

## SAFETY DATA SHEET

### SECTION 1: IDENTIFICATION OF THE MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1. **Product identifier:**  
**PROTECT FAMILY mosquito ant tick repellent aerosol**

1.2. **Relevant identified uses of the mixture and uses advised against:**  
Free trade product, mosquito and tick repellent for consumer use.  
AE - Aerosol dispenser

Application: The product is sprayed on the uncovered skin evenly in a thin layer.

Biocide product type: PT19

1.3. **Details of the supplier of the safety data sheet:**

Information about the distributor:

**Bábolna Bio PLC**

H-1107 Budapest, Szállás u. 6.

Tel.: (36-1) 432-0400

1.3.1. Responsible person: -  
E-mail: [info@babolna-bio.com](mailto:info@babolna-bio.com)

1.4. **Emergency telephone number:** **Health Toxicological Information Service**  
(Egészségügyi Toxikológiai Tájékoztató Szolgálat / ETTSZ)  
1097 Budapest, Albert Flórián út 2-6.  
Tel.: +36 80 201 199 (0-24 hours, free of charge – only from Hungary)  
Tel.: +36 1 476 6464 (0-24 hours, for normal fee – from abroad)

**Emergency telephone number: 112**

### SECTION 2: HAZARDS IDENTIFICATION

2.1. **Classification of the mixture:**

Classification according to Regulation (EC) No 1272/2008 (CLP):

Aerosols, Hazard Category 1 – H222; H229

Serious eye damage/eye irritation, Hazard Category 2 – H319

**Hazard statements:**

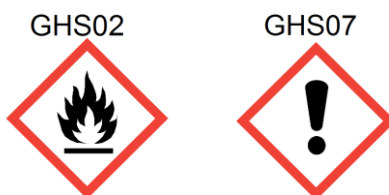
**H222** – Extremely flammable aerosol.

**H229** – Pressurised container: May burst if heated.

**H319** – Causes serious eye irritation.

2.2. **Label elements:**

Active substance content: **N,N-diethyl-m-metatoluamide (CAS: 134-62-3) 19.5 %**



**DANGER**

**Hazard statements:**

**H222** – Extremely flammable aerosol.

**H229** – Pressurised container: May burst if heated.

**H319** – Causes serious eye irritation.

**EUH 208** – Contains Orange terpenes. May produce an allergic reaction.

**Precautionary statements:**

**P102** – Keep out of reach of children.

**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.

**P305 + P351 + P338** – IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

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

**P411** – Store at temperatures not exceeding 45 °C/113 °F.

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

**P235** – Keep cool.

**Note:**

Biocide product, it should be packed/labelled according to Regulation (EU) No. 528/2012 of 22 May 2012 concerning the making available on the market and use of biocidal products.

**2.3. Other hazards:**

The product has no other known specific hazards for human or environment.

According to Annex XIII the ingredients of the mixture do not match the criteria of persistent/bioaccumulative/toxic (PBT) nor the criteria of very persistent/very bioaccumulative (vPvB).

Endocrine disrupting property: Based on available data, does not contain endocrine disruptors.

**SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS**
**3.1. Substances:**

Not applicable.

**3.2. Mixtures:**

Description	CAS number	EC number / ECHA list number	REACH registration number	Conc. (%)	Classification according to Regulation (EC) No 1272/2008 (CLP)		
					Pictogram, signal word code(s)	Hazard class and category code(s)	Hazard statement code(s)
<b>Ethanol</b> Index number: 603-002-00-5	64-17-5	200-578-6	01-2119457610-43	30 – 50	GHS02 Danger	Flam. Liq. 2	H225
<b>Propene</b> Index number: 601-003-00-5	74-98-6	200-827-9	01-2119486944-21	35 – 45	GHS02 GHS04 Danger	Flam. Gas 1 Press. Gas	H220 H280
<b>Butane</b> Index number: 601-004-00-0	106-97-8	203-448-7	01-2119474691-32		GHS02 GHS04 Danger	Flam. Gas 1 Press. Gas	H220 H280
<b>N,N-diethyl-m-metatoluamide</b> Index number: 616-018-00-2	134-62-3	205-149-7	-	19.5	GHS07 Warning	Acute Tox. 4 Eye Irrit. 2 Skin Irrit. 2 Aquatic Chronic 3	H302 H319 H315 H412
<b>Orange terpenes*</b>	8028-48-6	232-433-8	01-2119493353-35	0.15 – < 0.3	GHS02 GHS07 GHS08 GHS09 Danger	Asp. Tox. 1 Flam. Liq. 3 Skin Irrit. 2 Skin Sens. 1 Aquatic Chronic 2	H226 H304 H315 H317 H411

\*: Classification specified by the manufacturer; the substance is not listed in Annex VI of the Regulation (EC) No 1272/2008.

