SAFETY DATA SHEET according to Regulation 1907/2006

Product name: MOLD RELEASE AGENT SPRAY

Creation date: **28.12.2017** \cdot Revision: **29.9.2020** \cdot Version: **1**



SECTION 1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1. Product identifier

Product name

Formen Trennspray

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

Relevant identified uses

Release agent.

Uses advised against

No information.

1.3. Details of the supplier of the safety data sheet

Manufacturer

WINKEL GmbH Lisztstraße 1 53881 Euskirchen - Germany Tel.: +49 2251 77 69 400-401 Fax: +49 2251 77 69 402 E-Mail: info@winkelgroup.de Internet: www.winkelgroup.de

1.4. Emergency telephone number

Emergency

BfR Bundesinstitut für Risikobewertung: +49-30-18412-0 Ontario Poison Centre: +1 (800)-268-9017 Alberta Poison & Drug Information Service: +1 (800) 332-1414 American Association of Poison Control Centers: +1 (800) 222-1222 The Centre antipoison du Québec: +1 (800) 463-5060

SECTION 2. HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

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

Aerosol 1; H222 Extremely flammable aerosol. Aerosol 1; H229 Pressurised container: May burst if heated.

2.2 Label elements

2.2.1. Labelling according to Regulation (EC) No 1272/2008 [CLP]



Signal word: Danger

H222 Extremely flammable aerosol.

- H229 Pressurised container: May burst if heated.
- 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.

P410 + P412 Protect from sunlight. Do no expose to temperatures exceeding 50 °C/122°F.

Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1



2.2.2. Contains:

- -
- 2.2.3. Special provisions

Special hazards are not known or expected.

2.3. Other hazards

No information.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

3.1. Substances

For mixtures see 3.2.

3.2. Mixtures

Name	CAS EC Index	%	Classification according to Regulation (EC) No 1272/2008 (CLP)	Specific Conc. Limits	REACH Registration No.
butane ^[C]	106-97-8 203-448-7 601-004-00-0	25-50	Flam. Gas 1; H220 Press. Gas; H280		01-2119474691-32
isobutane [C, S]	75-28-5 200-857-2 601-004-00-0	25-50	Flam. Gas 1; H220 Press. Gas; H280		01-2119485395-27
propane ^[U]	74-98-6 200-827-9 601-003-00-5	10-25	Flam. Gas 1; H220 Press. Gas; H280		01-2119486944-21

Notes for substances:

С	Some organic substances may be marketed either in a specific isomeric form or as a mixture of several isomers.
	In this case the supplier must state on the label whether the substance is a specific isomer or a mixture of isomers.
S	This substance may not require a label according to Article 17 (see Section 1.3 of Annex I) (Table 3).
U	 When put on the market gases have to be classified as 'Gases under pressure', in one of the groups compressed gas, liquefied gas, refrigerated liquefied gas or dissolved gas. The group depends on the physical state in which the gas is packaged and therefore has to be assigned case by case. The following codes are assigned: Press. Gas (Comp.) Press. Gas (Liq.) Press. Gas (Ref. Liq.) Press. Gas (Diss.) Aerosols shall not be classified as gases under pressure (See Annex I, Part 2, Section 2.3.2.1, Note 2).

SECTION 4. FIRST AID MEASURES

4.1. Description of first aid measures

General notes

When in doubt or if feeling unwell seek medical assistance. Show the safety data sheet and label to the physician. No action shall be taken involving any personal risk or without suitable training.

Following inhalation

Leave contaminated area - breathe fresh air. If symptoms develop and persist, seek medical attention.

Following skin contact

Take off all contaminated clothing. Areas of the body that have come into contact with the product must be rinsed with water and soap. If symptoms develop and persist, seek medical attention. Wash contaminated clothes and shoes before reuse.

Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1

Following eye contact

Immediately flush eyes with running water, keeping eyelids apart. If irritation persists, seek professional medical attention.

Following ingestion

Not likely. Accidental ingestion: Do not induce vomiting without prior consultation with a doctor. In case of doubt or if feeling unwell seek medical help. Show the physician the safety data sheet or label.

