

**Safety Data Sheet**

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 1 of 14

SECTION 1: Identification of the substance/mixture and of the company/undertaking**1.1. Product identifier**

979 Injektor Direkt-Reiniger 300 ml B1

UFI: KU96-P05J-U008-PT2Y

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

Additive

1.3. Details of the supplier of the safety data sheet

Company name: TUNAP GmbH & Co. KG
Street: Buergermeister-Seidl-Strasse 2
Place: D-82515 Wolfratshausen
Telephone: +49 (0) 8171/1600-0 Telefax: +49 (0) 8171/1600-40
E-mail: sdb@tunap.com
Internet: www.tunap.com

1.4. Emergency telephone number: 111 NHS (National Health Service)

SECTION 2: Hazards identification**2.1. Classification of the substance or mixture****GB CLP Regulation**

Flam. Liq. 2; H225
Asp. Tox. 1; H304
Skin Irrit. 2; H315
STOT SE 3; H336
Aquatic Chronic 3; H412

Full text of hazard statements: see SECTION 16.

2.2. Label elements**GB CLP Regulation****Hazard components for labelling**

Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics
Hydrocarbons, C10-C13, n-alkanes, <2% aromatics

Signal word: Danger

Pictograms:**Hazard statements**

H225 Highly flammable liquid and vapour.
H304 May be fatal if swallowed and enters airways.
H315 Causes skin irritation.
H336 May cause drowsiness or dizziness.
H412 Harmful to aquatic life with long lasting effects.

Precautionary statements

P101 If medical advice is needed, have product container or label at hand.
P102 Keep out of reach of children.
P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

**Safety Data Sheet**

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 2 of 14

P260	Do not breathe vapours.
P280	Wear protective gloves and eye protection/face protection.
P302+P352	IF ON SKIN: Wash with plenty of water.
P301+P310	IF SWALLOWED: Immediately call a POISON CENTER/doctor.
P331	Do NOT induce vomiting.
P304+P312	IF INHALED: Call a POISON CENTER or doctor/physician if you feel unwell.
P501	Dispose of contents/container to Dispose of contents/container according to the official regulations..

SECTION 3: Composition/information on ingredients**3.2. Mixtures****Relevant ingredients**

CAS No	Chemical name	Quantity		
	EC No	Index No	REACH No	
	Classification (GB CLP Regulation)			
1634-04-4	tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane			25 - < 50 %
	216-653-1	603-181-00-X		
	Flam. Liq. 2, Skin Irrit. 2; H225 H315			
	Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics			25 - < 50 %
	927-241-2		01-2119471843-32	
	Flam. Liq. 3, STOT SE 3, Asp. Tox. 1, Aquatic Chronic 3; H226 H336 H304 H412 EUH066			
	Polyether amine, polymer			5 - < 10 %
	Skin Irrit. 2, Eye Irrit. 2, Aquatic Chronic 2; H315 H319 H411			
337367-30-3	1-Propene, 2-methyl-, homopolymer, hydroformylation products, reaction products with ammonia			1 - < 3 %
	Skin Irrit. 2, Aquatic Chronic 3; H315 H412			
129813-66-7	Hydrocarbons, C10-C13, n-alkanes, <2% aromatics			1 - < 3 %
	929-018-5		01-2119475608-26	
	Asp. Tox. 1; H304 EUH066			
173140-85-7	Oxirane, ethyl-, homopolymer, monoisotridecyl ether			1 - < 3 %
	Skin Irrit. 2; H315			
67-56-1	methanol			0.1 - < 1 %
	200-659-6	603-001-00-X	01-2119433307-44	
	Flam. Liq. 2, Acute Tox. 3, Acute Tox. 3, Acute Tox. 3, STOT SE 1; H225 H331 H311 H301 H370			

Full text of H and EUH statements: see section 16.



