Safety Data Sheet

EFAmetal EFAspray 0790

Replaces date: 04/01/2022

Revision date: 16/02/2022
Version: 22.0.0

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

1.1. Product identifier

Trade name: EFAmetal EFAspray 0790

Unique Formula Identifier (UFI): 9U52-80HQ-2004-EFH4

Article no

Article no	Description
0790	

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

Recommended uses: Coating of metal.

Inadvisable uses: The product is recommended for only the above described uses.

1.3. Details of the supplier of the safety data sheet

Supplier

Company:	EFApaint A/S
Address:	Energivej 13
Zip code:	DK-6700
City:	Esbjerg
Country:	DENMARK
E-mail:	info@efapaint.dk
Phone:	0045 75 12 86 00
Fax:	0045 75 45 33 68
Homepage:	www.efapaint.dk

1.4. Emergency Telephone Number

GB: +44 1215074123 (Advice and guidance) (Around the clock)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

CLP-classification: Aerosol 1;H222 Aerosol 2;H229 Eye Irrit. 2;H319 STOT SE 3;H336 Aquatic Chronic 3;H412

Most serious harmful effects: Extremely flammable aerosol. Pressurised container: May burst if heated. Causes serious eye irritation. May cause drowsiness or dizziness. Harmful to aquatic life with long lasting effects.

2.2. Label elements

Pictograms

Signal word: Danger

Contains

Substance: acetone; n-butyl acetate;

Hazard Statements

H222	Extremely flammable aerosol.
H229	Pressurised container: May burst if heated.
H319	Causes serious eye 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.
P211	Do not spray on an open flame or other ignition source.
P251	Do not pierce or burn, even after use.
P410+412	Protect from sunlight. Do no expose to temperatures exceeding 50 °C/122°F.
P261	Avoid breathing vapours/spray.
P280	Wear protective gloves/eye protection/face protection.
P501	Dispose of contents/container in accordance to local regulations.

Supplemental information

EUH066	Repeated exposure may cause skin dryness or cracking.
EUH211	Warning! Hazardous respirable droplets may be formed when sprayed. Do not breathe spray or mist.
EUH208	Contains maleic anhydride. May produce an allergic reaction.

2.3. Other hazards

The product does not contain any endocrine disruptors, PBT or vPvB substances.

SECTION 3: Composition/information on ingredients

3.2. Mixtures

Substance	CAS No./ EC No./ REACH Reg. No.	Concentration	Notes	CLP-classification
acetone	67-64-1 200-662-2 01-2119471330-49	25 - 50 %		Flam. Liq. 2;H225 Eye Irrit. 2;H319 STOT SE 3;H336 EUH066
n-butyl acetate	123-86-4 204-658-1 01-2119485493-29	10 - 25 %		Flam. Liq. 3;H226 STOT SE 3;H336 EUH066 LC50 (dust/mist) (Acute toxicity - inhalation): 23.4 mg/l LD50 (Acute toxicity - dermal): > 14112 mg/kg bw LD50 (Acute toxicity - oral): 10760 mg/kg bw