The insect repellent contains a bitter flavour that prevents accidental human consumption.

For the full text of hazard statements, see Section 16.

## SECTION 4: FIRST AID MEASURES

### 4.1. Description of first aid measures:

**General information:** Personal protective clothes are not required during first aid measures.

#### INGESTION:

Measures:

- Immediately call a physician and show the label.
- Do not induce vomiting.

#### INHALATION:

Measures:

- Take the victim into fresh air.
- In case of complaints, obtain medical help.

#### SKIN CONTACT:

Measures:

- The product may cause irritation.
- In case of allergic symptoms wash affected area with plenty of water.
- Seek medical attention if necessary.
- The contaminated clothes can be washed out with a normal washing program.

#### EYE CONTACT:

Measures:

- In case of contact with eyes immediately flush with plenty of water holding eyelids apart (for at least 15 minutes).
- Remove contact lenses if possible. Continue rinsing.
- In case of complaints, obtain medical help.

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

If the repellent effect is no longer needed or if there is a complaint (e.g. allergic symptoms, redness, etc.), wash the treated area with water.

Inhalation: Coughing, headache, drowsiness.

Eye: Redness, pain, stinging feeling.

Ingestion: Stinging feeling, dizziness, headache, disorientation.

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

No special treatment needed; treat symptomatically.

## SECTION 5: FIREFIGHTING MEASURES

### 5.1. Extinguishing media:

#### 5.1.1. Suitable extinguishing media:

Dry chemical powder, carbon dioxide, alcohol resistant foam, water spray.

#### 5.1.2. Unsuitable extinguishing media:

No data available.

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

Extremely flammable aerosol. Pressurised container: May burst if heated.

In case of fire, smoke and other combustion products (CO, NO) may be formed; the inhalation of such combustion products can have serious adverse effects on health.

### 5.3. Advice for firefighters:

Wear protective clothing and self-contained breathing apparatus.

Cool the fire affected containers with water spray.

## SECTION 6: ACCIDENTAL RELEASE MEASURES

- 6.1. Personal precautions, protective equipment and emergency procedures:**
- 6.1.1. For non-emergency personnel:**  
Allow only well-trained experts wearing suitable protective clothing to abide in the field of accident.
- 6.1.2. For emergency responders:**  
Extinguish naked flame, avoid sparks.  
Ensure adequate ventilation.  
Personal precautions: Mask with filter (A-type) or a self-contained breathing apparatus, protective clothes, gloves, boots.  
High concentration of the propellant in the air may cause oxygen deficiency therefore use self-contained breathing apparatus.
- 6.2. Environmental precautions:**  
Dispose of the spillage and the resulting waste according to the applicable environmental regulations. Do not allow the product and the resulting waste to enter sewers/soil/surface or ground water. Notify the respective authorities in accordance with local law in the case of environmental pollution immediately.
- 6.3. Methods and material for containment and cleaning up:**  
Ventilate the area thoroughly. Keep out the sources of ignition, avoid formation of sparks.  
Small spillage: Ventilate the area thoroughly, adsorb on, wash up with water and detergent.  
Big spillage:  
Collect the spilled product with non-combustible absorbent (sand, dry earth), then place into a suitable, closed, properly labelled, chemical waste container for removal/disposal.  
Do not use electric equipment (to avoid formation of sparks).  
Wash up with water and detergent.
- 6.4. Reference to other sections:**  
For further and detailed information see Section 7, 8 and 13.

