

According to directive 1907/2006/EC, 2020/878
Version 1.2 Revision date: 04-11-2021
Trade name: G 8

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

1.1 Product identification:

Product name: G 8

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

Use of the substance or mixture: Primers, Performance 1-component coating
Recommended restrictions on use: For use by professionals only. Caution - Avoid exposure -
Consult special instructions before use.

1.3 Details of the supplier of the safety data sheet:

Responsible distributor : ASSYST bvba / A.S.O.W. bvba
Hellegatstraat 13a
2590 Berlaar
Belgium
Tel: +32 495 50 61 14 / +32 496 83 70 27
Website: www.assyst.org / www.artsuppliesonweb.com
Email: ao@assyst.org / vera.opsommer@assyst.org

1.4 Emergency phone number:

For Belgium:

Call the **Poison Control Center (070 245 245 - free)**, if not available: **02 264 96 30** (normal rate) or your doctor. In life-threatening situations, always call the European emergency number **112**.

NHS 24 Direct

For help from a GP, visit your GP surgery's website, use an online service to contact your GP, or call the surgery. **For urgent medical help**, use the NHS 111 online service, or **call 111** if you are unable to get help online. **For life-threatening emergencies, call 999** for an ambulance. There is more information about getting medical help on the NHS website.

SECTION 2: Hazard identification

2.1 Classification of the substance or mixture:

Classification according to directive (EC) No 1272/2008 and its amendments.

The product is classified according to current legislation.

Classification in accordance with Regulation (EC) No 1272/2008 as amended.

Health hazards

Flammable liquids, Category 3 H226: Flammable liquid and vapour.

Acute toxicity, Category 4 H332: Harmful by inhalation.

Skin corrosion/irritation, Category 2 H315: Causes skin irritation.

Eye irritation, Category 2 H319: Causes severe eye irritation.

Skin sensitisation, Category 1 H317: May cause an allergic skin reaction.

Specific target organ toxicity - single exposure, Category 3, Central nervous system H336: May cause drowsiness or dizziness.

Specific target organ toxicity - single exposure, Category 3, Respiratory system H335: May cause respiratory tract irritation.

Specific target organ toxicity - repeated exposure, Category 2 H373: May cause damage to organs through prolonged or repeated exposure.

Inhalation hazard, Category 1 H304: May be fatal if swallowed and enters airways.

(Chronic) Aquatic long-term hazard, Category 3 H412: Harmful to aquatic life with long lasting effects.

2.2 Labelling elements:

Labelling according to regulation (EC) No 1272/2008 [CLP/GHS]:



Hazard pictograms:

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Signal word Danger.

Hazardous ingredients to be declared on the label:

- Imidodicarbonediamide, N,N',2-tris(6-isocyanatohexyl)-, polymer containing 2-ethyl-2-(hydroxymethyl)-1,3-propanediol, 2,5-furandione, 1,6-hexanediol, 1,3-isobenzofurandione and 4,4'-(1-methylethylidene)bis[cyclohexanol].
- Reaction mixture of ethylbenzene and xylene
- Solvent naphtha (petroleum), light aromatic
- hexamethylene-1,6-diisocyanate

Hazard statements:

H226 Flammable liquid and vapour.
H304 May be fatal if swallowed and enters airways.
H315 Causes skin irritation.
H317 May cause an allergic skin reaction.
H319 Causes severe eye irritation.
H332 Harmful by inhalation.
H335 May cause respiratory tract irritation.
H336 May cause drowsiness or dizziness.
H373 May cause damage to organs through prolonged or repeated exposure.
H412 Harmful to aquatic life with long-lasting effects.

Precautions

Prevention:

P210 Keep away from heat, hot surfaces, sparks, open flames and other sources of ignition. Do not smoke.
P260 Do not breathe dust/fume/gas/mist/vapour/spray.
P271 Use only outdoors or in a well-ventilated area.
P280 Wear protective gloves/ protective clothing/ eye protection/ face protection.

Action:

P301 + P310 IF INHALED: Seek immediate advice from a POISON CENTER/doctor.
P331 DO NOT induce vomiting.
P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes; remove contact lenses, if possible; continue rinsing.

Storage:

P405 Store under lock and key.

Removal:

P501 Dispose of contents/packaging to an appropriate waste site or recycling plant in accordance with/according to local, regional, national and international national regulations.

Additional labelling

EUH204 Contains isocyanates. May cause an allergic reaction.

2.3 Other hazards:

This substance/mixture does not contain any components that can be considered persistent, bioaccumulative and toxic (PBT) or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

Ecological information:

The substance/mixture does not contain any components believed to have endocrine-disrupting properties according to REACH article 57(f) or Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at level 0.1% or higher.

Toxicological information:

The substance/mixture does not contain any components believed to have endocrine-disrupting properties according to REACH article 57(f) or Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at level 0.1% or higher.

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SECTION 3: Composition and information on ingredients

3.2 Mixtures:

Description : Mixture contains Isocyanates.