propane	74-98-6 200-827-9 01-2119486944-21	10 - 25 %		Flam. Gas 1A;H220
butane	106-97-8 203-448-7 01-2119474691-32	2.5 - 10 %		Flam. Gas 1A;H220
Kerosine - unspecified, Solvent naphtha (petroleum), heavy arom.	918-811-1 01-2119463583-34	2.5 - 10 %		Asp. Tox. 1;H304 STOT SE 3;H336 Aquatic Chronic 2;H411 EUH066 LD50 (Acute toxicity - dermal): > 2000 mg/kg bw LD50 (Acute toxicity - oral): > 6318 mg/kg bw LC50 (dust/mist) (Acute toxicity - inhalation): > 4.688 mg/l
Hydrocarbons, C9-C10, n-alkanes, isoalkanes, Cyclener, <2% Aromatics	927-241-2 01-2119471843-32	2.5 - 10 %		Flam. Liq. 3;H226 Asp. Tox. 1;H304 STOT SE 3;H336 Aquatic Chronic 3;H412 LC50 (vapour) (Acute toxicity - inhalation): > 4.951 mg/l LD50 (Acute toxicity - dermal): > 5000 mg/kg bw LD50 (Acute toxicity - oral): > 5000 mg/kg bw
Solvent naphtha (petroleum), light arom.	64742-95-6 918-668-5 01-2119455851-35	< 2.5 %		Flam. Liq. 3;H226 Asp. Tox. 1;H304 STOT SE 3;H335 STOT SE 3;H336 Aquatic Chronic 2;H411 EUH066 LD50 (Acute toxicity - dermal): 3160 mg/kg bw LD50 (Acute toxicity - oral): 3492 mg/kg bw
propan-2-ol	67-63-0 200-661-7 01-2119457558-25	< 2.5 %		Flam. Liq. 2;H225 Eye Irrit. 2;H319 STOT SE 3;H336 LC50 (vapour) (Acute toxicity - inhalation): > 25 mg/l LD50 (Acute toxicity - oral): 5840 mg/kg bw LD50 (Acute toxicity - dermal): 13900 mg/kg bw
maleic anhydride	108-31-6 203-571-6 01-2119472428-31	< 0.001 %		Acute Tox. 4;H302 Skin Corr. 1B;H314 Skin Sens. 1A;H317 Eye Dam. 1;H318 Resp. Sens. 1;H334 STOT RE 1;H372 (Respiratory system.) (Inhalation.) EUH071 C ≥ 0.001%: Skin Sens. 1A;H317 LD50 (Acute toxicity - dermal): 2620 mg/kg bw LD50 (Acute toxicity - oral): 1090 mg/kg bw

Please see section 16 for the full text of H- / EUH-phrases..

Ingredient comments: The CLP Annex VI classification of Titanium dioxide (CAS 13463-67-7) does not apply to this mixture according to CLP Annex VI Note 10.

SECTION 4: First aid measures

4.1. Description of first aid measures

Inhalation: If patient feels unwell move to fresh air and keep under surveillance. If the victim is unconscious, ascertain whether the victim is breathing. If breathing has stopped, apply artificial respiration. If the victim is unconscious but breathing, place in the recovery position and keep warm with blankets. Call for medical attention or ambulance.

Ingestion:	Do not induce vomiting. If vomiting occurs, the head should be kept low so that stomach vomit doesn´t enter the lungs. Get medical attention immediately!
Skin contact:	Promptly wash contaminated skin with soap or mild detergent and water. Promptly remove clothing if soaked through and wash as above. Do not use solvents.
Eye contact:	Flush immediately with lukewarm water (preferably using eye wash equipment) for at least 15 minutes. Open eye wide. Remove any contact lenses. Seek medical advice.
General:	If in doubt, seek medical advice. Also see para. 1

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

Pain in the eyes, redness, tears, swollen eyelids, itching Headache, dizziness, drowsiness and nausea.

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

Seek medical advice in case of discomfort. Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media:	Fire can be extinguished with carbon dioxide, powder, foam or water spray.
Unsuitable extinguishing media:	Do not use a direct water jet that could spread the fire.

5.2. Special hazards arising from the substance or mixture

Avoid inhaling of waste gases. Combustion will generate harmful gases, as combustion residues and carbon monoxide.

5.3. Advice for firefighters

Cool closed containers with water. Fire will produce a thick black smoke. Products of combustion are harmful and respiratory protection is required.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

For non-emergency personnel:	Avoid inhalation of vapours. Remove all ignition sources and ensure sufficient ventilation.
For emergency responders:	Use nitrile protection gloves and self-contained breathing apparatus.

6.2. Environmental precautions

Notify proper authorities in case of contamination of soil or aquatic environment or discharge to drains.

6.3. Methods and material for containment and cleaning up

Prevent major quantities of spillage from being discharged into the sewage system or water by banking the spillage with sand or the like and collecting it. Clean the contaminated area with a suitable cleaning agent, but do not use solvent.