## SECTION 7: HANDLING AND STORAGE

- 7.1. Precautions for safe handling:**  
Observe conventional hygiene precautions.  
The repellent should not be used by pregnant or breast-feeding women.  
Do not apply the product on sensitive area of the body, such as on the skin of the armpit and knee.  
Do not apply to injured or irritated skin. Avoid contact with eyes, mucous membranes, nose, lips and damaged skin.  
Wash hands thoroughly with soap and water after using the product and before eating.  
Keep out of the reach and sight of children.  
Keep away from food, drink and animal feed.  
Do not inhale the spray.  
Do not eat, drink, or smoke when using this product.  
**Technical measures:**  
Use only outdoor or well-ventilated place.  
Avoid contact with plastic material (e.g. glasses, watch-glass, synthetic fabric, leather imitation etc.), textile, paint and lacquer.  
**Precautions against fire and explosion:**  
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.
- 7.2. Conditions for safe storage, including any incompatibilities:**  
**Technical measures and storage condition:**  
Store the product in the original container in a cool, dry, well-ventilated place away from heat and sunlight.  
Shelf life: 3 years.  
Keep away from food, drink and animal feed.  
Keep away from heat, flames, other sources of ignition and strong oxidising agents (e.g. peroxides).  
In case of bigger quantity, safe electrical equipment (against explosion) and lights are necessary.  
**Incompatible materials:** See Section 10.5.  
**Packaging material:** Plastic (PE / PP / HDPE) bottle with pump dispenser 75 ml (51 g), 100 ml (68 g), 150 ml (102 g), 200 ml (136 g).
- 7.3. Specific end use(s):**  
According to label. See Section 1.2.

## SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

### 8.1. Control parameters:

**Occupational exposure limit values** (Commission Directive (EC) No 2000/39 of 8 June 2000):

The components of the mixture are not regulated with exposure limit value.

DNEL values		Oral exposure		Dermal exposure		Inhalative exposure	
		Short term (acute)	Long term (chronic)	Short term (acute)	Long term (chronic)	Short term (acute)	Long term (chronic)
Consumer	Local	no data	no data	no data	no data	no data	no data
	Systemic	no data	no data	no data	no data	no data	no data
Worker	Local	no data	no data	no data	no data	no data	no data
	Systemic	no data	no data	no data	no data	no data	no data

PNEC values		
Compartment	Value	Note(s)
Freshwater	no data	no note(s)
Seawater	no data	no note(s)
Freshwater sediment	no data	no note(s)
Seawater sediment	no data	no note(s)
Wastewater Treatment Plant (STP)	no data	no note(s)
Intermittent release	no data	no note(s)
Secondary poisoning	no data	no note(s)
Soil	no data	no note(s)

### 8.2. Exposure controls:

In case of a hazardous material with no controlled concentration limit it is the employer's duty to keep concentration levels down to a minimum achievable by existing scientific and technological means, where the hazardous substance poses no harm to workers.

#### 8.2.1. Appropriate engineering controls:

In pursuance of work is proper foresight needed to avoid leaking onto clothes and floors and to avoid contact with eyes and skin. Ensure adequate ventilation.

Do not use naked flames, sources of ignition.

#### 8.2.2. Individual protection measures, such as personal protective equipment:

- Eye/face protection:** Not necessary for occasional use. For professionals it is recommended to use appropriate protective glasses (EN 166).
- Skin protection:**
  - Hand protection:** Not necessary for occasional use. For professionals it is recommended to use appropriate protective gloves (EN 374).
  - Other:** Not necessary for occasional use. For professionals it is recommended to use appropriate protective clothing.
- Respiratory protection:** Do not inhale spray. Not necessary for occasional use. For professionals it is recommended to use appropriate mask with filter.
- Thermal hazards:** No thermal hazards known.

#### 8.2.3. Environmental exposure controls:

No specific prescription.

The requirements detailed in section 8 assume skilled work under normal conditions and usage of the product for appropriate aims. If conditions differ from normal or work is carried out under extreme conditions, an expert's advice is necessary before deciding upon further protective measures.

## SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

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

Parameter	Value / Test method / Remarks
1. Physical state	content: liquid
2. Colour	content: yellow propellant: colourless
3. Odour, odour threshold	lemon like
4. Melting point/freezing point	no data*
5. Boiling point or initial boiling point and boiling range	not applicable
6. Flammability	not applicable (aerosol)
7. Lower and upper explosion limit	propellant: 2-10 v/v% ethanol: 3.3-19 v/v%
8. Flash point	propellant: -60 °C
9. Auto-ignition temperature	no data*
10. Decomposition temperature	no data*
11. pH	ca. 7
12. Kinematic viscosity	not applicable
13. Solubility in water in other solvents	well-soluble no data*
14. Partition coefficient n-octanol/water (log value)	no data*
15. Vapour pressure	no data*
16. Density and/or relative density	0.8 (25 °C)
17. Relative vapour density	no data*
18. Particle characteristics	no data*

### 9.2. Other information:

#### 9.2.1. Information with regard to physical hazard classes:

Explosive properties: The liquid is explosive; the vapours form an explosive mixture with air.

Ignition temperature: 360 °C (content).

#### 9.2.2. Other safety characteristics:

No other characteristics available.

\*: The manufacturer did not carry out any tests on this parameter for the product or the results of the tests are not available at the time of publication of the data sheet, or the property is not applicable for the product.

## SECTION 10: STABILITY AND REACTIVITY

### 10.1. Reactivity:

Damages some plastic material. Avoid contact with plastic material (e.g. glasses, watch-glass, synthetic fabric, leather imitation etc.), paint and lacquer.

### 10.2. Chemical stability:

Stable at normal usage (room temperature, pressure) and storage.

### 10.3. Possibility of hazardous reactions:

Stable at normal usage.

### 10.4. Conditions to avoid:

Temperature above 50 °C, open flames, sources of ignitions.

### 10.5. Incompatible materials:

Some plastic materials, paint, lacquer.

### 10.6. Hazardous decomposition products:

No hazardous decomposition products known.

## SECTION 11: TOXICOLOGICAL INFORMATION

### 11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008:

**Acute toxicity:** Based on available data, the classification criteria are not met.

**Skin corrosion/irritation:** Based on available data, the classification criteria are not met.

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

**Respiratory or skin sensitisation:** Based on available data, the classification criteria are not met.

**Germ cell mutagenicity:** Based on available data, the classification criteria are not met.

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

**Reproductive toxicity:** 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.

**Aspiration hazard:** Based on available data, the classification criteria are not met.

### 11.1.1. Summaries of the information derived from the test conducted:

No data available.

### 11.1.2. Relevant toxicological properties:

No data available about the product.

Information about the components:

**Ethanol** (CAS: 64-17-5):

LD<sub>50</sub> (oral, rat): >6200 mg/kg bw

LD<sub>50</sub> (dermal, rat): >22 000 mg/kg bw

LC<sub>50</sub> (inhalation, rat): >8000 mg/l/4h

**N,N-diethyl-m-metatoluamide** (CAS: 134-62-3):

Acute toxicity:

LD<sub>50</sub> (oral, rat, male/female): 1892 mg/kg bw

LD<sub>50</sub> (dermal, rat, male/female): >5000 mg/kg bw

LC<sub>50</sub> (inhalation, rat, male/female): >2.02 mg/l (highest dose tested)

Skin corrosion/irritation: Slightly irritating to skin.

Serious eye damage/irritation: Irritating to eyes.

Respiratory or skin sensitisation: Not a sensitizer (Buehler Method; U.S. EPA OPPTS Guideline 870.2600)

### 11.1.3. Information on likely routes of exposure:

Ingestion, inhalation, skin contact, eye contact.

### 11.1.4. Symptoms related to the physical, chemical and toxicological characteristics:

No data available.

### 11.1.5. Delayed and immediate effects as well as chronic effects from short and long-term exposure:

Causes serious eye irritation.

Contains Orange terpenes. May produce an allergic reaction.

### 11.1.6. Interactive effects:

No data available.

### 11.1.7. Absence of specific data:

No information.

### 11.2. Information on other hazards:

**Endocrine disrupting properties:**

Endocrine disrupting property: Based on available data, does not contain endocrine disruptors.

**Other information:**

No data available.

## SECTION 12: ECOLOGICAL INFORMATION

### 12.1. Toxicity:

The mixture is not classified as hazardous for the environment.

Information about the components:

**N,N-diethyl-m-metatoluamide** (CAS: 134-62-3):

LC<sub>50</sub> (Brachydanio rerio): 97 mg/l/96h

LC<sub>50</sub> (Daphnia magna): 75 mg/l/48h

ErC<sub>50</sub> (Selenastrum capricornutum): 43 mg/l/96h

ErC<sub>50</sub> (Selenastrum capricornutum): 41 mg/l/72h

EC<sub>50</sub> (microorganisms): >1000 mg/l/3h

### 12.2. Persistence and degradability:

No data available.