Chemical Name	Cas no. EC No. Index no. Registration number	Classification (Regulation (EC) No 1272/008)	Concentration (%)
Imidodicarbonediamide, N,N',2-tris(6-isocyanatohexyl)-, polymer containing 2-ethyl-2-(hydroxymethyl)-1,3-propanediol, 2,5-furandione, 1,6-hexanediol, 1,3-isobenzofurandione and 4,4'-(1-methylethylidene)bis[cyclohexanol].	67892-85-7 - - -	Acute Tox. 4; H332 Skin Sens. 1; H317 STOT SE 3; H335	>= 30 - < 50
Reaction mass of ethylbenzene and xylene	Not allocated 905-588-0 - 01-2119486136-34 01-2119488216-32	Flam. Liq. 3; H226 Acute Tox. 4; H332 Acute Tox. 4; H312 Skin Irrit. 2; H315 Eye Irrit. 2; H319 STOT SE 3; H335 (Respiratory system) STOT RE 2; H373 Asp. Tox. 1; H304 specific concentration limits STOT RE 2 >= 10 %	>= 30 - < 50
Solvent naphtha (petroleum), light aromatic	64742-95-6 265-199-0 649-356-00-4 01-2119486773-24	Flam. Liq. 3; H226 Skin Irrit. 2; H315 STOT SE 3; H336 (Central nervous system) Asp. Tox. 1; H304 Aquatic Chronic 2; H411	>= 10 - < 20
Hydrocarbons, C9, aromatics	Not allocated 918-668-5 - 01-2119455851-35	Flam. Liq. 3; H226 STOT SE 3; H336 (Central nervous system) STOT SE 3; H335 (Respiratory system) Asp. Tox. 1; H304 Aquatic Chronic 2; H411 EUH066	>= 2,5 - < 10
2-methoxy-1-methylethyl acetate	108-65-6 203-603-9 607-195-00-7 01-2119475791-29	Flam. Liq. 3; H226 STOT SE 3; H336 (Central nervous system)	>= 1 - < 10
hexamethylene-1,6-diisocyanate	822-06-0 212-485-8 615-011-00-1 01-2119457571-37	Acute Tox. 4; H302 Acute Tox. 1; H330 Skin Irrit. 2; H315 Eye Irrit. 2; H319 Resp. Sens. 1; H334 Skin Sens. 1; H317 STOT SE 3; H335 (Respiratory system) specific concentration limits Resp. Sens. 1; H334 >= 0,5 % Skin Sens. 1; H317 >= 0,5 %	>= 0,1 - < 0,5

For explanation of abbreviations, see section 16.

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SECTION 4: First aid measures

4.1 Description of first-aid measures:

General information:

In case of accident or if you feel unwell, consult a doctor immediately.

Move outside the danger zone.

Remove contaminated clothing and shoes immediately.

Not leaving the victim alone.

Poisoning symptoms may not appear until several hours later.

Show this safety data sheet to the doctor on duty.

Protection of first responders:

First responders should remember to protect themselves and wear the recommended protective clothing

By inhalation:

Getting into the fresh air.

Keep victim warm and calm.

In case of irregular breathing or respiratory arrest, apply artificial respiration.

Call a doctor immediately.

On contact with skin:

Immediately wash with soap and plenty of water and remove all contaminated clothing and shoes.

Alert a doctor if irritation occurs and persists.

On contact with eyes:

Rinse immediately with plenty of water, including under the eyelids, for at least 15 minutes.

Keep eyes well open during rinsing.

As far as easy to do, remove any contact lenses.

Consult a doctor.

If swallowed:

Rinse mouth with water.

DO NOT induce vomiting.

Call a doctor immediately.

Aspiration hazard if swallowed - may enter lungs and cause damage.

4.2 Main acute and delayed symptoms and effects:

Dangers:

May be fatal if substance enters respiratory tract if swallowed.

Causes skin irritation.

May cause allergic skin reaction.

Causes severe eye irritation.

Harmful by inhalation.

May cause respiratory irritation.

May cause drowsiness or dizziness.

May cause organ damage with prolonged or repeated exposure.

4.3 Indication of immediate medical attention and special treatment required:

Treatment:

Symptomatic treatment.

Keep under medical supervision for at least 48 hours.

SECTION 5: Fire-fighting measures

5.1 Extinguishing media:

Suitable extinguishing agents:

Carbon dioxide (CO₂)

Dry powder

Alcohol-resistant foam

Spraying water in large fire cases

Water spray jet

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Extinguishing agents not suitable from a safety point of view:

Powerful water jet

5.2 Special hazards arising from the substance or mixture:

Specific hazards in firefighting:

In case of fire/high temperatures formation of hazardous/toxic vapours possible.

Due to the high vapour pressure, the barrels are at risk of bursting if the temperature rises.

Cool closed containers near the fire with water spray.

Hazardous combustion products:

Hazardous decomposition products are formed during incomplete combustion

Carbon monoxide, carbon dioxide and unburned hydrocarbon (smoke).

Isocyanates.

5.3 Advice for firefighters:

Special protective equipment for firefighters:

In case of fire, wear a compressed air mask.

Use personal protective equipment.

Full suit for protection against chemicals.

Further information:

Collect contaminated firefighting water separately.

It should not drain to the sewerage system.

Combustion residues and contaminated fire fighting water must be disposed of according to local regulations.

SECTION 6: Measures in case of accidental release of the substance or mixture

6.1 Personal precautions, protective equipment and emergency procedures:

Personal precautions:

Wear personal protective clothing.