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

Inhalation

Excessive exposure to spray mist, fog, or vapours may cause respiratory irritation. Coughing, sneezing, nasal discharge, labored breathing.

Skin contact

Contact with skin may cause irritation (redness, itching).

Eye contact

Contact with eyes can cause irritation (redness, tearing, pain).

Ingestion

Ingestion is unlikely because it is an aerosol. Accidental ingestion: May cause irritation of the digestive tract. May cause nausea/vomiting and diarrhea.

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

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Unsuitable extinguishing media

Full water jet.

5.2. Special hazards arising from the substance or mixture

Hazardous combustion products

In case of a fire toxic gases can be generated; do not inhale gases/smoke. In the event of fire the following can be generated: carbon monoxide (CO), carbon dioxide (CO₂).

5.3. Advice for firefighters

Protective actions

In case of fire or heating do not breathe fumes/vapours. Cool containers at risk with water spray. If possible remove containers from endangered area. In case of fire aerosols can explode and be propelled to considerable distances in different directions.

Special protective equipment for firefighters

Firefighters should wear appropriate protective clothing for firefighters (including helmets, protective boots and gloves) (EN 469) and self-contained breathing apparatus (SCBA) with a full face-piece (EN 137).

SECTION 6. ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

Protective equipment

Use personal protective equipment (Section 8).



Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1



Emergency procedures

Ensure adequate ventilation. Keep away from sources of ignition and/or heat; No smoking! Prevent access to unauthorised personnel. Prevent access to unprotected personnel. Avoid contact with skin and eyes. Do not breathe vapour or mist. No action shall be taken involving any personal risk or without suitable training.

6.1.2. For emergency responders

During intervention, use personal protective equipment (Section 8).

6.2. Environmental precautions

Do not allow product to reach water/drains/sewage systems or permeable soil. If accidental large entry into water or ground occurs, inform responsible authorities.

6.3. Methods and material for containment and cleaning up

6.3.1. For containment

Stem the spill if this does not pose risks.

6.3.2. For cleaning up

Collect the spray cans and hand them over to an authorized waste disposal contractor. Release of liquid because of damaged aerosol can (release of large quantities): Absorb product (with inert material), collect it in special container and dispose it to a licensed hazardous-waste disposal contractor. Do not absorb spillage with sawdust or other combustible material. Dispose in accordance with applicable regulations (see Section 13). Clean residue from spill site.

6.3.3. Other information

See Section 7: safe handling.

6.4. Reference to other sections

See also Sections 8 and 13.

SECTION 7. HANDLING AND STORAGE

7.1. Precautions for safe handling

7.1.1. Protective measures

Measures to prevent fire

Ensure adequate ventilation. Take precautionary measures against static discharges. Keep away from sources of ignition - no smoking. Use spark-proof tools. Pressurized container; protect from sunlight and do not expose to tempratures exceeding 50°C. Do not pierce or burn, even after use. Do not spray on a naked flame or incandescent material.

Measures to prevent aerosol and dust generation

Ensure good ventilation and extraction.

Measures to protect the environment

7.1.2. Advice on general occupational hygiene

Refer to instructions on label and regulations for safety and health at work. Use good personal hygiene practices – wash hands at breaks and when done working with material. Do not eat, drink or smoke while working. Avoid contact with skin and eyes. Do not breathe vapours/mist. Consider measures required in Section 8 of this safety data sheet.

7.2. Conditions for safe storage, including any incompatibilities

7.2.1. Technical measures and storage conditions

Store in accordance with local regulations. Keep in well closed containers. Keep in cool and well ventilated area. Protect from open fire, heat and direct sunlight. Keep away from sources of ignition. Keep away from oxidising substances. Keep away from food, drink and animal feeding stuffs.

7.2.2. Packaging materials

The original container of producer.

7.2.3. Requirements for storage rooms and vessels

Do not store in unlabelled containers.

Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1



7.2.4. Storage class

7.2.5. Further information on storage conditions

7.3. Specific end use(s)

Recommendations

Industrial sector specific solutions

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1. Control parameters

8.1.1. Occupational exposure limit values

Name (CAS)	Limit values		Short-term exposure limit		Remarks	Biological Tolerance Values
	ml/m ³ (ppm)	mg/m ³	ml/m ³ (ppm)	mg/m ³		
Butane (106- 97-8)	600	1450	750	1810	Carc, (only applies if Butane contains more than 0.1% of buta-1,3-diene)	

8.1.2. Information on monitoring procedures

BS EN 14042:2003 Workplace atmospheres. Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents. BS EN 482:2012+A1:2015 Workplace exposure. General requirements for the performance of procedures for the measurement of chemical agents. BS EN 689:2018 Workplace exposure. Measurement of exposure by inhalation to chemical agents. Strategy for testing compliance with occupational exposure limit values.

8.1.3. DNEL/DMEL values

No information.

8.1.4. PNEC values

No information.

8.2. Exposure controls

8.2.1. Appropriate engineering control

Substance/mixture related measures to prevent exposure during identified uses

Handle in accordance with good industrial hygiene and safety practice. Use good personal hygiene practices – wash hands at breaks and when done working with material. Do not eat, drink or smoke while working. Avoid contact with skin, eyes and clothes. Do not breathe vapours/aerosols. Keep away from foodstuffs, beverages and feed. Personal protective equipment selections vary based on potential exposure conditions such as applications, handling practices, concentration and ventilation.

Organisational measures to prevent exposure

If this product contains ingredients with exposure limits, personal, workplace atmosphere monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protection.

Technical measures to prevent exposure

Provide good ventilation and local exhaust in areas with increased concentration.

8.2.2. Personal protective equipment

Eye and face protection

No requirements under normal use conditions. If there is risk of splashing into eyes, wear safety glasses with side shields (EN 166).

Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1

Hand protection

No requirements under normal use conditions. In case of prolonged exposure, wear protective gloves (EN 374).

Skin protection

No requirements under normal use conditions. With excessive exposure wear protective working clothing (overalls and boots). Cotton protective clothing and shoes that cover the entire foot (EN ISO 20345).

Respiratory protection

Not needed under normal use and adequate ventilation. In case of insufficient ventilation wear suitable respiratory protection. If the concentration limit values are exceeded, it is necessary to wear appropriate respiratory protection. Wear suitable protective breathing mask (EN 136) with filter A2-P2 (EN 14387).

Thermal hazards

8.2.3. Environmental exposure controls

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

9.1. Information on basic physical and chemical properties

-	Physical state:	liquid; aerosol
-	Colour:	colourless
-	Odour:	

Important health, safety and environmental information

-	рН	No information.
-	Melting point/freezing point	No information.
-	Initial boiling point/boiling range	No information.
•	Flash point	No information.
-	Evaporation rate	No information.
-	Flammability (solid, gas)	No information.
•	Explosion limits (vol%)	1,5 – 10,9 vol %
-	Vapour pressure	1200 hPa at 20 °C
-	Vapour density	No information.
-	Density	Density : ca. 0,913 g/cm ³ at 20 °C
-	Solubility	No information.
-	Partition coefficient	No information.
-	Auto-ignition temperature	No information.
-	Decomposition temperature	No information.
-	Viscosity	No information.
-	Explosive properties	No information.
-	Oxidising properties	No information.

9.2. Other information

Remarks:



SAFETY DATA SHEET according to Regulation 1907/2006

Product name: MOLD RELEASE AGENT SPRAY

Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1

SECTION 10. STABILITY AND REACTIVITY

10.1. Reactivity

Stable under recommended transport or storage conditions.

10.2. Chemical stability

Product is stable under normal conditions of use, recommended handling and storage conditions.

10.3. Possibility of hazardous reactions

The product is stable under recommended storage and handling conditions.

10.4. Conditions to avoid

Avoid all possible sources of ignition (spark or flame). Do not expose to heat and direct sunlight.