- 12.3. **Bioaccumulative potential:**  
No data available.
- 12.4. **Mobility in soil:**  
Not applicable during normal usage.
- 12.5. **Results of PBT and vPvB assessment:**  
According to Annex XIII the ingredients of the mixture do not match the criteria of persistent/bioaccumulative/ toxic (PBT) nor the criteria of very persistent / very bioaccumulative (vPvB).
- 12.6. **Endocrine disrupting properties:**  
Endocrine disrupting property: Based on available data, does not contain endocrine disruptors.
- 12.7. **Other adverse effects:**  
Do not flush into surface water or sanitary sewer system.

## SECTION 13: DISPOSAL CONSIDERATIONS

- 13.1. **Waste treatment methods:**  
Disposal according to the local regulations.
- 13.1.1. **Information regarding the disposal of the product:**  
Dispose of in accordance with applicable regulations.  
Do not re-use the product packaging for any purpose.  
Unused product and packaging in small quantities may be thrown into the household waste. In large quantity dispose of as hazardous waste.  
Recommended method: incineration.  
**List of Waste Code:**  
No waste disposal key according to the List of Waste Code (LoW code) can be determined for this product, as only the purpose of application defined by the user enables an allocation. The LoW code number has to be determined after a discussion with a waste disposal specialist.
- 13.1.2. **Information regarding the disposal of the packaging:**  
Dispose of in accordance with applicable regulations.  
Do not contaminate ponds, waterways or ditches with the product or used container.  
Avoid or minimize waste generation wherever possible.
- 13.1.3. **Physical/chemical properties that may affect waste treatment options shall be specified:**  
No data available.
- 13.1.4. **Sewage disposal:**  
No data available.
- 13.1.5. **Special precautions for any recommended waste treatment:**  
No data available.

## SECTION 14: TRANSPORT INFORMATION

- 14.1. **UN number or ID number:**  
UN 1950
- 14.2. **UN proper shipping name:**  
AEROSOLS, flammable
- 14.3. **Transport hazard class(es):**  
2
- 14.4. **Packing group:**  
No packaging group.
- 14.5. **Environmental hazards:**  
No relevant information available.
- 14.6. **Special precautions for user:**  
No relevant information available.
- 14.7. **Maritime transport in bulk according to IMO instruments:**  
Not applicable.



**SECTION 15: REGULATORY INFORMATION****15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture:**

**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), establishing a European Chemicals Agency, amending Directive (EC) No 1999/45 and repealing Council Regulation (EEC) No 793/93 and Commission Regulation (EC) No 1488/94 as well as Council Directive (EEC) No 76/769 and Commission Directives (EEC) No 91/155, (EEC) No 93/67, (EC) No 93/105 and (EC) No 2000/21

**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, amending and repealing Directives (EEC) No 67/548 and (EC) No 1999/45, and amending Regulation (EC) No 1907/2006

**COMMISSION REGULATION (EU) 2020/878** of 18 June 2020 amending Annex II to Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH)

**REGULATION (EU) No 528/2012** OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 22 May 2012 concerning the making available on the market and use of biocidal products

**COMMISSION DIRECTIVE (EU) No 2013/10** of 19 March 2013 amending Council Directive (EEC) No 75/324 on the approximation of the laws of the Member States relating to aerosol dispensers

**15.2. Chemical safety assessment:** No information.**SECTION 16: OTHER INFORMATION**

**Information regarding the revision of the safety data sheet:** No information.

**Literature references / data sources:**

Information provided by the distributor (safety data sheet of a similar product).