Evacuate personnel to a safe area.

Ensure suitable ventilation, especially in closed rooms.

Remove all ignition sources.

No smoking.

Avoid contact with eyes, skin and clothing.

Sweep up to prevent slipping.

In case of vapour formation, use a respirator with an approved filter type.

6.2 Environmental precautions:

Environmental precautions:

Do not drain into surface water or the sewerage system.

In case of significant leaks that cannot be contained, the local government should be notified.

6.3 Methods and materials for containment and cleaning:

Cleaning methods:

Absorb in inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust).

After about an hour, put in waste container and do not seal, given the development of carbon dioxide.

Waste must NOT be packed on sealed.

6.4 Reference to other sections:

For personal protection, see section 8.

For removal instructions, see section 13.

SECTION 7: Handling and storage:

7.1 Precautions for safe handling of the substance or mixture:

Safe handling advice:

Provide proper information, instruction and training for users.

All processes should be supervised by specialists or authorised personnel.

Keep container closed when not in use.

Ensure adequate ventilation and/or extraction in the workplace.

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Avoid exceeding the prescribed MAC values (see section 8).

Do not inhale vapours or spray mist.

Wear a suitable respirator during spraying.

For personal protection, see section 8.

Advice on protection against fire and explosion:

Vapours can form explosive mixtures with air.

Keep away from open flames, hot surfaces and ignition sources.

No smoking.

Take measures to prevent the generation of electrostatic charge.

Use explosion-proof equipment.

Hygiene measures:

Persons already sensitised to diisocyanates may experience allergic reactions when using this product.

Persons suffering from asthma, eczema or skin problems should avoid contact with this product, including skin contact.

7.2 Conditions for safe storage, including incompatibilities:

Requirements relative to storage space and tanks:

Store in original container.

Keep in tightly closed container.

Keep away from heat and ignition sources.

Do not expose to direct sunlight.

Protect against moisture.

Details of storage conditions:

Keep behind lock or in an area accessible only to skilled or authorised persons.

Advice for mixed storage:

Keep away from food and drink.

7.3 Specific end use:

Specific use:

No data available.

SECTION 8: Exposure controls/personal protection measures

8.1 Control parameters:

Limits exposure on appeal

Components	CAS No.	Type of value (Mode of exposure)	Control parameters	Basic
2-methoxy-1-methylethyl acetate	108-65-6	STEL	100 ppm 550 mg/m ³	2000/39/EC
		Further information: Identifies a potentially significant uptake through the skin, Indicative		
		TWA	50 ppm 275 mg/m ³	2000/39/EC
		Further information: Identifies a potentially significant uptake through the skin, Indicative		
		TGG-8 hours	550 mg/m ³	EN WG

Derived no-effect doses (DNEL) according to Regulation (EC) Number 1907/2006:

Substance name	End use	Route of exposure	Possible health conditions	Value
2-methoxy-1-methylethyl acetate	Employees	Inhalation	Long-term - systemic effects	275 mg/m ³
	Employees	Inhalation	Acute - local effects	550 mg/m ³
	Employees	Skin touch	Long-term - systemic effects	796 mg/kg
	Consumers	Inhalation	Long-term - systemic effects, Long-term local effects	33 mg/m ³
	Consumers	Skin touch	Long-term - systemic effects	320 mg/kg
	Consumers	Oral	Long-term - systemic effects	36 mg/kg
hexamethylene-1,6-diisocyanate	Employees	Inhalation	Long-term local effects	0.035 mg/m ³
	Employees	Inhalation	Acute - local effects	0.07 mg/m ³

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Predicted no-effect concentration (PNEC) according to Regulation (EC) Number 1907/2006:

Substance name	Environmental compartment	Value
2-methoxy-1-methylethyl acetate	Freshwater	0.635 mg/l
	Seawater	0.064 mg/l
	Sewage treatment plant	100 mg/l
	Freshwater deposition	3.29 mg/kg
	Sea deposits	0.329 mg/kg
hexamethylene-1,6-diisocyanate	Bottom	0.29 mg/kg
	Sewage treatment plant	8.42 mg/l

8.2 Exposure control measures:

Personal protection devices:

Eye protection:

Safety glasses with side shields according to EN 166.

Hand protection

Material:

Fluorinated rubber

Breakthrough time:

> 480 min

Glove thickness:

>= 0.4 mm

Guideline:

DIN EN 374

Protection index:

Class 6

Notes:

Gloves should be discarded and replaced at signs of degradation or chemical breakthrough.

Data on soak time/material strength are default values!

The actual soaking time/material strength should be obtained from the manufacturer of the protective gloves. Choosing a suitable glove depends not only on the material, but also on other quality aspects, and varies from manufacturer to manufacturer.

Skin and body protection:

Wear suitable protective clothing, e.g. made of cotton or heat-resistant synthetic fibres.

Long-sleeved clothing

Respiratory protection:

To prevent inhalation of spray mist or sanding dust, a suitable mask must be worn during spraying and sanding.

Apply engineering measures to comply with MAC values.

Compressed air mask (EN 133).

Filter type:

Type of combined particulate and organic vapour (A-P).