Safety Data Sheet

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 3 of 14

Specific Conc. Limits, M-factors and ATE

CAS No	EC No	Chemical name	Quantity
		Specific Conc. Limits, M-factors and ATE	
1634-04-4	216-653-1	tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane	25 - < 50 %
		inhalation: LC50 = 85 mg/l (vapours); dermal: LD50 = > 2000 mg/kg; oral: LD50 = 3866 mg/kg	
	927-241-2	Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics	25 - < 50 %
		inhalation: LC50 = > 4951 mg/l (vapours); dermal: LD50 = > 5000 mg/kg; oral: LD50 = > 5000 mg/kg	
129813-66-7	929-018-5	Hydrocarbons, C10-C13, n-alkanes, <2% aromatics	1 - < 3 %
		dermal: LD50 = > 5000 mg/kg; oral: LD50 = > 15000 mg/kg	
67-56-1	200-659-6	methanol	0.1 - < 1 %
		inhalation: LC50 = 128,2 mg/l (vapours); inhalation: ATE = 0,5 mg/l (dusts or mists); dermal: LD50 = 17100 mg/kg; oral: LD50 = 6000 mg/kg STOT SE 1; H370: >= 10 - 100 STOT SE 2; H371: >= 3 - < 10	

SECTION 4: First aid measures

4.1. Description of first aid measures

General information

First aider: Pay attention to self-protection! Remove persons to safety. Never give anything by mouth to an unconscious person or a person with cramps.

After inhalation

Remove person to fresh air and keep comfortable for breathing. In all cases of doubt, or when symptoms persist, seek medical advice.

After contact with skin

Wash with plenty of water and soap. Take off immediately all contaminated clothing and wash it before reuse. In all cases of doubt, or when symptoms persist, seek medical advice.

After contact with eyes

Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. In case of troubles or persistent symptoms, consult an ophthalmologist.

After ingestion

Do NOT induce vomiting. Observe risk of aspiration if vomiting occurs. Call a physician in any case!

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

Headache, nausea, dizziness, fatigue, skin irritation

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

Treat symptomatically. Call a POISON CENTER. Symptoms can occur only after several hours.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

Water fog. Foam. Carbon dioxide (CO₂). Extinguishing powder.

Unsuitable extinguishing media

High power water jet.

5.2. Special hazards arising from the substance or mixture

Incomplete combustion and thermolysis gases of different toxicity can occur. In the case of hydrocarbonaceous products such as CO, CO₂, aldehydes and soot. These can be very dangerous if they are inhaled in high concentrations or in enclosed spaces.

5.3. Advice for firefighters

In case of fire and/or explosion do not breathe fumes. Move undamaged containers from immediate hazard area if it can be done safely. In case of fire: Wear self-contained breathing apparatus.



Safety Data Sheet

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 4 of 14

Additional information

Use water spray jet to protect personnel and to cool endangered containers. Suppress gases/vapours/mists with water spray jet. Collect contaminated fire extinguishing water separately. Do not allow entering drains or surface water.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General advice

Wear breathing apparatus if exposed to vapours/dusts/aerosols. Remove all sources of ignition. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

Wear personal protection equipment.

For non-emergency personnel

First aider: Pay attention to self-protection!

For emergency responders

Fight fire with normal precautions from a reasonable distance.

6.2. Environmental precautions

Do not allow to enter into surface water or drains. Prevent spread over a wide area (e.g. by containment or oil barriers). Ensure all waste water is collected and treated via a waste water treatment plant.

6.3. Methods and material for containment and cleaning up

For containment

Prevent spread over a wide area (e.g. by containment or oil barriers).

For cleaning up

Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents). Treat the recovered material as prescribed in the section on waste disposal.

Other information

Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents). Clean contaminated articles and floor according to the environmental legislation.

6.4. Reference to other sections

Safe handling: see section 7

Personal protection equipment: see section 8

Disposal: see section 13

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling

Observe instructions for use.

Dust must be exhausted directly at the point of origin. Vapours/aerosols must be exhausted directly at the point of origin. If local exhaust ventilation is not possible or not sufficient, the entire working area should be ventilated by technical means.

When using do not eat, drink, smoke, sniff.

Wear personal protection equipment (refer to section 8).

Advice on protection against fire and explosion

Keep away from sources of ignition - No smoking.

Advice on general occupational hygiene

Avoid exposure. Wear suitable protective clothing. Draw up and observe skin protection programme.

Further information on handling

Avoid contact with skin and eyes.

7.2. Conditions for safe storage, including any incompatibilities



Safety Data Sheet

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 5 of 14

Requirements for storage rooms and vessels

Keep container tightly closed. Observe legal regulations and provisions.

Hints on joint storage

Do not store together with: Oxidizing agents. Pyrophoric or self-heating substances. Food and feedingstuffs.

Further information on storage conditions

Store in a cool dry place. Observe legal regulations and provisions.

