46-0006

Classification

Acute Tox. 4 - H332 Skin Irrit. 2 - H315 Eye Irrit. 2 - H319 Resp. Sens. 1 - H334 Skin Sens. 1 - H317 Carc. 2 - H351 STOT SE 3 - H335 STOT RE 2 - H373

1,1-Difluoroethane 10-30%

CAS number: 75-37-6 EC number: 200-866-1 REACH registration number: 01-

2119474440-43-0000

Classification

Flam. Gas 1 - H220

Press. Gas, Liquefied - H280

Nitrogen 10-30%

CAS number: 7727-37-9 EC number: 231-783-9

Classification

Press. Gas, Compressed - H280

#### 2,2'DIMORPHOLINYLDIETHYL ETHER

1-5%

CAS number: 6425-39-4 EC number: 229-194-7 REACH registration number: 01-

2119969278-20-0000

Classification

Eye Irrit. 2 - H319

The full text for all hazard statements is displayed in Section 16.

## SECTION 4: First aid measures

## 4.1. Description of first aid measures

#### General information

Get medical attention immediately. Show this Safety Data Sheet to the medical personnel.

### Inhalation

Remove affected person from source of contamination. Move affected person to fresh air and keep warm and at rest in a position comfortable for breathing. Maintain an open airway. Loosen tight clothing such as collar, tie or belt. When breathing is difficult, properly trained personnel may assist affected person by administering oxygen. Place unconscious person on their side in the recovery position and ensure breathing can take place.



Ingestion Move affected person to fresh air and keep warm and at rest in a position comfortable for

> breathing. Rinse nose and mouth with water. Place unconscious person on their side in the recovery position and ensure breathing can take place. Never give anything by mouth to an

unconscious person. Get medical attention.

Skin contact After contact with skin, take off immediately all contaminated clothing, and wash immediately

> with plenty of water. Remove contamination with soap and water or recognised skin cleansing agent. If adhesive bonding occurs, do not force skin apart. Get medical attention if symptoms

are severe or persist after washing.

Eye contact Rinse immediately with plenty of water. Remove contact lenses, if present and easy to do.

Continue rinsing. Continue to rinse for at least 15 minutes and get medical attention. If

adhesive bonding occurs, do not force eyelids apart.

Protection of first aiders First aid personnel should wear appropriate protective equipment during any rescue. Wash

contaminated clothing thoroughly with water before removing it from the affected person, or

wear gloves. It may be dangerous for first aid personnel to carry out mouth-to-mouth

resuscitation.

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

General information See Section 11 for additional information on health hazards. The severity of the symptoms

> described will vary dependent on the concentration and the length of exposure. May produce an allergic reaction. May cause damage to organs. Prolonged or repeated exposure may

cause the following adverse effects: May cause cancer.

Inhalation A single exposure may cause the following adverse effects: Headache. Nausea, vomiting.

> Central nervous system depression. May cause sensitisation or allergic reactions in sensitive individuals. Upper respiratory irritation. Harmful by inhalation. Prolonged or repeated exposure

may cause the following adverse effects: May cause cancer.

Ingestion May cause stomach pain or vomiting. May cause irritation. Prolonged or repeated exposure

may cause the following adverse effects: May cause cancer.

Skin contact Redness. Skin irritation. May cause skin sensitisation or allergic reactions in sensitive

individuals. Prolonged or repeated exposure may cause the following adverse effects: May

cause cancer.

Eye contact Irritation of eyes and mucous membranes.

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

Notes for the doctor If adhesive bonding occurs, do not force eyelids apart. Treat symptomatically.

#### **SECTION 5: Firefighting measures**

## 5.1. Extinguishing media

Suitable extinguishing media The product is flammable. Extinguish with alcohol-resistant foam, carbon dioxide, dry powder

or water fog. Use fire-extinguishing media suitable for the surrounding fire.

Unsuitable extinguishing

media

Do not use water jet as an extinguisher, as this will spread the fire.