6.4. Reference to other sections

Also see item 8 and 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

The product may be charged electrostatically. Always use underground wire when transferring from one container to another. Personnel should wear antistatic shoes and clothing. Floors should be conductive. Do not use tools which may produce sparks. Avoid contact with eyes and skin. Avoid inhaling vapors and spray mists. Vapors may form explosive mixtures with air. Prevent the formation of flammable or explosive mixtures. Do not use this material near naked flames or any other ignition source.

Electrical installations must be protected according to regulations.

7.2. Conditions for safe storage, including any incompatibilities

The product must be kept away from children. Store in a tightly closed container and in accordance with the current regulations in a dry and well-ventilated place away from food. Keep away from ignition sources, oxidizing agents and strong acidic and basic substances. No smoking and use of open fire. No admittance to unauthorized persons. Opened containers must be carefully closed and stored upright to prevent any leakage.

7.3. Specific end use(s)

Applications is mentioned in item 1.2.

Other Information: Personal protective equipment: Refer to section 8.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Occupational exposure limit

Substance name	Time period	ppm	mg/m³	fiber/cm3	Remarks	Comments
acetone	8h	500	1210			
acetone	15m	1500	3620			
n-butyl acetate	8h	150	724			
n-butyl acetate	15m	200	966			
butane	8h	600	1450			
butane	15m	750	1.810			
propan-2-ol	15m	500	1250			
propan-2-ol	8h	400	999			
maleic anhydride	8h		1			Sen
maleic anhydride	15m		3			Sen

Sen = Capable of causing occupational asthma.

Occupational exposure limit: The occupational exposure limit value for Titanium dioxide applies only to dusty products.

Legal basis: EH40/2005 Workplace exposure limits incl. supplement from October 2007.

PNEC

acetone, cas-no 67-64-1				
Exposure	Value	Assessment Factor	Extrapolation Method	Note
Freshwater	10,6 mg/l			
Soil	33,3 mg/l			
Marine water	1,06 mg/l			
n-butyl acetate, cas-no 123-86-4				
Exposure	Value	Assessment Factor	Extrapolation Method	Note
Freshwater - sediment	0,981 mg/kg			
Marine water - sediment	0,0981 mg/kg			
Soil	0,0903 mg/kg			
Marine water	0,018 mg/l			
Freshwater	0,18 mg/l			
propan-2-ol, cas-no 67-63-0				
Exposure	Value	Assessment Factor	Extrapolation Method	Note
Soil	28 mg/kg			

Freshwater	140,9 mg/l			
Marine water	140,9 mg/l			

maleic anhydride, cas-no 108-31-6

Exposure	Value	Assessment Factor	Extrapolation Method	Note
Freshwater	0,04281 mg/l			
Marine water	0,004281 mg/l			
Soil	0,0415 mg/l			
Freshwater - sediment	0,334 mg/kg			
Marine water - sediment	0,0334 mg/kg			

DNEL - workers

acetone, cas-no 67-64-1

Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Inhalation	1210 mg/m3	Long-term exposure			
Inhalation	2420 mg/m3	Acute / short-term exposure			
Dermal	186 mg/kg	Long-term exposure			

n-butyl acetate, cas-no 123-86-4

Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Dermal	7 ng/kg bw/day	Long-term exposure		Systemic effects	
Inhalation	960 mg/m³	Acute / short-term exposure		Local effects	
Inhalation	480 mg/m3	Long-term exposure		Systemic effects	
Inhalation	480 mg/m³	Long-term exposure		Local effects	
Inhalation	960 mg/m3	Acute / short-term exposure		Systemic effects	

Kerosine - unspecified, Solvent naphtha (petroleum), heavy arom., EC-no 918-811-1

Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Dermal	12,5 mg/kg bw/day	Long-term exposure		Systemic effects	
Inhalation	151 mg/m3	Long-term exposure		Systemic effects	

Hydrocarbons, C9-C10, n-alkanes, isoalkanes, Cyclener, <2% Aromatics, EC-no 927-241-2

Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Inhalation	871 mg/m3	Long-term exposure		Systemic effects	
Dermal	208 mg/kg bw/day	Long-term exposure		Systemic effects	