7.3. Specific end use(s)

No information available.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure limits (EH40)

CAS No	Substance	ppm	mg/m ³	fibres/ml	Category	Origin
1634-04-4	Methyl-tert-butyl ether	50	183.5		TWA (8 h)	WEL
		100	367		STEL (15 min)	WEL

Additional advice on limit values

- a no restriction
- b End of exposure or end of shift
- c at long-term exposure:
- d before next shift

blood (B)
Urine (U)

8.2. Exposure controls

Appropriate engineering controls

If handled uncovered, arrangements with local exhaust ventilation have to be used.

Individual protection measures, such as personal protective equipment

Eye/face protection

Suitable eye protection: Tightly sealed safety glasses.
EN 166

Hand protection

36

Skin protection

Wear suitable protective clothing. Take off immediately all contaminated clothing and wash it before reuse.

Respiratory protection

Wear breathing apparatus if exposed to vapours/dusts/aerosols.
When exceeding the relevant workplace exposure limits, note the following:
Suitable respiratory protective equipment: Combination filter device (DIN EN 141)..
Filtering device with filter or ventilator filtering device of type: A
Observe the wear time limits as specified by the manufacturer.
Observe legal regulations and provisions.

Environmental exposure controls

Observe legal regulations and provisions.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state: Liquid

**Safety Data Sheet**

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 6 of 14

Colour: yellow
Odour: amine-like

Test method

Melting point/freezing point:	not determined	
Boiling point or initial boiling point and boiling range:	55 °C	
Flammability:	not determined	
Lower explosion limits:	0,6 vol. %	
Upper explosion limits:	8,4 vol. %	
Flash point:	< 12 °C	ISO 3679
Auto-ignition temperature:	not determined	
Decomposition temperature:	not determined	
pH-Value (at 20 °C):	not determined	DIN 19268
Viscosity / kinematic: (at 40 °C)	< 20,5 mm ² /s	DIN EN ISO 3104
Water solubility:	The study does not need to be conducted because the substance is known to be insoluble in water.	
Solubility in other solvents	not determined	
Partition coefficient n-octanol/water:	not determined	
Vapour pressure:	not determined	
Density (at 20 °C):	0,7632 g/cm ³	DIN 51757
Relative vapour density:	not determined	
Particle characteristics:	not applicable	

9.2. Other information**Information with regard to physical hazard classes**

Explosive properties

The product is not: Explosive.

Oxidizing properties

The product is not: oxidising.

Other safety characteristics

Viscosity / dynamic:

DIN 53019-1

Flow time:

DIN EN ISO 2431

(at 20 °C)

SECTION 10: Stability and reactivity**10.1. Reactivity**

Highly flammable.

10.2. Chemical stability

The product is stable under storage at normal ambient temperatures.

10.3. Possibility of hazardous reactions

No hazardous reaction when handled and stored according to provisions.

10.4. Conditions to avoid

Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Take precautionary measures against static discharges.

10.5. Incompatible materials

Oxidizing agents. Pyrophoric or self-heating substances.

10.6. Hazardous decomposition products

Incomplete combustion and thermolysis gases of different toxicity can occur. In the case of hydrocarbonaceous



Safety Data Sheet

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 7 of 14

products such as CO, CO₂, aldehydes and soot. These can be very dangerous if they are inhaled in high concentrations or in enclosed spaces.

Further information

Do not mix with other chemicals.

SECTION 11: Toxicological information

11.1. Information on hazard classes as defined in GB CLP Regulation

Toxicokinetics, metabolism and distribution

There are no data available on the mixture itself.

Acute toxicity

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

ATEmix calculated

ATE (oral) > 5000 mg/kg; ATE (dermal) > 5000 mg/kg; ATE (inhalation vapour) > 50 mg/l; ATE (inhalation dust/mist) > 12,5 mg/l

CAS No	Chemical name				
	Exposure route	Dose	Species	Source	Method
1634-04-4	tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane				
	oral	LD50 mg/kg	3866	Rat	
	dermal	LD50 mg/kg	> 2000	Rat	
	inhalation (4 h) vapour	LC50	85 mg/l	Rat	
	Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics				
	oral	LD50 mg/kg	> 5000	Rat	
	dermal	LD50 mg/kg	> 5000	Rabbit	
	inhalation (4 h) vapour	LC50	> 4951	Rat	
129813-66-7	Hydrocarbons, C10-C13, n-alkanes, <2% aromatics				
	oral	LD50 mg/kg	> 15000	Rat	Study report (1977)
	dermal	LD50 mg/kg	> 5000	Rabbit	Study report (1993)
67-56-1	methanol				
	oral	LD50 mg/kg	6000	Monkey	Amer J Ophthalmol 40: 76-83 (cited in DG)
	dermal	LD50 mg/kg	17100	Kaninchen	
	inhalation (4 h) vapour	LC50 mg/l	128,2	Rat	Study report (1980)
	inhalation dust/mist	ATE	0,5 mg/l		Study performed according to internal co

Irritation and corrosivity

Skin corrosion/irritation: Causes skin irritation.