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

Specific hazards Containers can burst violently or explode when heated, due to excessive pressure build-up.

> Bursting aerosol containers may be propelled from a fire at high speed. If aerosol cans are ruptured, care should be taken due to the rapid escape of the pressurised contents and

propellant. Vapours may form explosive mixtures with air.

Hazardous combustion

products

Thermal decomposition or combustion products may include the following substances:

Carbon dioxide (CO2). Carbon monoxide (CO). Harmful gases or vapours.



#### 5.3. Advice for firefighters

# Protective actions during firefighting

Avoid breathing fire gases or vapours. Evacuate area. Keep upwind to avoid inhalation of gases, vapours, fumes and smoke. Cool containers exposed to heat with water spray and remove them from the fire area if it can be done without risk. Cool containers exposed to flames with water until well after the fire is out. If a leak or spill has not ignited, use water spray to disperse vapours and protect men stopping the leak. Control run-off water by containing and keeping it out of sewers and watercourses. If risk of water pollution occurs, notify appropriate authorities.

## Special protective equipment for firefighters

Wear positive-pressure self-contained breathing apparatus (SCBA) and appropriate protective clothing. Firefighter's clothing conforming to European standard EN469 (including helmets, protective boots and gloves) will provide a basic level of protection for chemical incidents.

#### SECTION 6: Accidental release measures

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

## Personal precautions

No action shall be taken without appropriate training or involving any personal risk. Keep unnecessary and unprotected personnel away from the spillage. Wear protective clothing as described in Section 8 of this safety data sheet. Follow precautions for safe handling described in this safety data sheet. Avoid contact with skin, eyes and clothing. Avoid inhalation of vapours. Wash thoroughly after dealing with a spillage. Ensure procedures and training for emergency decontamination and disposal are in place. Do not touch or walk into spilled material. Evacuate area. Provide adequate ventilation. No smoking, sparks, flames or other sources of ignition near spillage. Risk of explosion. Promptly remove any clothing that becomes contaminated.

#### 6.2. Environmental precautions

### **Environmental precautions**

Avoid discharge into drains or watercourses or onto the ground. Avoid discharge to the aquatic environment. Large Spillages: Inform the relevant authorities if environmental pollution occurs (sewers, waterways, soil or air).

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

#### Methods for cleaning up

Wear suitable protective equipment, including gloves, goggles/face shield, respirator, boots, clothing or apron, as appropriate. Clear up spills immediately and dispose of waste safely. Eliminate all ignition sources if safe to do so. No smoking, sparks, flames or other sources of ignition near spillage. Approach the spillage from upwind. Under normal conditions of handling and storage, spillages from aerosol containers are unlikely. Small Spillages: Wipe up with an absorbent cloth and dispose of waste safely. Large Spillages: If the product is soluble in water, dilute the spillage with water and mop it up. Alternatively, or if it is not water-soluble, absorb the spillage with an inert, dry material and place it in a suitable waste disposal container. Flush away spillage with plenty of water. Wash thoroughly after dealing with a spillage. Dispose of waste to licensed waste disposal site in accordance with the requirements of the local Waste Disposal Authority.

## 6.4. Reference to other sections

#### Reference to other sections

For personal protection, see Section 8. See Section 11 for additional information on health hazards. See Section 12 for additional information on ecological hazards. For waste disposal, see Section 13.

## SECTION 7: Handling and storage

#### 7.1. Precautions for safe handling

Version number: 2

#### Usage precautions

For professional users only. Read and follow manufacturer's recommendations. Do not handle until all safety precautions have been read and understood. Wear protective clothing as described in Section 8 of this safety data sheet. Avoid contact with eyes. For users with sensitive skin, it is recommended that suitable protective gloves are worn. Keep away from food, drink and animal feeding stuffs. Avoid exposing aerosol containers to high temperatures or direct sunlight. The product is flammable. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Do not spray on an open flame or other ignition source. Do not pierce or burn, even after use. Do not handle broken packages without protective equipment. Spray will evaporate and cool rapidly and may cause frostbite or cold burns if in contact with skin.