Solvent naphtha (petroleum), light arom., cas-no 64742-95-6

Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Dermal	25 mg/kg bw/day	Long-term exposure		Systemic effects	
Inhalation	100 mg/m3	Long-term exposure		Systemic effects	

propan-2-ol, cas-no 67-63-0

Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Dermal	888 mg/kg bw/day	Long-term exposure		Systemic effects	
Inhalation	500 mg/m3	Long-term exposure		Systemic effects	

maleic anhydride, cas-no 108-31-6

Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Inhalation	0,8 mg/m3	Acute / short-term exposure		Systemic effects	

Dermal	0,04 mg/kg	Acute / short-term exposure		Systemic effects	
Inhalation	0,4 mg/m3	Long-term exposure		Systemic effects	

DNEL - general population

Kerosine - unspecified, Solvent naphtha (petroleum), heavy arom., EC-no 918-811-1					
Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Dermal	7,5 mg/kg bw/day	Long-term exposure		Systemic effects	
Inhalation	32 mg/m3	Long-term exposure		Systemic effects	
Oral	7,5 mg/kg bw/day	Long-term exposure		Systemic effects	
Hydrocarbons, C9-C10, n-alkanes, isoalkanes, Cyclener, <2% Aromatics, EC-no 927-241-2					
Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Dermal	125 mg/kg bw/day	Long-term exposure		Systemic effects	
Oral	125 mg/kg bw/day	Long-term exposure		Systemic effects	
Inhalation	185 mg/m3	Long-term exposure		Systemic effects	
propan-2-ol, cas-no 67-63-0					
Exposure	Value	Assessment Factor	Dose Descriptor	Main Impact Parameter	Note
Dermal	319 mg/kg bw/day	Long-term exposure		Systemic effects	
Inhalation	89 mg/m3	Long-term exposure		Systemic effects	
Oral	26 mg/kg	Long-term exposure		Systemic effects	

Biological threshold values: See above.

Other Information: See above.

8.2. Exposure controls

Appropriate engineering controls: All work must be planned with a view to limit the breathing of fumes and the exposure to the skin. Work under effective process ventilation (e.g. local exhaust ventilation). If this is not possible, use respiratory protection.

Personal protective equipment, eye/face protection: Use suitable protective goggles or full face mask for protection against splashes.

Personal protective equipment, skin protection: If possible, wear special work clothes. When spraying wear coveralls.

Personal protective equipment, hand protection: Use Barrier protection gloves. Break-through time is >8 hours. Use a disposable glove over the Barrier glove to enhance the feel. Follow the glove manufacturer's recommendations on use and replacement.

Personal protective equipment, respiratory protection: Use compressed-air full face mask.

Environmental exposure controls: It must be ensured that local regulations for discharge are met.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Parameter	Value/unit
State	Liquid
Colour	Different
Odour	Odour of organic solvent.
Solubility	Soluble in: Organic solvents.

Parameter	Value/unit	Remarks

Odour threshold	No data	
Melting point	No data	
Freezing point	No data	
Initial boiling point and boiling range	No data	
Flammability (solid, gas)	No data	
Flammability limits	No data	
Explosion limits	0.5 - 13 vol%	
Flash Point	< 21 °C	
Auto-ignition temperature	No data	
Decomposition temperature	No data	
pH (solution for use)		Irrelevant
pH (concentrate)		Irrelevant
Kinematic viscosity	No data	
Viscosity	No data	
Partition coefficient n-octonol/water	No data	
Vapour pressure	No data	
Density	0.9 kg/l	
Relative density	No data	
Vapour density	No data	
Relative density (sat. air)	No data	
Particle characteristics	No data	

9.2. Other information

Parameter	Value/unit	Remarks
Explosive properties		See explosive limits
Oxidising properties		No information available
Fire class	I-1	
Weight % organic solvents:	51	
VOC (G/liter)	456	

Other Information: Solubility in water: Insoluble in water. Fat solubility: irrelevant

SECTION 10: Stability and reactivity

10.1. Reactivity

See below.

10.2. Chemical stability

Stable under recommended storage and handling conditions.