Protective measures:

Provide eyewash facilities and safety showers close to the workplace.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties:

Physical state:	liquid
Colour:	transparent
Odour:	aromatic
Melting/freezing point:	Not implemented
Initial boiling point and boiling range:	> 136°C
Upper explosion limit / Upper flammability limit:	7 %(V)
Lower explosion limit / Lower flammability limit:	0,7 %(V)
Flash point:	> 23°C
Ignition temperature:	Not performed

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pH: Not applicable substance/mixture not soluble (in water)

Viscosity
Viscosity, dynamic: Not performed
Viscosity, kinematic: < 20.5 mm²/s (40°C)

Solubility
Solubility in water: immiscible
Partition coefficient: n-octanol/water: No data available
Vapour pressure: > 8 hPa (20°C)
Density: 1 g/cm³ (20°C)

9.2 Other information
Explosives: Not explosive
May form a flammable/explosive vapour-air mixture if used.

Self-igniting: not self-flammable

SECTION 10: Stability and reactivity

10.1 Reactivity:

No decomposition if directions are followed.

10.2 Chemical Stability:

No decomposition if stored and applied as indicated.

10.3 Potential Hazardous Reactions:

Dangerous reactions:

Amines and alcohols cause exothermic reactions.

Mixture slowly reacts with water, developing CO₂ in the process.

CO₂ formation in closed vessels causes overpressure and danger of bursting open.

Vapours may form explosive mixture with air.

10.4 Conditions to avoid:

Heat, flames and sparks.

Extreme temperatures and direct sunlight.

10.5 Chemically interacting Materials:

Materials to avoid:

Amines

Alcohols

10.6 Hazardous Decomposition Products:

In case of fire/high temperatures formation of hazardous/toxic vapours possible.

SECTION 11: Toxicological information

11.1 Information on toxicological effects:

ACUTE TOXICITY

Harmful by inhalation

Product:

Acute toxicity by inhalation:

Acute toxicity estimates: 1.3 mg/l

Exposure time: 4 h

Test atmosphere: dust/mist

Method: Calculation method

Acute dermal toxicity:

Acute toxicity estimates: > 2,000 mg/kg

Method: Calculation method

Constituents:

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Acute toxicity by inhalation:

LC50: 1.5 mg/l

Exposure time: 4 h

Test atmosphere: dust/mist

Method: expert opinion

Acute dermal toxicity:

LD50 Skin (Rat): > 2,000 mg/kg

Method: Guideline test OECD 402

Reaction mixture of ethylbenzene and xylene:

Acute oral toxicity:

LD50 oral (Rat): 3,523 - 4,000 mg/kg

Method: EC Directive 92/69/EEC B.1 Acute toxicity (oral)

Acute toxicity by inhalation:

LC50 (Rat, male): 6350 - 6700 ppm

Exposure time: 4 h

Test atmosphere: vapours

Method: Regulation (EC) No 440/2008, Annex, B.2

Acute dermal toxicity:

LD50 skin (Rabbit): 12,126 mg/kg

Solvent naphtha (petroleum), light aromatic:

Acute oral toxicity:

LD50 oral (Rat): > 6,800 mg/kg

Acute toxicity by inhalation:

LC50 (Rat): > 10.2 mg/l

Exposure time: 4 h

Test atmosphere: vapours

Method: Guideline test OECD 403

Assessment: The substance or mixture shows no acute toxicity by inhalation

Acute dermal toxicity:

LD50 Skin (Rabbit): > 3,400 mg/kg

Method: Guideline test OECD 402

Hydrocarbons, C9, aromatics:

Acute oral toxicity:

LD50 oral (rat, female): approximately 3,492 mg/kg

Acute toxicity by inhalation:

LC50 (Rat): > 6,193 mg/l

Exposure time: 4 h

Test atmosphere: vapours

Method: Guideline test OECD 403

Assessment: The substance or mixture shows no acute toxicity by inhalation

Acute dermal toxicity:

LD50 Skin (Rabbit): > 3,160 mg/kg

Method: Guideline test OECD 402

2-methoxy-1-methylethyl acetate:

Acute oral toxicity:

LD50 oral (Rat): 6,190 mg/kg

Method: Guideline test OECD 401

Acute toxicity by inhalation:

LC0 (Rat): > 1883 ppm

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Exposure time: 4 h
Test atmosphere: vapours
Method: Guideline test OECD 403
Assessment: The substance or mixture shows no acute toxicity by inhalation

Acute dermal toxicity:

LD50 Skin (Rabbit): > 5,000 mg/kg
Method: Guideline test OECD 402
hexamethylene-1,6-diisocyanate:

Acute oral toxicity:

LD50 oral (Rat): 959 mg/kg
Method: Guideline test OECD 401

Acute toxicity by inhalation:

LC50 (Rat): 0.124 mg/l
Exposure time: 4 h
Test atmosphere: vapours
Method: Guideline test OECD 403

Acute dermal toxicity:

LD50 Skin (Rat): > 7,000 mg/kg
Method: Guideline test OECD 402

SKIN CORROSION/IRRITATION

Causes skin irritation.