## Advice on general occupational hygiene

Wash promptly if skin becomes contaminated. Take off contaminated clothing. Wash contaminated clothing before reuse. Do not eat, drink or smoke when using this product. Wash at the end of each work shift and before eating, smoking and using the toilet. Change work clothing daily before leaving workplace.

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

Storage precautions Store at temperatures between 10°C and 25°C. Store away from incompatible materials (see

> Section 10). Store in accordance with national regulations. Keep away from oxidising materials, heat and flames. Keep only in the original container. Keep container tightly closed and in a well-ventilated place. Keep containers upright. Protect containers from damage. Protect from sunlight. Do not store near heat sources or expose to high temperatures. Do not expose to temperatures exceeding 50°C/122°F. Bund storage facilities to prevent soil and water pollution in the event of spillage. The storage area floor should be leak-tight, jointless

and not absorbent.

Storage class Flammable compressed gas storage.

7.3. Specific end use(s)

Specific end use(s) The identified uses for this product are detailed in Section 1.2.

## SECTION 8: Exposure Controls/personal protection

## 8.1. Control parameters

## Occupational exposure limits

#### DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

Long-term exposure limit (8-hour TWA): WEL 0.07 mg/m<sup>3</sup> Short-term exposure limit (15-minute): WEL 0.02 mg/m<sup>3</sup>

WEL = Workplace Exposure Limit

## DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES) (CAS: 9016-87-9)

Ingredient comments WEL = Workplace Exposure Limits



**DNEL** Workers - Dermal; Short term systemic effects: 50 mg/kg

Workers - Inhalation; Short term systemic effects: 0.1 mg/m³ Workers - Dermal; Short term local effects: 28.7 mg/cm² Workers - Inhalation; Short term local effects: 0.1 mg/m³ Workers - Inhalation; Long term systemic effects: 0.05 mg/m³ Workers - Inhalation; Long term local effects: 0.05 mg/m³

General population - Dermal; Short term systemic effects: 25 mg/kg General population - Inhalation; Short term systemic effects: 0.05 mg/m³ General population - Oral; Short term systemic effects: 20 mg/kg General population - Dermal; Short term local effects: 17.2 mg/cm² General population - Inhalation; Short term local effects: 0.05 mg/m³

General population - Inhalation; Long term systemic effects: 0.025 mg/m³
General population - Inhalation; Long term local effects: 0.025 mg/m³

PNEC - Fresh water; 1 mg/l

Marine water; 0.1 mg/lSoil; 1 mg/kg dry weight

- STP; 1 mg/l

## 2,2'DIMORPHOLINYLDIETHYL ETHER (CAS: 6425-39-4)

**DNEL** Workers - Inhalation; Long term systemic effects: 7.28 mg/m³

Workers - Dermal; Long term systemic effects: 1 mg/kg bw/day Consumer - Inhalation; Long term systemic effects: 1.8 mg/m³ Consumer - Dermal; Long term systemic effects: 0.5 mg/kg bw/day Consumer - Oral; Long term systemic effects: 0.5 mg/kg bw/day

PNEC - Fresh water; 0.1 mg/l

- Marine water; 0.01 mg/l - Intermittent release; 1 mg/l

Sediment (Freshwater); 8.2 mg/kgSediment (Marinewater); 0.82 mg/kg

- STP; 100 mg/l - Soil; 1.58 mg/kg

#### 8.2. Exposure controls

## Protective equipment







## Appropriate engineering controls

Provide adequate ventilation. Personal, workplace environment or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment. Use process enclosures, local exhaust ventilation or other engineering controls as the primary means to minimise worker exposure. Personal protective equipment should only be used if worker exposure cannot be controlled adequately by the engineering control measures. Ensure control measures are regularly inspected and maintained. Ensure the ventilation system is regularly maintained and tested. As this product contains ingredients with exposure limits, process enclosures, local exhaust ventilation or other engineering controls should be used to keep worker exposure below any statutory or recommended limits, if use generates dust, fumes, gas, vapour or mist.