Serious eye damage/eye irritation: Based on available data, the classification criteria are not met.

Sensitising effects

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

Carcinogenic/mutagenic/toxic effects for reproduction



Safety Data Sheet

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 8 of 14

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.

No indications of human carcinogenicity exist.

No indications of human germ cell mutagenicity exist.

No indications of human reproductive toxicity exist.

STOT-single exposure

May cause drowsiness or dizziness. (Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics)

STOT-repeated exposure

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

Aspiration hazard

May be fatal if swallowed and enters airways.

Information on likely routes of exposure

Ingestion, Inhalation, Skin contact, Eye contact.

Reference to other sections: 2.1, 4.2.

Specific effects in experiment on an animal

No information available.

11.2. Information on other hazards

Endocrine disrupting properties

This product does not contain a substance that has endocrine disrupting properties with respect to humans as no components meets the criteria.

Other information

The mixture is classified as hazardous according to regulation (EC) No 1272/2008 [CLP]. Special hazards arising from the substance or mixture!

SECTION 12: Ecological information

12.1. Toxicity

Harmful to aquatic life with long lasting effects.

**Safety Data Sheet**

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 9 of 14

CAS No	Chemical name					
	Aquatic toxicity	Dose	[h] [d]	Species	Source	Method
1634-04-4	tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane					
	Acute fish toxicity	LC50 672 mg/l	96 h	Oncorhynchus mykiss (Rainbow trout)		
	Acute algae toxicity	ErC50 > 800 mg/l	72 h	Desmodesmus subspicatus		
	Acute crustacea toxicity	EC50 651 mg/l	48 h	Daphnia magna		
	Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics					
	Acute fish toxicity	LC50 >1000 mg/l	96 h	Oncorhynchus mykiss (Rainbow trout)		
	Acute algae toxicity	ErC50 >1000 mg/l	72 h	Pseudokirchneriella subcapitata		
	Acute crustacea toxicity	EC50 >1000 mg/l	48 h	Daphnia magna		
129813-66-7	Hydrocarbons, C10-C13, n-alkanes, <2% aromatics					
	Acute algae toxicity	ErC50 57161 mg/l	72 h	Skeletonema costatum	Study report (1997)	ISO 10253
	Acute crustacea toxicity	EC50 ca. 0,2 mg/l	48 h	Daphnia magna	Study report (1987)	other: As described in: The evaluation o
	Fish toxicity	NOEC 0,139 mg/l	28 d	Oncorhynchus mykiss	REACH Registration Dossier	The aquatic toxicity was estimated by a
	Crustacea toxicity	NOEC 0,361 mg/l	21 d	Daphnia magna	REACH Registration Dossier	The aquatic toxicity was estimated by a
67-56-1	methanol					
	Acute fish toxicity	LC50 15400 mg/l	96 h	Lepomis macrochirus	Bulletin of Environmental Contamination	other: EPA-660/3-75-009, 1975
	Acute algae toxicity	ErC50 ca. 22000 mg/l	96 h	Pseudokirchneriella subcapitata	Ecotoxicology and Environmental Safety 7	OECD Guideline 201
	Acute crustacea toxicity	EC50 > 10000 mg/l	48 h	Daphnia magna	Water Research 23(4): 495-499 (1989)	other: DIN 38412 Teil 11
	Fish toxicity	NOEC 446,7 mg/l	28 d	Pimephales promelas	SAR and QSAR in Environmental Research,	Calculation performed with ECOSAR
	Crustacea toxicity	NOEC 208 mg/l	21 d	Daphnia magna	OECD QSAR Toolbox Report (2013)	Toxicity of the target chemical is predi

12.2. Persistence and degradability

The product has not been tested.

**Safety Data Sheet**

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 10 of 14

CAS No	Chemical name	Method	Value	d	Source
		Evaluation			
1634-04-4	tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane				
	OECD 301 B		2	28	ECHA
	Not readily biodegradable (according to OECD criteria)				
	Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics				
	OECD Guideline 301 F		89 %	28	ECHA
67-56-1	methanol				
	OECD 301 E		98	28	EVONIK
	Easily biodegradable (concerning to the criteria of the OECD)				

12.3. Bioaccumulative potential

The product has not been tested.