Constituents:

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Type:

Rabbit

Assessment:

No skin irritation

Method:

Guideline test OECD 404
Reaction mixture of ethylbenzene and xylene:

Results:

Skin irritation
Solvent naphtha (petroleum), light aromatic:

Results:

Skin irritation
Hydrocarbons, C9, aromatics:

Results:

Repeated exposure can cause dry or cracked skin.
hexamethylene-1,6-diisocyanate:

Type:

Rabbit

Method:

Guideline test OECD 404

Results:

Skin irritation

SERIOUS EYE DAMAGE/EYE IRRITATION

Causes severe eye irritation.

Constituents:

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Type:

Rabbit

Assessment:

No eye irritation

Method:

Guideline test OECD 405

Reaction mixture of ethylbenzene and xylene:

Results:

Moderate eye irritation

hexamethylene-1,6-diisocyanate:

Type:

Rabbit

Method:

Guideline test OECD 405

Results:

Moderate eye irritation

RESPIRATORY/SKIN SENSITISATION

SKIN SENSITISATION

May cause allergic skin reaction.

RESPIRATORY SENSITISATION

Not classified based on available information.

Constituents:

Imidodicarbonediamide, N,N',2-tris(6-isocyanatohexyl)-, polymer containing 2-ethyl-2-(hydroxymethyl)-1,3-propanediol, 2,5-furandione, 1,6-hexanediol, 1,3-isobenzofurandione and 4,4'-(1-methylethylidene)bis[cyclohexanol]:

Test type:

Local lymph node test (LLNA)

Type:

Mouse

Assessment:

May cause sensitisation by skin contact.

Method:

Guideline test OECD 429

Results:

positive

hexamethylene-1,6-diisocyanate:

Type:

Guinea pig

Method:

Guideline test OECD 406

Results:

Product makes skin hypersensitive, subcategory 1B.

Type:

Guinea pig

Results:

Product causes respiratory sensitisation, subcategory 1B.

MUTAGENICITY IN GAMETES

Not classified based on available information.

Constituents:

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Solvent naphtha (petroleum), light aromatic:

Mutagenicity in germ cells- Assessment:

Classified based on benzene content < 0.1% (regulation (EC) 1272/2008, appendix VI, part 3, note P)

Hydrocarbons, C9, aromatics:

Mutagenicity in germ cells- Assessment:

Classified based on benzene content < 0.1% (regulation (EC) 1272/2008, appendix VI, part 3, note P)

CARCINOGENICITY

Not classified based on available information.

Constituents:

Solvent naphtha (petroleum), light aromatic:

Carcinogenicity - Assessment:

Classified based on benzene content < 0.1% (regulation (EC) 1272/2008, appendix VI, part 3, note P)

Hydrocarbons, C9, aromatics:

Carcinogenicity - Assessment:

Classified based on benzene content < 0.1% (regulation (EC) 1272/2008, appendix VI, part 3, note P)

REPRODUCTIVE TOXICITY

Not classified based on available information.

STOT AT SINGLE EXPOSURE

May cause respiratory tract irritation. May cause drowsiness or dizziness.

Constituents:

Imidodicarbonediamide, N,N',2-tris(6-isocyanatohexyl)-, polymer containing 2-ethyl-2-(hydroxymethyl)-1,3-propanediol, 2,5-furandione, 1,6-hexanediol, 1,3-isobenzofurandione and 4,4'-(1-methylethylidene)bis[cyclohexanol]:

Assessment:

May cause respiratory irritation.

Reaction mixture of ethylbenzene and xylene:

Assessment:

May cause respiratory irritation.

Solvent naphtha (petroleum), light aromatic:

Assessment:

May cause respiratory tract irritation,, May cause drowsiness or dizziness.

Hydrocarbons, C9, aromatics:

Assessment:

May cause respiratory tract irritation,, May cause drowsiness or dizziness.

2-methoxy-1-methylethyl acetate:

Route of exposure:

Oral

Target organs:

Central nervous system

Assessment:

May cause drowsiness or dizziness.

hexamethylene-1,6-diisocyanate:

Assessment:

May cause respiratory irritation.

STUTTER ON REPEATED EXPOSURE

May cause organ damage with prolonged or repeated exposure.

Constituents:

Reaction mixture of ethylbenzene and xylene:

Assessment:

May cause organ damage with prolonged or repeated exposure.

ASPIRATION TOXICITY

May be fatal if substance enters respiratory tract if swallowed.

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Constituents:

Reaction mixture of ethylbenzene and xylene:

May be fatal if substance enters respiratory tract if swallowed.

Solvent naphtha (petroleum), light aromatic:

May be fatal if substance enters respiratory tract if swallowed.

Hydrocarbons, C9, aromatics:

May be fatal if substance enters respiratory tract if swallowed.

11.2 Information on other hazards

Endocrine-disrupting properties

Product:

Assessment:

The substance/mixture does not contain components believed to have endocrine-disrupting properties according to REACH article 57(f) or Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at level 0.1% or higher.

SECTION 12: Ecological information

12.1 Toxicity:

Constituents:

Reaction mixture of ethylbenzene and xylene:

Toxicity to fish:

LC50 (Fish): 2.6 mg/l

Exposure time: 96 h

Method: Guideline test OECD 203

Toxicity to daphnia and other aquatic invertebrates:

LC50 (Daphnia dubia (water fleas)): 1 mg/l

Exposure time: 24 h

Method: OECD Test Guideline 202

EC50 (Daphnia dubia (water fleas)): 165 mg/l

Exposure time: 24 h

Toxicity to algae/water plants:

EC50 (algae/water plants): 2.2 mg/l

Exposure time: 72 h

Method: OECD Test Guideline 201

IC50 (algae/water plants): 1 - 10 mg/l

Exposure time: 72 h

Toxicity to micro-organisms:

EC50 (Bacteria): 1 - 10 mg/l

Ecotoxicology Assessment

Chronic aquatic toxicity:

No ecotoxicological effects are known from this product.