## Eye/face protection

Eyewear complying with an approved standard should be worn if a risk assessment indicates eye contact is possible. Personal protective equipment for eye and face protection should comply with European Standard EN166. Wear tight-fitting, chemical splash goggles or face shield. If inhalation hazards exist, a full-face respirator may be required instead.





Hand protection Chemical-resistant, impervious gloves complying with an approved standard should be worn if

a risk assessment indicates skin contact is possible. The most suitable glove should be chosen in consultation with the glove supplier/manufacturer, who can provide information about the breakthrough time of the glove material. To protect hands from chemicals, gloves should comply with European Standard EN374. Considering the data specified by the glove manufacturer, check during use that the gloves are retaining their protective properties and change them as soon as any deterioration is detected. Frequent changes are recommended.

Other skin and body

protection

Appropriate footwear and additional protective clothing complying with an approved standard

should be worn if a risk assessment indicates skin contamination is possible.

Hygiene measures Provide eyewash station and safety shower. Contaminated work clothing should not be

allowed out of the workplace. Wash contaminated clothing before reuse. Clean equipment and the work area every day. Good personal hygiene procedures should be implemented. Wash at the end of each work shift and before eating, smoking and using the toilet. When using do not eat, drink or smoke. Preventive industrial medical examinations should be carried

out. Warn cleaning personnel of any hazardous properties of the product.

Respiratory protection Respiratory protection complying with an approved standard should be worn if a risk

assessment indicates inhalation of contaminants is possible. Ensure all respiratory protective equipment is suitable for its intended use and is 'CE'-marked. Check that the respirator fits tightly and the filter is changed regularly. Gas and combination filter cartridges should comply with European Standard EN14387. Full face mask respirators with replaceable filter cartridges should comply with European Standard EN136. Half mask and quarter mask respirators with

replaceable filter cartridges should comply with European Standard EN140.

**Environmental exposure** 

controls

Keep container tightly sealed when not in use.

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

## 9.1. Information on basic physical and chemical properties

Appearance Aerosol.

Colour Amber.

Odour Characteristic.

Odour threshold Not available.

**pH** Not available.

Melting point Not available.

**Initial boiling point and range** Not available.

Flash point Technically not feasible.

Evaporation rate Not available.

Evaporation factor Not available.

Flammability (solid, gas) Not available.

Upper/lower flammability or

explosive limits

: 4 - 20.2 (R152a)

Other flammabilityNot available.Vapour pressureNot available.Vapour densityNot available.

Relative density > 1.1



Bulk density Not available.

Solubility(ies) Insoluble in water.

Partition coefficient Not available.

**Decomposition Temperature** Not available.

Viscosity Not available.

**Explosive properties** Not considered to be explosive.

Explosive under the influence

of a flame

Not considered to be explosive.

Oxidising properties Does not meet the criteria for classification as oxidising.

**Comments** Information given is applicable to the product as supplied.

9.2. Other information

Other information No information required.

Refractive index Not available.

Particle size Not available.

Molecular weight Not available.

Volatility Not available.

Saturation concentration Not available.

Critical temperature Not available.

## **SECTION 10: Stability and reactivity**

## 10.1. Reactivity

**Reactivity** See the other subsections of this section for further details.

10.2. Chemical stability

Stability Stable at normal ambient temperatures and when used as recommended. Stable under the

prescribed storage conditions.

## 10.3. Possibility of hazardous reactions

Possibility of hazardous

reactions

The following materials may react with the product: Oxidising agents.

10.4. Conditions to avoid

Conditions to avoid Avoid exposing aerosol containers to high temperatures or direct sunlight. Containers can

burst violently or explode when heated, due to excessive pressure build-up. Avoid heat.