10.3. Possibility of hazardous reactions

Ignitable at temperatures above the flash point. The fumes can ignite by e.g. a spark, a warm surface or a glow. The fumes can mix to explosive mixtures with air. At room temperature the fumes are more heavily than air and can spread along the floor.

10.4. Conditions to avoid

Stable at normal temperature. When exposed to high temperatures, toxic decomposition products may be formed.

10.5. Incompatible materials

To prevent heat-generating reactions, keep the product away from oxidizing agents and strong acidic and basic substances.

10.6. Hazardous decomposition products

carbon monoxide.

SECTION 11: Toxicological information

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

Acute toxicity - oral

acetone, cas-no 67-64-1

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LD50		5800 mg/kg		OECD 401	

n-butyl acetate, cas-no 123-86-4

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LD50		10760 mg/kg bw		OECD 423	

Kerosine - unspecified, Solvent naphtha (petroleum), heavy arom., EC-no 918-811-1

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LD50		> 6318 mg/kg bw		OECD 401	

Hydrocarbons, C9-C10, n-alkanes, isoalkanes, Cyclener, <2% Aromatics, EC-no 927-241-2

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LD50		> 5000 mg/kg bw			

Solvent naphtha (petroleum), light arom., cas-no 64742-95-6

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LD50		3492 mg/kg bw		OECD 401	

propan-2-ol, cas-no 67-63-0

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LD50		5840 mg/kg bw		OECD 401	

maleic anhydride, cas-no 108-31-6

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LD50		1090 mg/kg bw		OECD 401	

Ingestion of large quantities may cause gastrointestinal disorders.

Acute toxicity - dermal

acetone, cas-no 67-64-1

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LD50		> 15800 mg/kg			

n-butyl acetate, cas-no 123-86-4

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rabbit	LD50		> 14112 mg/kg bw		OECD 402	

Kerosine - unspecified, Solvent naphtha (petroleum), heavy arom., EC-no 918-811-1

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rabbit	LD50		> 2000 mg/kg bw		OECD 402	

Hydrocarbons, C9-C10, n-alkanes, isoalkanes, Cyclener, <2% Aromatics, EC-no 927-241-2

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rabbit	LD50		> 5000 mg/kg bw			

Solvent naphtha (petroleum), light arom., cas-no 64742-95-6

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rabbit	LD50		3160 mg/kg bw		OECD 402	

propan-2-ol, cas-no 67-63-0

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rabbit	LD50		13900 mg/kg bw		OECD 402	

maleic anhydride, cas-no 108-31-6

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rabbit	LD50		2620 mg/kg bw		OECD 402	

Organic solvents may be absorbed through skin. Organic solvents have a degreasing effect on the skin.

Acute toxicity - inhalation

acetone, cas-no 67-64-1

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LC50	4 h	76 mg/l			

n-butyl acetate, cas-no 123-86-4

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LC50 (dust/mist)	4 h	23.4 mg/l		OECD 403	

Kerosine - unspecified, Solvent naphtha (petroleum), heavy arom., EC-no 918-811-1

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LC50 (dust/mist)		> 4.688 mg/l		OECD 403	

Hydrocarbons, C9-C10, n-alkanes, isoalkanes, Cyclener, <2% Aromatics, EC-no 927-241-2

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LC50 (vapour)	4 h	> 4.951 mg/l			

Solvent naphtha (petroleum), light arom., cas-no 64742-95-6

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LC50 (vapour)		> 6.193 mg/l		OECD 403	

propan-2-ol, cas-no 67-63-0

Organism	Test Type	Exposure time	Value	Conclusion	Test method	Source
Rat	LC50 (vapour)	6 h	> 25 mg/l		OECD 403	

Protracted inhalation in high concentrations may cause permanent damage to the central nervous system. Inhalation of vapors may cause symptoms of poisoning such as memory and concentration difficulties, abnormal tiredness, irritability and, in extreme cases, unconsciousness.

Skin corrosion/irritation: Repeated exposure may cause skin dryness or cracking.

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

Respiratory sensitisation or skin sensitisation: No known hazards.

Germ cell mutagenicity: Would not be expected germ cell mutagen

Carcinogenic properties: Not expected to cause cancer.