Partition coefficient n-octanol/water

CAS No	Chemical name	Log Pow
1634-04-4	tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane	0,94
67-56-1	methanol	-0,77

BCF

CAS No	Chemical name	BCF	Species	Source
129813-66-7	Hydrocarbons, C10-C13, n-alkanes, <2% aromatics	144,3	calculated	Other company data (
67-56-1	methanol	1	Cyprinus carpio	Comparative Biochemi

12.4. Mobility in soil

The product has not been tested.

12.5. Results of PBT and vPvB assessment

The substances in the mixture do not meet the PBT/vPvB criteria according to UK REACH.

The product has not been tested.

12.6. Endocrine disrupting properties

This product does not contain a substance that has endocrine disrupting properties with respect to non-target organisms as no components meets the criteria.

12.7. Other adverse effects

No information available.

Further information

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil.

SECTION 13: Disposal considerations**13.1. Waste treatment methods****Disposal recommendations**

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil. Dispose of waste according to applicable legislation.

List of Wastes Code - residues/unused products

070704 WASTES FROM ORGANIC CHEMICAL PROCESSES; wastes from the MFSU of fine chemicals and chemical products not otherwise specified; other organic solvents, washing liquids and mother liquors; hazardous waste

List of Wastes Code - used product

070704 WASTES FROM ORGANIC CHEMICAL PROCESSES; wastes from the MFSU of fine chemicals and chemical products not otherwise specified; other organic solvents, washing liquids and mother liquors; hazardous waste



Safety Data Sheet

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 11 of 14

List of Wastes Code - contaminated packaging

150110 WASTE PACKAGING; ABSORBENTS, WIPING CLOTHS, FILTER MATERIALS AND PROTECTIVE CLOTHING NOT OTHERWISE SPECIFIED; packaging (including separately collected municipal packaging waste); packaging containing residues of or contaminated by hazardous substances; hazardous waste

Contaminated packaging

Hazardous waste according to Directive 2008/98/EC (waste framework directive). Handle contaminated packages in the same way as the substance itself.

SECTION 14: Transport information

Land transport (ADR/RID)

14.1. UN number or ID number: UN 1993
14.2. UN proper shipping name: FLAMMABLE LIQUID, N.O.S. (tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane; Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics)
14.3. Transport hazard class(es): 3
14.4. Packing group: II
Hazard label: 3
Classification code: F1
Special Provisions: 274 601 640C
Limited quantity: 1 L
Excepted quantity: E2
Transport category: 2
Hazard No: 33
Tunnel restriction code: D/E

Inland waterways transport (ADN)

14.1. UN number or ID number: UN 1993
14.2. UN proper shipping name: FLAMMABLE LIQUID, N.O.S. (tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane; Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics)
14.3. Transport hazard class(es): 3
14.4. Packing group: II
Hazard label: 3
Classification code: F1
Special Provisions: 274 601 640C
Limited quantity: 1 L
Excepted quantity: E2

Marine transport (IMDG)

14.1. UN number or ID number: UN 1993
14.2. UN proper shipping name: FLAMMABLE LIQUID, N.O.S. (tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane; Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics)
14.3. Transport hazard class(es): 3
14.4. Packing group: II
Hazard label: 3
Marine pollutant: no
Special Provisions: 274
Limited quantity: 1 L
Excepted quantity: E2
EmS: F-E, S-E

Air transport (ICAO-TI/IATA-DGR)

14.1. UN number or ID number: UN 1993



Safety Data Sheet

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 12 of 14

14.2. UN proper shipping name:	FLAMMABLE LIQUID, N.O.S. (tert-butyl methyl ether; MTBE; 2-methoxy-2-methylpropane; Hydrocarbons, C9-C10, n-alkanes, isoalkanes, cyclenes, <2% aromatics)
14.3. Transport hazard class(es):	3
14.4. Packing group:	II
Hazard label:	3
Special Provisions:	A3
Limited quantity Passenger:	1 L
Passenger LQ:	Y341
Excepted quantity:	E2
IATA-packing instructions - Passenger:	353
IATA-max. quantity - Passenger:	5 L
IATA-packing instructions - Cargo:	364
IATA-max. quantity - Cargo:	60 L

14.5. Environmental hazards

ENVIRONMENTALLY HAZARDOUS: No

14.6. Special precautions for user

Warning: Combustible liquid.