Water, moisture.

10.5. Incompatible materials

Materials to avoid Avoid contact with the following materials: Strong oxidising agents. Strong acids.

10.6. Hazardous decomposition products

**Hazardous decomposition** Thermal decomposition or combustion products may include the following substances:

products Carbon monoxide (CO). Carbon dioxide (CO2). Harmful gases or vapours.

## SECTION 11: Toxicological information

## 11.1. Information on toxicological effects



Acute toxicity - oral

Notes (oral LD₅) Based on available data the classification criteria are not met.

Acute toxicity - dermal

Notes (dermal LD<sub>50</sub>) Based on available data the classification criteria are not met.

Acute toxicity - inhalation

ATE inhalation (vapours mg/l) 25.06

ATE inhalation (dusts/mists

Skin corrosion/irritation

mg/l)

ıg/I)

**Skin corrosion/irritation** Irritating to skin.

Serious eye damage/irritation

**Serious eye damage/irritation** Causes serious eye irritation.

3.42

Respiratory sensitisation

Respiratory sensitisation Sensitising.

Skin sensitisation

Skin sensitisation Sensitising.

Germ cell mutagenicity

**Genotoxicity - in vitro**Based on available data the classification criteria are not met.

Carcinogenicity

Carcinogenicity Suspected of causing cancer.

Reproductive toxicity

Reproductive toxicity - fertility Based on available data the classification criteria are not met.

Specific target organ toxicity - single exposure

Target organs Respiratory system, lungs

Aspiration hazard

Aspiration hazard Not relevant.

General information The severity of the symptoms described will vary dependent on the concentration and the

length of exposure. May produce an allergic reaction. May cause damage to organs. Prolonged or repeated exposure may cause the following adverse effects: Suspected of

causing cancer.

**Inhalation** A single exposure may cause the following adverse effects: Headache. Nausea, vomiting.

Central nervous system depression. May cause sensitisation or allergic reactions in sensitive

individuals. Upper respiratory irritation.

**Ingestion** May cause stomach pain or vomiting. May cause irritation.

Skin contact Redness. Irritating to skin. May cause sensitisation or allergic reactions in sensitive

individuals.

**Eye contact** Irritation of eyes and mucous membranes.

Acute and chronic health

hazards

Suspected of causing cancer.

Toxicological information on ingredients.



## DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

Acute toxicity - oral

Acute toxicity oral (LD50

10.000.0

mg/kg)

**Species** Rat

10,000.0 ATE oral (mg/kg)

Acute toxicity - dermal

Acute toxicity dermal (LD<sub>50</sub> 9,400.0

mg/kg)

**Species** Rabbit

ATE dermal (mg/kg) 9,400.0

Acute toxicity - inhalation

Acute toxicity inhalation

0.493

(LC<sub>50</sub> vapours mg/l)

**Species** Rat

Acute toxicity inhalation

0.31

(LC50 dust/mist mg/l)

**Species** Rat

ATE inhalation (vapours 11.0

mg/l)

ATE inhalation 1.5

(dusts/mists mg/l)

Skin corrosion/irritation

Animal data Irritating.

Serious eye damage/irritation

Serious eye

Moderately irritating.

damage/irritation

Respiratory sensitisation

Respiratory sensitisation Sensitising.

Carcinogenicity

Carcinogenicity Suspected carcinogen based on limited evidence.

Target organ for carcinogenicity

No specific target organs known.

Reproductive toxicity

Reproductive toxicity -

This substance has no evidence of toxicity to reproduction.

development

Specific target organ toxicity - repeated exposure

STOT - repeated exposure Morphological changes that are potentially reversible but provide clear evidence of

marked organ dysfunction.



Aspiration hazard

Aspiration hazard Not anticipated to present an aspiration hazard, based on chemical structure.

Inhalation Irritating to respiratory system. May cause sensitisation by inhalation.

Ingestion May cause stomach pain or vomiting.