Solvent naphtha (petroleum), light aromatic:

Toxicity to fish:

LL50 (Oncorhynchus mykiss (rainbow trout)): 9.2 mg/l

Exposure time: 96 h

Method: Guideline test OECD 203

Toxicity to daphnia and other aquatic invertebrates:

EL50 (Daphnia magna (large water flea)): 3.2 mg/l

Exposure time: 48 h

Method: OECD Test Guideline 202

Toxicity to algae/water plants:

EL50 (Pseudokirchneriella subcapitata (green algae/water plants)): 56 mg/l

Exposure time: 72 h

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Method: OECD Test Guideline 201

Fish toxicity (Chronic toxicity):

NOELR: 2.6 mg/l

Exposure time: 14 d

Species: Pimephales promelas (American tadpole)

Method: OECD Test Guideline 204

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity):

NOELR: 2.6 mg/l

Exposure time: 21 d

Species: Daphnia magna (large water flea)

Method: OECD Test Guideline 211

Ecotoxicology Assessment

Chronic aquatic toxicity:

Toxic to aquatic organisms, with long-term effects.

Hydrocarbons, C9, aromatics:

Toxicity to fish:

LL50 (Oncorhynchus mykiss (rainbow trout)): 9.2 mg/l

Exposure time: 96 h

Method: Guideline test OECD 203

Toxicity to daphnia and other aquatic invertebrates:

EL50 (Daphnia magna (large water flea)): 3.2 mg/l

End point: Immobilisation

Exposure time: 48 h

Method: OECD Test Guideline 202

Toxicity to algae/water plants:

NOELR (Pseudokirchneriella subcapitata (green algae/water plants)): 1 mg/l

Exposure time: 72 h

Method: OECD Test Guideline 201

Fish toxicity (Chronic toxicity):

NOELR: 1,228 mg/l

Exposure time: 28 d

Species: Oncorhynchus mykiss (rainbow trout)

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity):

NOELR: 2,144 mg/l

Exposure time: 21 d

Species: Daphnia magna (large water flea)

2-methoxy-1-methylethyl acetate:

Toxicity to fish:

LC50 (Oncorhynchus mykiss (rainbow trout)): 100 - 180 mg/l

End point: mortality rate

Exposure time: 96 h

Method: Guideline test OECD 203

Toxicity to daphnia and other aquatic invertebrates:

EC50 (Daphnia magna (large water flea)): > 500 mg/l

End point: Immobilisation

Exposure time: 48 h

Method: Regulation (EC) No 440/2008, Annex, C.2

Toxicity to algae/water plants:

EC50 (Pseudokirchneriella subcapitata (green algae/water plants)): > 1,000 mg/l

End point: Growth rate

Exposure time: 96 h

Method: OECD Test Guideline 201

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Fish toxicity (Chronic toxicity):

NOEC: 47.5 mg/l
Exposure time: 14 d
Species: Oryzias latipes (Japanese rice fish)
Method: OECD Test Guideline 204

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity):

NOEC: \geq 100 mg/l
Exposure time: 21 d
Species: Daphnia magna (large water flea)
Method: OECD Test Guideline 211

hexamethylene-1,6-diisocyanate:

Toxicity to fish:

LC50 (Danio rerio (zebrafish)): \geq 82.8 mg/l
End point: mortality rate
Exposure time: 96 h
Method: Regulation (EC) No 440/2008, Annex, C.1

Toxicity to daphnia and other aquatic invertebrates:

EC0 (Daphnia magna (large water flea)): \geq 89.1 mg/l
End point: Immobilisation
Exposure time: 48 h
Method: Regulation (EC) No 440/2008, Annex, C.2

Toxicity to algae/water plants:

EC50 (Desmodesmus subspicatus (green algae/water plants)): 77.4 mg/l
Exposure time: 72 h

Toxicity to micro-organisms:

EC50 (Bacteria): 842 mg/l
Exposure time: 3 h

Ecotoxicology Assessment

Chronic aquatic toxicity:

No ecotoxicological effects are known from this product.

12.2 Persistence and Degradability:

Constituents:

Hydrocarbons, C9, aromatics:

Biodegradability:

Result: Readily biodegradable.
Biodegradation: 78 %
Exposure time: 28 d
Method: Guideline test OECD 301F

2-methoxy-1-methylethyl acetate:

Biodegradability:

Biodegradation: 90 %
Exposure time: 28 d
Method: Guideline test OECD 301F

hexamethylene-1,6-diisocyanate:

Biodegradability:

Biodegradation: 42 %
Exposure time: 28 d

12.3 Bioaccumulation:

Constituents:

Reaction mixture of ethylbenzene and xylene:

Partition coefficient: n-octanol/water:

log Pow: 3.2 (20°C)

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Solvent naphtha (petroleum), light aromatic:

Partition coefficient: n-octanol/water:

log Pow: > 3

2-methoxy-1-methylethyl acetate:

Partition coefficient: n-octanol/water:

log Pow: 1.2 (20°C)

pH: 6.8

hexamethylene-1,6-diisocyanate:

Bioaccumulation:

Bioconcentration factor (BCF): 59.6

Partition coefficient: n-octanol/water:

log Pow: 3.2 (20°C)

12.4 Mobility in soil:

No data available.