Reproductive toxicity: Would not be expected to be a reproductive toxicant.

Single STOT exposure: May cause drowsiness or dizziness.

Repeated STOT exposure: No known hazards.

Aspiration hazard: No known hazards.

11.2. Information on other hazards

Endocrine disrupting properties: No known information.

SECTION 12: Ecological information

12.1. Toxicity

acetone, cas-no 67-64-1

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
Acute daphnia	Daphnia magna	48 h	EC50	8800 mg/l			
Acute fish	Onchorhynchus mykiss	96 h	LC50	5540 mg/l			

n-butyl acetate, cas-no 123-86-4

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
Acute daphnia	Daphnia magna	48 h	EC50	44 mg/l			
Acute algae		72 h	EC50	647.7 mg/l			
Acute fish	Pimephales promelas	96 h	EC50	44 mg/l		OECD 203	

Kerosine - unspecified, Solvent naphtha (petroleum), heavy arom., EC-no 918-811-1

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
Acute Daphnia	Daphnia magna	48 h	EL50	3 - 10 mg/l			
Acute algae	Pseudokirchneriella subcapitata	72 h	NOELR	2.5 mg/l			
Acute algae	Pseudokirchneriella subcapitata	72 h	EL50	11 mg/l			
Acute fish	Onchorhynchus mykiss	96 h	LL50	2 - 5 mg/l			

Hydrocarbons, C9-C10, n-alkanes, isoalkanes, Cyclener, <2% Aromatics, EC-no 927-241-2

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
Acute daphnia	Daphnia magna	48 h	EL50	22 - 46 mg/l			
Acute algae	Pseudokirchneriella subcapitata	72 h	NOELR	< 1 mg/l			
Acute algae	Pseudokirchneriella subcapitata	72 h	EL50	> 1000 mg/l			
Acute fish	Onchorhynchus mykiss	96 h	LL50	10 - 30 mg/l			

Solvent naphtha (petroleum), light arom., cas-no 64742-95-6

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
Acute Daphnia		48 h	EC50	32 mg/l			

propan-2-ol, cas-no 67-63-0

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
Acute fish	Pimephales promelas	96 h	LC50	9640 mg/l		OECD 203	
Acute Daphnia	Daphnia magna	24 h	LC50	9714 mg/l		#Not translated#	
Acute algae	Scenedesmus subspicatus	72 h	EC50	> 100 mg/l			

maleic anhydride, cas-no 108-31-6

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
Acute Daphnia	Daphnia magna	48 h		42.81 mg/l		OECD 202	

12.2. Persistence and degradability

n-butyl acetate, cas-no 123-86-4

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
		28 d	BOD	83 %		BOD:ThOD	

Kerosine - unspecified, Solvent naphtha (petroleum), heavy arom., EC-no 918-811-1

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
		28 d		50 %			

Hydrocarbons, C9-C10, n-alkanes, isoalkanes, Cyclener, <2% Aromatics, EC-no 927-241-2

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
		28 d		89 %			

propan-2-ol, cas-no 67-63-0

Organism	Species	Exposure time	Test Type	Value	Conclusion	Test method	Source
		5 d		53 %			

No information available

12.3. Bioaccumulative potential

No information available

12.4. Mobility in soil

The product is insoluble in water and will spread out on the surface.

12.5. Results of PBT and vPvB assessment

The product does not contain any PBT or vPvB substances.

12.6. Endocrine disrupting properties

No known information.

12.7. Other adverse effects

No information available

Other Information

Do not dispose of this product in drains, watercourses, or on the ground. This product is classified as hazardous to the environment according to the calculation method. Please see par. 2 and 3 for further information.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Avoid discharge to drain or surface water.

Product residues are classified as chemical waste.