Skin contact Irritating to skin. May cause sensitisation by skin contact.

Eye contact Irritation of eyes and mucous membranes.

Acute and chronic health

hazards

May cause sensitisation by skin contact. The product contains small quantities of isocyanate. May cause respiratory allergy. May cause respiratory system irritation. May cause respiratory system irritation. Frequent inhalation of vapours may cause

respiratory allergy.

Route of entry Inhalation Skin and/or eye contact

Medical symptoms Irritation of eyes and mucous membranes. Coughing, chest tightness, feeling of

chest pressure.

Medical considerations Chronic respiratory and obstructive airway diseases.

## 2,2'DIMORPHOLINYLDIETHYL ETHER

Acute toxicity - oral

Acute toxicity oral (LD₅o

mg/kg)

2,025.0

**Species** Rat

Notes (oral LD₅₀) No information available.

Acute toxicity - dermal

Acute toxicity dermal (LD<sub>50</sub> 3,038.0

mg/kg)

**Species** Rabbit

Notes (dermal LD₅₀) No information available.

Acute toxicity - inhalation

No information available. Notes (inhalation LC₅₀)

Skin corrosion/irritation

Skin corrosion/irritation No information available.

Serious eye damage/irritation

Serious eye damage/irritation No information available.

Respiratory sensitisation

Respiratory sensitisation No information available.

Skin sensitisation

Skin sensitisation No information available.

Carcinogenicity



IARC carcinogenicity

No component of this product present at levels greater than or equal to 0.1% is

identified as probable, possible or confirmed human carcinogen by IARC.

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**Inhalation** May be harmful if inhaled. Spray/mists may cause respiratory tract irritation.

**Ingestion** May be harmful if swallowed.

Skin contact May be absorbed through the skin. May be harmful in contact with skin. May cause

skin irritation.

**Eye contact** May cause eye irritation.

## SECTION 12: Ecological Information

## Ecological information on ingredients.

## DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

**Ecotoxicity** The product is not expected to be hazardous to the environment.

12.1. Toxicity

**Toxicity** Not regarded as dangerous for the environment. However, large or frequent spills may have

hazardous effects on the environment.

## Ecological information on ingredients.

## <u>DIPHENYLMETHANEDIIS</u>OCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

Acute toxicity - fish LC50, 96 hours: > 1000 mg/l, Freshwater fish

Acute toxicity - aquatic

invertebrates

EC<sub>50</sub>, 48 hours: >500 mg/l, Daphnia magna

Acute toxicity - aquatic

plants

EC<sub>50</sub>, 72 hours: ~ 1640 mg/l, Scenedesmus subspicatus

Acute toxicity -

microorganisms

EC<sub>50</sub>, 3 hours: 100 mg/l, Activated sludge

Chronic toxicity - aquatic

invertebrates

NOEC, 21 days: 10 mg/l, Daphnia magna

## 2,2'DIMORPHOLINYLDIETHYL ETHER

Acute toxicity - fish LC<sub>50</sub>, 96 hours: 2150 mg/l,

Acute toxicity - aquatic

invertebrates

EC<sub>50</sub>, 48 hours: >100 mg/l, Daphnia magna

Acute toxicity -

microorganisms

EC<sub>50</sub>, 3 hours: >1000 mg/l, Bacteria

## 12.2. Persistence and degradability

Persistence and degradability There are no data on the degradability of this product.

#### Ecological information on ingredients.

## DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)



Persistence and

The product is not readily biodegradable.

degradability

Stability (hydrolysis) Reacts with water.

Biological oxygen demand < 10 g O<sub>2</sub>/g substance

12.3. Bioaccumulative potential

Bioaccumulative potential No data available on bioaccumulation.

Partition coefficient Not available.

Ecological information on ingredients.

DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

Bioaccumulative potential The product does not contain any substances expected to be bioaccumulating.

Partition coefficient Not available.

12.4. Mobility in soil

Mobility The product is insoluble in water. The product contains volatile substances which may spread

in the atmosphere.