12.5 Results of PBT and vPvB assessment:

Product:

Assessment:

This substance/mixture does not contain any components that can be considered persistent, bioaccumulative and toxic (PBT) or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

12.6 Endocrine disrupting properties

Product:

Assessment:

The substance/mixture does not contain components believed to have endocrine-disrupting properties according to REACH article 57(f) or Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at level 0.1% or higher.

12.7 Other Harmful Effects:

Product:

Additional ecological information:

No data available

SECTION 13: Disposal instructions

13.1 Waste treatment methods:

Product:

Do not dispose together with household waste.

Do not dispose of waste in the sink; take this substance and its packaging to a hazardous or special waste collection point.

Dispose of according to local regulations.

Present waste to an authorised disposal company.

Do not dispose of together with household waste.

Transfer to licensed disposal company.

It should undergo special treatment, e.g. at suitable landfill, to be in accordance with local regulations.

Contaminated packaging:

Empty containers should be disposed of at an authorised waste treatment facility for reuse or disposal.

Store and offer containers for reuse of the material if according to local regulations.

A package that has not been properly emptied should be disposed of in the same way as an unused product.

Dispose of according to local regulations.

Waste number:

The following waste codes are suggestions only:

08 01 11, waste paint and varnish containing organic solvents or other dangerous substances.

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SECTION 14: Information relating to transport

14.1 UN number

ADN: UN 1993
ADR: UN 1993
RID: UN 1993
IMDG: UN 1993
IATA: UN 1993

14.2 Proper cargo name according to UN model regulations

ADN: FLAMMABLE LIQUID, N.O.S.
(xylene, Low boiling point naphtha - unspecified)
ADR: FLAMMABLE LIQUID, N.O.S.
(xylene, Low boiling point naphtha - unspecified)
RID: FLAMMABLE LIQUID, N.O.S.
(xylene, Low boiling point naphtha - unspecified)
IMDG: FLAMMABLE LIQUID, N.O.S.
(xylene, Low boiling point naphtha - unspecified)
IATA: Flammable liquid, n.o.s.
(xylene, Low boiling point naphtha - unspecified)

14.3 Transport hazard class(es)

ADN: 3
ADR: 3
RID: 3
IMDG: 3
IATA: 3

14.4 Packing group

ADN

Packing group: III
Classification code: F1
Hazard identification no.: 30
Labels: 3

ADR

Packaging group: III
Classification code: F1
Hazard identification no.: 30
Labels: 3
Tunnel restriction code: (D/E)

RID

Packing group: III
Classification code: F1
Hazard identification no.: 30
Labels: 3

IMDG

Packaging group: III
Labels: 3
EmS Code: F-E, S-E

IATA (Cargo)

Packing requirement (cargo aircraft): 366
Packaging instruction (LQ): Y344
Packing group: III
Labels: Class 3 - Flammable liquids

IATA (Passenger)

Packing requirement (passenger aircraft): 355

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Packaging instruction (LQ): Y344
Packaging group: III
Labels: Class 3 - Flammable liquids

14.5 Environmental hazards

ADN

Environmentally hazardous: no

ADR

Environmentally hazardous: no

RID

Environmentally hazardous: no

IMDG

Marine pollution: no

14.6 Special precautions for the user

The transport classification(s) given herein are for information only, and based solely on the properties of the unpackaged material as described in this safety data sheet.

Transport classifications may vary in terms of mode of transport, size of packaging and variations in regional and national regulations, respectively.

14.7 Transport in bulk in accordance with Annex II to MARPOL 73/78 and the IBC Code

Not applicable for product as delivered.

SECTION 15: Statutory information

15.1 Safety, health and environmental regulations and legislation specific to the substance or mixture:

REACH - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, preparations and articles (Annex XVII):

Restriction conditions for the following dates should be considered:

Number on the list 3

REACH - Candidate list of substances of very high concern for authorisation (Article 59):

Not applicable

REACH - List of substances subject to authorisation (Annex XIV):

Not applicable

Regulation (EC) No 1005/2009 on ozone-depleting substances:

Not applicable

Regulation (EE) 2019/1021 on persistent organic pollutants (recast):

Not applicable

Netherlands. Substances of Very High Concern (ZVS list):

- ✓ Solvent naphtha (petroleum), light aromatic
- ✓ Hydrocarbons, C9, aromatics

Seveso III: Directive 2012/18/EU of the European Parliament and of the Council on the control of major-accident hazards involving dangerous substances:

P5c

FLAMMABLE LIQUIDS

Other regulations:

Take into account directive 92/85/EEC on maternity protection or stricter national legislation, if applicable.

Contains a substance subject to SZW list of mutagenic substances (Ministry of Social Affairs and Employment).