10.5. Incompatible materials

Oxidants.

10.6. Hazardous decomposition products

Under normal use conditions no hazardous decomposition products are expected. In case of fire/explosion vapours/gases that pose a health hazard are released.

SECTION 11. TOXICOLOGICAL INFORMATION

- 11.1. Information on toxicological effects
 - (a) Acute toxicity

No information.

(b) Skin corrosion/irritation

No information.

(c) Serious eye damage/irritation

No information.

(d) Respiratory or skin sensitisation

No information.

(e) (Germ cell) mutagenicity

No information.

(f) Carcinogenicity

No information.

(g) Reproductive toxicity

No information. Summary of evaluation of the CMR properties

No information.

(h) STOT-single exposure

No information.

(i) STOT-repeated exposure

No information.

(j) Aspiration hazard

No information.

Creation date: 28.12.2017 \cdot Revision: 29.9.2020 \cdot Version: 1



SECTION 12. ECOLOGICAL INFORMATION

12.1. Toxicity

12.1.1. Acute (short-term) toxicity

No information. 12.1.2. Chronic (long-term) toxicity

No information.

- 12.2. Persistence and degradability
 - 12.2.1. Abiotic degradation, physical- and photo-chemical elimination

No information.

12.2.2. Biodegradation

No information.

12.3. Bioaccumulative potential

12.3.1. Partition coefficient

No information.

12.3.2. Bioconcentration factor (BCF)

No information.

12.4. Mobility in soil

12.4.1. Known or predicted distribution to environmental compartments

No information.

12.4.2. Surface tension

No information.

12.4.3. Adsorption/Desorption

No information.

12.5. Results of PBT and vPvB assessment

No evaluation.

12.6. Other adverse effects

No information.

12.7. Additional information

For product

Do not allow to reach ground water, water courses or sewage system.

SECTION 13. DISPOSAL CONSIDERATIONS

13.1. Waste treatment methods

13.1.1. Product / Packaging disposal

Waste chemical

Avoid release to the environment. Dispose of in accordance with applicable waste disposal regulation. Disposal must be made according to official regulations: deliver it to authorised collector/remover/transformer of hazardous waste. Product and container must be disposed of safely.

Waste codes / waste designations according to LoW

16 05 04* - gases in pressure containers (including halons) containing dangerous substances

Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1

Packaging

Uncleaned containers should not be perforated, cut or welded. Pressurized container. Do not pierce or burn, even after use. Dispose of in accordance with applicable waste disposal regulation. Deliver completely emptied containers to approved waste disposal authorities.

Waste codes / waste designations according to LoW

15 01 11* - metallic packaging containing a dangerous solid porous matrix (for example asbestos), including empty pressure containers

- 13.1.2. Waste treatment-relevant information
- 13.1.3. Sewage disposal-relevant information
- 13.1.4. Other disposal recommendations

SECTION 14. TRANSPORT INFORMATION

14.1. UN number

UN 1950

- 14.2. UN proper shipping name AEROSOLS
- 14.3. Transport hazard class(es)

2

14.4. Packing group

Not applicable.

14.5. Environmental hazards

NO.

14.6. Special precautions for user

IATA:

PCA Excepted quantities: E0 PCA Limited quantities: Y203 PCA limited quantity max net quantity: 30kgG PCA packing instructions: 203 PCA max net quantity: 75kg CAO packing instructions: 203 CAO max net quantity: 150kg Special provisions: A145, A167, A802 ERG code: 10L

Limited quantities

1 L

Tunnel restriction code

(D)

IMDG EmS

F-D, S-U

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

Goods may not be carried in bulk in bulk containers, containers or vehicles.





Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1



SECTION 15. REGULATORY INFORMATION

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

- Regulation (EC) No 1907/2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH) (including last amendment Commission Regulation (EU) 2015/830)

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

15.1.1. Information according 2004/42/EC about limitation of emissions of volatile organic compounds (VOC-guideline)

Not applicable.

15.2. Chemical Safety Assessment

No Chemical Safety Assessment has been carried out for this substance/mixture by the supplier.