**Methods used for the classification according to Regulation (EC) No 1272/2008:**

Classification	Method
Aerosols, Hazard Category 1 – H222; H229	Based on test methods (test data)
Serious eye damage/eye irritation, Hazard Category 2 – H319	Based on calculation method

**Relevant hazard statements (code and full text) of Sections 2 and 3:**

**H220** – Extremely flammable gas.

**H222** – Extremely flammable aerosol.

**H225** – Highly flammable liquid and vapour.

**H226** – Flammable liquid and vapour.

**H229** – Pressurised container: May burst if heated.

**H280** – Contains gas under pressure; may explode if heated.

**H302** – Harmful if swallowed.

**H304** – May be fatal if swallowed and enters airways.

**H315** – Causes skin irritation.

**H317** – May cause an allergic skin reaction.

**H319** – Causes serious eye irritation.

**H411** – Toxic to aquatic life with long lasting effects.

**H412** – Harmful to aquatic life with long lasting effects.

**EUH 208** – Contains Orange terpenes. May produce an allergic reaction.

**Training advice:** No data available.

**Full text of the abbreviations in the safety data sheet:**

ADN: European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways.

ADR: Agreement concerning the International Carriage of Dangerous Goods by Road.

ATE: Acute Toxicity Estimate.

AOX: Adsorbable organic halides.

BCF: Bioconcentration factor.

BOD: Biological Oxygen Demand.

CAS number: Chemical Abstract Service number.

CLP: Regulation (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures.

CMR effects: Carcinogenic, mutagenic, reprotoxic effects.

COD: Chemical Oxygen Demand.

CSA: Chemical Safety Assessment.

CSR: Chemical Safety Report.

DNEL: Derived-No-Effect-Level.

ECHA: European Chemical Agency.

EC: European Community.

EC number: EINECS and ELINCS numbers (see also EINECS and ELINCS).

EEC: European Economic Community.

EEA: European Economic Area (EU + Iceland, Liechtenstein and Norway).

EINECS: European Inventory of Existing Commercial Chemical Substances.

ELINCS: European List of Notified Chemical Substances.

EN: European Norm.

EU: European Union.

EWC: European Waste Catalogue (replaced by LoW – see below).

GHS: Globally Harmonized System of Classification and Labelling of Chemicals.

IATA: International Air Transport Association.

ICAO-TI: Technical Instructions for the Safe Transport of Dangerous Goods by Air.

IMDG: International Maritime Dangerous Goods.

IMO: International Maritime Organization.

IMSBC: International Maritime Solid Bulk Cargoes.

IUCLID: International Uniform Chemical Information Database.

IUPAC: International Union of Pure and Applied Chemistry.

Kow: n-Octanol - Water Partition Coefficient.

LC<sub>50</sub>: Lethal concentration resulting in 50 % mortality.

LD<sub>50</sub>: Lethal dose resulting in 50 % mortality (median lethal dose).

LoW: List of Waste.

LOEC: Lowest Observed Effect Concentration.

LOEL: Lowest Observed Effect Level.

NOEC: No Observed Effect Concentration.

NOEL: No Observed Effect Level.

NOAEC: No Observed Adverse Effect Concentration.

NOAEL: No Observed Adverse Effect Level.

OECD: Organization for Economic Cooperation and Development.

OSHA: Occupational Safety and Health Administration.

PBT: Persistent, Bioaccumulative and Toxic.

PNEC: Predicted No Effect Concentration.

QSAR: Quantitative Structure Activity Relationship.

REACH: Regulation 1907/2006/EC concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals.

RID: Regulations Concerning the International Transport of Dangerous Goods by Rail.

SCBA: Self Contained Breathing Apparatus.

SDS: Safety Data Sheet.

STOT: Specific Target Organ Toxicity.

SVHC: Substances of Very High Concern.

UN: United Nations.

UVCB: Chemical Substances of Unknown or Variable Composition, Complex Reaction Products and Biological Materials.

VOC: Volatile Organic Compound.

vPvB: very Persistent and very Bioaccumulative.

This safety data sheet had been prepared on the basis of information provided by the manufacturer/supplier and conform to the relevant regulations.

The information, data and recommendations contained herein are provided in good faith, obtained from reliable sources and believed to be true and accurate as of the date issued; however, no representation is made as to the comprehensiveness of the information.

The SDS shall be used only as a guide for handling the product; in the course of handling and using the product other considerations may arise or be required.

Users are cautioned to determine the appropriateness and applicability of the above information to their circumstances and purposes and assume all risk associated with the use of this product.

It is the responsibility of the user to fully comply with local, national and international regulations concerning the use of this product.

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Safety data sheet was prepared by:

**MSDS-Europe**

**International branch of ToxInfo Kft.**

Professional help regarding the explanation of  
the safety data sheet:

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