Ecological information on ingredients.

DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

**Mobility** The product is non-volatile.

12.5. Results of PBT and vPvB assessment

Results of PBT and vPvB

This product does not contain any substances classified as PBT or vPvB.

assessment

Ecological information on ingredients.

DIPHENYLMETHANEDIISOCYANATE (MIXTURE OF ISOMERS AND HOMOLOGUES)

**Results of PBT and vPvB** This product does not contain any substances classified as PBT or vPvB. assessment

12.6. Other adverse effects

**SECTION 13: Disposal considerations** 

13.1. Waste treatment methods

General information The generation of waste should be minimised or avoided wherever possible. Waste packaging

should be collected for reuse or recycling. This material and its container must be disposed of in a safe way. Waste is classified as hazardous waste. Disposal to licensed waste disposal

site in accordance with the local Waste Disposal Authority.

Disposal methods Do not empty into drains. Dispose of waste to licensed waste disposal site in accordance with

the requirements of the local Waste Disposal Authority.

SECTION 14: Transport information

14.1. UN number

UN No. (ADR/RID) 3501

**UN No. (IMDG)** 3501



**UN No. (ICAO)** 3501 **UN No. (ADN)** 3501

## 14.2. UN proper shipping name

Proper shipping name

CHEMICAL UNDER PRESSURE, FLAMMABLE, N.O.S. (CONTAINS 1,1-Difluoroethane)

(ADR/RID)

Proper shipping name (IMDG) CHEMICAL UNDER PRESSURE, FLAMMABLE, N.O.S. (CONTAINS 1,1-Difluoroethane)

Proper shipping name (ICAO) CHEMICAL UNDER PRESSURE, FLAMMABLE, N.O.S. (CONTAINS 1,1-Difluoroethane)

Proper shipping name (ADN) CHEMICAL UNDER PRESSURE, FLAMMABLE, N.O.S. (CONTAINS 1,1-Difluoroethane)

## 14.3. Transport hazard class(es)

ADR/RID class 2.1

ADR/RID classification code 8F

ADR/RID label 2.1

IMDG class 2.1

ICAO class/division 2.1

ADN class 2.1

#### Transport labels



## 14.4. Packing group

## 14.5. Environmental hazards

## Environmentally hazardous substance/marine pollutant

No.

## 14.6. Special precautions for user

**EmS** F-D, S-U

ADR transport category 2

Emergency Action Code 2YE

Hazard Identification Number

(ADR/RID)

Tunnel restriction code (B/D)

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

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## SECTION 15: Regulatory information

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

National regulations EH40/2005 Workplace exposure limits.

The Aerosol Dispensers Regulations 2009 (SI 2009 No. 2824).





**EU legislation** Regulation (EC) No 1272/2008 of the European Parliament and of the Council of 16

December 2008 on classification, labelling and packaging of substances and mixtures (as

amended).

Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of

Chemicals (REACH) (as amended).

Council Directive of 20 May 1975 on the approximation of the laws of the Member States

relating to aerosol dispensers (75/324/EEC) (as amended).

## 15.2. Chemical safety assessment

No chemical safety assessment has been carried out.

### SECTION 16: Other information

Issued by Compliance

Revision date 03/07/2017

Revision 20

SDS number 21021

Hazard statements in full H220 Extremely flammable gas.

H222 Extremely flammable aerosol.

H229 Pressurised container: may burst if heated

H280 Contains gas under pressure; may explode if heated.

H315 Causes skin irritation.

H317 May cause an allergic skin reaction.

H319 Causes serious eye irritation.

H332 Harmful if inhaled.

H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled.

H335 May cause respiratory irritation. H351 Suspected of causing cancer.

H373 May cause damage to organs through prolonged or repeated exposure.

Store Between 5'c - 25'c

**Version History** V1 – June 215 - New Realease in line with CLP Regulations

V2 - September 2017 - Changes to propellent