SECTION 16. OTHER INFORMATION

Indication of changes

Abbreviations and acronyms

ATE - Acute Toxicity Estimate ADR - European Agreement concerning the International Carriage of Dangerous Goods by Road ADN - European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways CEN - European Committee for Standardisation C&L - Classification and Labelling CLP - Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008 CAS# - Chemical Abstracts Service number CMR - Carcinogen, Mutagen, or Reproductive Toxicant CSA - Chemical Safety Assessment CSR - Chemical Safety Report DMEL - Derived Minimal Effect Level **DNEL - Derived No Effect Level** DPD - Dangerous Preparations Directive 1999/45/EC DSD - Dangerous Substances Directive 67/548/EEC DU - Downstream User EC - European Community ECHA - European Chemicals Agency EC-Number - EINECS and ELINCS Number (see also EINECS and ELINCS) EEA - European Economic Area (EU + Iceland, Liechtenstein and Norway) EEC - European Economic Community EINECS - European Inventory of Existing Commercial Substances ELINCS - European List of notified Chemical Substances EN - European Standard EQS - Environmental Quality Standard EU - European Union Euphrac - European Phrase Catalogue EWC - European Waste Catalogue (replaced by LoW - see below) GES - Generic Exposure Scenario GHS - Globally Harmonized System IATA - International Air Transport Association ICAO-TI - Technical Instructions for the Safe Transport of Dangerous Goods by Air IMDG - International Maritime Dangerous Goods IMSBC - International Maritime Solid Bulk Cargoes IT - Information Technology IUCLID - International Uniform Chemical Information Database IUPAC - International Union for Pure Applied Chemistry JRC - Joint Research Centre Kow - octanol-water partition coefficient

Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1



LC50 - Lethal Concentration to 50 % of a test population LD₅₀ - Lethal Dose to 50% of a test population (Median Lethal Dose) LE - Legal Entity LoW - List of Wastes (see http://ec.europa.eu/environment/waste/framework/list.htm) LR - Lead Registrant M/I - Manufacturer / Importer MS - Member States MSDS - Material Safety Data Sheet **OC** - Operational Conditions OECD - Organization for Economic Co-operation and Development **OEL - Occupational Exposure Limit** OJ - Official Journal **OR** - Only Representative OSHA - European Agency for Safety and Health at work PBT - Persistent, Bioaccumulative and Toxic substance PEC - Predicted Effect Concentration PNEC(s) - Predicted No Effect Concentration(s) PPE - Personal Protection Equipment (Q)SAR - Qualitative Structure Activity Relationship REACH - Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) No 1907/2006 RID - Regulations concerning the International Carriage of Dangerous Goods by Rail **RIP - REACH Implementation Project** RMM - Risk Management Measure SCBA - Self-Contained Breathing Apparatus SDS - Safety data sheet SIEF - Substance Information Exchange Forum SME - Small and Medium sized Enterprises STOT - Specific Target Organ Toxicity (STOT) RE - Repeated Exposure (STOT) SE - Single Exposure SVHC - Substances of Very High Concern **UN - United Nations** vPvB - Very Persistent and Very Bioaccumulative Key literature references and sources for data

.

List of relevant H phrases

H220 Extremely flammable gas.

H280 Contains gas under pressure; may explode if heated.

SAFETY DATA SHEET according to Regulation 1907/2006



WINKEL

Creation date: 28.12.2017 · Revision: 29.9.2020 · Version: 1

The information of this SDS is based on the present state of our knowledge and meets the requirements of EU and national laws. The user's working conditions however, are beyond our knowledge and control. The product is not to be used for purposes other than those specified under Section 1 without a written permission. It remains the responsibility of the user to ensure that the necessary steps are taken to meet the laws and regulations. Handling of the product may only be done by people above 18 years of age, who are satisfactorily informed of how to do the work, the hazardous properties and necessary safety precautions. The information given in this SDS is to describe the product only in terms of health and safety requirements and should not, therefore, be construed as guaranteeing specific properties.