- ✓ Solvent naphtha (petroleum), light aromatic
- ✓ Hydrocarbons, C9, aromatics

Contains a substance subject to SZW list of carcinogenic substances (Ministry of Social Affairs and Employment).

- ✓ Solvent naphtha (petroleum), light aromatic
- ✓ Hydrocarbons, C9, aromatics

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Contains a substance subject to NON-limiting list of substances toxic to reproduction (Ministry of Social Affairs and Employment).

✓ dibutyltindilaurate

15.2 Chemical safety assessment:

No safety evaluation for chemicals according to EC Regulation 1907/2006 (REACH) was carried out for this product.

SECTION 16: Other information

Full text of the H statements

H226: Flammable liquid and vapour.
H302: Harmful if swallowed.
H304: May be fatal if swallowed and enters airways.
H312: Harmful in contact with skin.
H315: Causes skin irritation.
H317: May cause an allergic skin reaction.
H319: Causes severe eye irritation.
H330: Fatal by inhalation.
H332: Harmful by inhalation.
H334: May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H335: May cause respiratory tract irritation.
H336: May cause drowsiness or dizziness.
H373: May cause damage to organs through prolonged or repeated exposure.
H411: Toxic to aquatic organisms with long-lasting effects.
EUH066: Repeated exposure may cause dry or cracked skin.

Full text of other abbreviations

Acute Tox.: Acute toxicity
Aquatic Chronic: (Chronic) Aquatic long-term hazard
Asp. Tox.: Danger by inhalation
Eye Irrit.: Eye irritation
Flam. Liq.: Flammable liquids
Resp. Sens.: Respiratory sensitisation
Skin Irrit.: Skin corrosion/irritation
Skin sensitisation
STOT RE: Specific target organ toxicity - repeated exposure
STOT SE: Specific target organ toxicity - single exposure
2000/39/EC: Commission Directive 2000/39/EC establishing a first list of indicative occupational exposure limit values
EN WG: Working conditions - Statutory limit values
2000/39/EC / TWA: Limit values - 8 hours
2000/39/EC / SET: Limit value for short-term exposure
EN WG / TGG-8 hours: Time-weighted average - 8 hours

ADN - European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways;
ADR - European Agreement concerning the International Carriage of Dangerous Goods by Road (ADR Agreement); AIIC - Australian Inventory of Industrial Chemicals; ASTM - American Association for the Testing of Materials; bw - Body Weight; CLP - Regulation on Classification, Labelling and Packaging; Regulation (EC) No 1272/2008; CMR - Carcinogenic, mutagenic or toxic to reproduction; DIN - Standard of the German Institute for Standardisation; DSL - List of substances used indoors (Canada); ECHA - European Chemicals Agency; EC-Number - EINECS number; ECx - Concentration associated with x% response; ELx - Charge capacity associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemicals (Japan); ErCx - Concentration associated with x% growth response; GHS - Globally Harmonised System; GLP - Good Laboratory Practice; IARC -

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International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - IMO International Code for the Construction and Equipment of Ships Carrying Dangerous Chemicals in Bulk; IC50 - Half-Maximum Inhibitory Concentration; ICAO - International Civil Aviation Organisation; IECSC - Inventory List of Existing Chemicals in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organisation; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organisation for Standardisation; KECI - Korean Inventory of Existing Chemicals; LC50 - Lethal concentration for 50% of a test population; LD50 - Lethal dose for 50% of a test population (lethal dose median); MARPOL - International Convention for the Prevention of Pollution from Ships; n.o.s. - Not otherwise specified; NO(A)EC - No discernible (negative) effect on concentration; NO(A)EL - No discernible (negative) effect on Level; NOELR - No discernible effect on cargo capacity; NZIoC - New Zealand inventory of chemicals; OECD - Organisation for Economic Co-operation and Development OECD; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, bioaccumulative and toxic substance; PICCS - Philippine inventory of chemicals and chemical substances; (Q)SAR - (Quantitative) structure-activity relationships; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH); RID - Regulations concerning the International Carriage of Dangerous Goods by Rail (RID); SADT - Self-accelerating decomposition temperature; SDS - Safety Data Sheet; SVHC - Substance of Very High Concern; TCSI - Taiwanese Chemicals Inventory List; TRGS - Technical Regulation on Hazardous Substances; TSCA - Toxic Substances Control Act (USA); UN - United Nations; vPvB - Very Persistent and Very Bioaccumulative

Further information

Training advice:

Provide proper information, instruction and training for users.

Other information:

Classification of the preparation:

Flam. Liq. 3	H226
Acute Tox. 4	H332
Skin Irrit. 2	H315
Eye Irrit. 2	H319
Skin Sens. 1	H317
STOT SE 3	H336
STOT SE 3	H335
STOT RE 2	H373
Asp. Tox. 1	H304
Aquatic Chronic 3	H412

Classification procedure:

Based on product data or assessment
Calculation method
Calculation method
Calculation method
Calculation method
Calculation method
Calculation method
Calculation method
Calculation method
Calculation method

The information in this safety data sheet is correct to the best of our knowledge at the date of issue indicated. This information is intended only as guidance for safe handling, use, processing, storage, transportation, disposal, and release, and should not be considered a guarantee or indication of quality. The information relates only to the product mentioned herein and is not automatically valid when used with other products or in any other process, unless stated in the text.