Category of waste: Waste-code: 16 05 04

SECTION 14: Transport information

Land transport (ADR/RID)

14.1. UN number or ID number: 1950

14.2. UN proper shipping name: AEROSOLS

14.3. Transport hazard class(es): 2.1

Hazard label(s): 2.1

14.4. Packing group:

14.5. Environmental hazards: The product should not be labelled as an environmental hazard (symbol: fish and tree).

Hazard identification number:

Tunnel restriction code: D

Inland water ways transport (ADN)

14.1. UN number or ID number:	1950	**14.4. Packing group:**	
14.2. UN proper shipping name:	AEROSOLS	**14.5. Environmental hazards:**	The product should not be labelled as an environmental hazard (symbol: fish and tree).
14.3. Transport hazard class(es):	2.1		
Hazard label(s):	2.1		
Transport in tank vessels:			

Sea transport (IMDG)

14.1. UN number or ID number:	1950	**14.4. Packing group:**	
14.2. UN proper shipping name:	AEROSOLS	**14.5. Environmental hazards:**	The product is not a Marine Pollutant (MP).
14.3. Transport hazard class(es):	2.1	**Environmental Hazardous Substance Name(s):**	
Hazard label(s):	2.1		
EmS:	F-D, S-U	**IMDG Code segregation group:**	- None -

Air transport (ICAO-TI / IATA-DGR)

14.1. UN number or ID number:	1950	**14.4. Packing group:**	
14.2. UN proper shipping name:	AEROSOLS, FLAMMABLE	**14.5. Environmental hazards:**	The product should not be labelled as an environmental hazard (symbol: fish and tree).
14.3. Transport hazard class(es):	2.1		
Hazard label(s):	2.1		

14.6. Special precautions for user

Irrelevant.

14.7. Maritime transport in bulk according to IMO instruments

Irrelevant.

SECTION 15: Regulatory information

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

15.2. Chemical Safety Assessment

Other Information: Chemical safety assessment has not been performed.

SECTION 16: Other information

Version history and indication of changes

Version	Revision date	Responsible	Changes
22.0.0	16/02/2022	GK	8
21.0.0	04/01/2022	GK	1, 2, 3, 9
20.0.0	13/09/2021	GK	3, 9, 11, 12
19.0.0	15/06/2021	GK	1, 2, 3, 7, 8, 9, 11
18.0.0	28/04/2020	GK	2, 3, 8, 9, 11, 12, 14

Safety Data Sheet

EFAmetal EFAspray 0790

Replaces date: 04/01/2022

Revision date: 16/02/2022
Version: 22.0.0

Abbreviations: DNEL: Derived No Effect Level. PNEC: Predicted No Effect Concentration.

References to literature and data sources: REACH: REGULATION OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals. CLP: REGULATION OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL on classification, labelling and packaging of substances and mixtures.

Other Information: The information in this Material Safety Data Sheet is based upon our knowledge and on European Union legislation. The user's working conditions are outside our control. It is the responsibility of the users to fulfil the requirements set by National Legislation. The information is no guarantee of the properties of the product. The Material Safety Data Sheet may only be reproduced with the permission of the manufacturer.

Training advice: The instructions in this Material Safety Data Sheet are given on the assumption that the product is used as stated in item 1. Restrictions of use and special training requirements must also be complied with. The information in this Material Safety Data Sheet should be regarded as a description of the safety issues concerning the product.

List of relevant H-statements

H220	Extremely flammable gas.
H222	Extremely flammable aerosol.
H225	Highly flammable liquid and vapour.
H226	Flammable liquid and vapour.
H229	Pressurised container: May burst if heated.
H302	Harmful if swallowed.
H304	May be fatal if swallowed and enters airways.
H314	Causes severe skin burns and eye damage.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H335	May cause respiratory irritation.
H336	May cause drowsiness or dizziness.
H372	Causes damage to organs through prolonged or repeated exposure. (Respiratory system.) (Inhalation.)
H411	Toxic to aquatic life with long lasting effects.
H412	Harmful to aquatic life with long lasting effects.

List of relevant EUH-statements

EUH066	Repeated exposure may cause skin dryness or cracking.
EUH071	Corrosive to the respiratory tract.
EUH208	Contains maleic anhydride. May produce an allergic reaction.
EUH211	Warning! Hazardous respirable droplets may be formed when sprayed. Do not breathe spray or mist.

Country: GB