14.7. Maritime transport in bulk according to IMO instruments

not applicable

Other applicable information

Hazchem code: •3YE

SECTION 15: Regulatory information

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

EU regulatory information

Restrictions on use (REACH, annex XVII):

Entry 3, Entry 28, Entry 40, Entry 75

Directive 2010/75/EU on industrial emissions: No information available.

Directive 2004/42/EC on VOC in paints and varnishes: No information available.

Information according to Directive 2012/18/EU (SEVESO III): P5c FLAMMABLE LIQUIDS

Additional information

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH)

National regulatory information

Employment restrictions: Observe restrictions to employment for juveniles according to the 'juvenile work protection guideline' (94/33/EC).

Water hazard class (D): 2 - obviously hazardous to water

15.2. Chemical safety assessment

Chemical safety assessments for substances in this mixture were not carried out.

SECTION 16: Other information

Changes

This data sheet contains changes from the previous version in section(s): 2,9,11,14.



Safety Data Sheet

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 13 of 14

Abbreviations and acronyms

Flam. Liq: Flammable liquids
Acute Tox: Acute toxicity
Asp. Tox: Aspiration hazard
Skin Irrit: Skin irritation
Eye Irrit: Eye irritation
STOT SE: Specific target organ toxicity - single exposure
Aquatic Chronic: Chronic aquatic hazard
CLP: Classification, labelling and Packaging
REACH: Registration, Evaluation and Authorization of Chemicals
GHS: Globally Harmonised System of Classification, Labelling and Packaging of Chemicals
UN: United Nations
CAS: Chemical Abstracts Service
DNEL: Derived No Effect Level
DMEL: Derived Minimal Effect Level
PNEC: Predicted No Effect Concentration
ATE: Acute toxicity estimate
LC50: Lethal concentration, 50%
LD50: Lethal dose, 50%
LL50: Lethal loading, 50%
EL50: Effect loading, 50%
EC50: Effective Concentration 50%
ErC50: Effective Concentration 50%, growth rate
NOEC: No Observed Effect Concentration
BCF: Bio-concentration factor
PBT: persistent, bioaccumulative, toxic
vPvB: very persistent, very bioaccumulative
ADR: Accord européen sur le transport des marchandises dangereuses par Route
(European Agreement concerning the International Carriage of Dangerous Goods by Road)
RID: Regulations concerning the international carriage of dangerous goods by rail
ADN: European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways
(Accord européen relatif au transport international des marchandises dangereuses par voies de navigation intérieures)
IMDG: International Maritime Code for Dangerous Goods
EmS: Emergency Schedules
MFAG: Medical First Aid Guide
IATA: International Air Transport Association
ICAO: International Civil Aviation Organization
MARPOL: International Convention for the Prevention of Marine Pollution from Ships
IBC: Intermediate Bulk Container
SVHC: Substance of Very High Concern
For abbreviations and acronyms, see: ECHA Guidance on information requirements and chemical safety assessment, chapter R.20 (Table of terms and abbreviations).

Classification for mixtures and used evaluation method according to GB CLP Regulation

Classification	Classification procedure
Flam. Liq. 2; H225	On basis of test data
Asp. Tox. 1; H304	Calculation method
Skin Irrit. 2; H315	Calculation method
STOT SE 3; H336	Calculation method
Aquatic Chronic 3; H412	Calculation method

Relevant H and EUH statements (number and full text)

H225 Highly flammable liquid and vapour.
H226 Flammable liquid and vapour.

**Safety Data Sheet**

according to UK REACH Regulation

979 Injektor Direkt-Reiniger 300 ml B1

Revision date: 24.10.2023

Product code: 1107500

Page 14 of 14

H301	Toxic if swallowed.
H304	May be fatal if swallowed and enters airways.
H311	Toxic in contact with skin.
H315	Causes skin irritation.
H319	Causes serious eye irritation.
H331	Toxic if inhaled.
H336	May cause drowsiness or dizziness.
H370	Causes damage to organs.
H411	Toxic to aquatic life with long lasting effects.
H412	Harmful to aquatic life with long lasting effects.
EUH066	Repeated exposure may cause skin dryness or cracking.

Further Information

The information is based on the present level of our knowledge. It does not, however, give assurance of product properties and establishes no contract legal rights. The receiver of our product is singularly responsible for adhering to existing laws and regulations.

(The data for the relevant ingredients were taken respectively from the last version of the sub-contractor's safety data sheet.)