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

· 1.1 Product identifier

· Trade name: CUTTING OIL

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

No further relevant information available.

· Sector of Use

SU22 Professional uses: Public domain (administration, education, entertainment, services, craftsmen)

SU3 Industrial uses: Uses of substances as such or in preparations at industrial sites

SU21 Consumer uses: Private households / general public / consumers

· Product category PC24 Lubricants, greases, release products

· Process category

PROC11 Non industrial spraying

PROC7 Industrial spraying

- · Application of the substance / the mixture Lubricant
- · 1.3 Details of the supplier of the safety data sheet
- · Manufacturer/Supplier:
- · A.M.P.E.R.E. SYSTEM
- · 3 Rue Antoine Balard P.A. du Vert Galant
- · 95310 Saint-Ouen-l'Aumône France
- · Tel: +33 1 34 64 72 72 · Fax: +33 1 30 37 55 17
- · E-mail: fds@amperesystem.com
- · 1.4 Emergency telephone number: 0344 892 0111

## **SECTION 2: Hazards identification**

- 2.1 Classification of the substance or mixture
- · Classification according to Regulation (EC) No 1272/2008



GHS02 flame

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



GHS09 environment

Aquatic Chronic 2 H411 Toxic to aquatic life with long lasting effects.

- · 2.2 Label elements
- Labelling according to Regulation (EC) No 1272/2008

The product is classified and labelled according to the CLP regulation.

· Hazard pictograms





GHS02

GHS09

- · Signal word Danger
- · Hazard statements

H222-H229 Extremely flammable aerosol. Pressurised container: May burst if heated.

H411 Toxic 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.

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P251 D	Oo not pierce or	burn, even	after use.
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P260 Do not breathe spray.

P211 Do not spray on an open flame or other ignition source.

P280 Wear protective gloves / eye protection.

P273 Avoid release to the environment.

P271 Use only outdoors or in a well-ventilated area.

P302+P352 IF ON SKIN: Wash with plenty of soap and water.

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

P403 Store in a well-ventilated place.

P501 Dispose of contents/container in accordance with local/regional/national/international regulations.

- 2.3 Other hazards
- · Results of PBT and vPvB assessment
- · **PBT:** Not applicable.
- · **vPvB:** Not applicable.

## **SECTION 3: Composition/information on ingredients**

- · 3.2 Mixtures
- **Description:** Active substance with propellant

· Dangerous components:		
CAS: 64742-65-0 EINECS: 265-169-7 Reg.nr.: 01-2119471299-27	Distillates (petroleum), solvent-dewaxed heavy paraffinic <0.1% Benzene	25-<50%
<u> </u>	Asp. Tox. 1, H304	10 250/
CAS: 106-97-8	butane (containing < 0.1% butadiene (203-450-8))	10-<25%
EINECS: 203-448-7 Reg.nr.: 01-2119474691-32	Flam. Gas 1, H220; Press. Gas C, H280	
CAS: 74-98-6	propane	2.5-<10%
EINECS: 200-827-9 Reg.nr.: 01-2119486944-21	Flam. Gas 1, H220; Press. Gas C, H280	
CAS: 61788-46-3	Amine, coco akyl	0.1-<1%
EINECS: 262-977-1	STOT RE 2, H373; Asp. Tox. 1, H304; Skin Corr. 1B, H314; Aquatic Acute 1, H400 (M=10); Aquatic Chronic 1, H410 (M=10); Acute Tox. 4, H302; STOT SE 3, H335	

Additional information:

#### **SECTION 4: First aid measures**

- · 4.1 Description of first aid measures
- · After inhalation: Supply fresh air; consult doctor in case of complaints.
- After skin contact: Generally the product does not irritate the skin.
- · After eye contact: Rinse opened eye for several minutes under running water.
- · After swallowing: Do not induce vomiting; call for medical help immediately.
- · 4.2 Most important symptoms and effects, both acute and delayed

No further relevant information available.

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

No further relevant information available.

## **SECTION 5: Firefighting measures**

- · 5.1 Extinguishing media
- · Suitable extinguishing agents:

Water haze

Fire-extinguishing powder

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Carbon dioxide

Alcohol resistant foam

- $\cdot$  For safety reasons unsuitable extinguishing agents: Water with full jet
- 5.2 Special hazards arising from the substance or mixture No further relevant information available.
- · 5.3 Advice for firefighters
- **Protective equipment:** Mount respiratory protective device.

## **SECTION 6: Accidental release measures**

#### • 6.1 Personal precautions, protective equipment and emergency procedures

Wear protective equipment. Keep unprotected persons away.

• 6.2 Environmental precautions:

Do not allow product to reach sewage system or any water course.

Inform respective authorities in case of seepage into water course or sewage system.

Do not allow to enter sewers/ surface or ground water.

· 6.3 Methods and material for containment and cleaning up:

Ensure adequate ventilation.

Do not flush with water or aqueous cleansing agents

· 6.4 Reference to other sections

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

### **SECTION 7: Handling and storage**

· 7.1 Precautions for safe handling

Ensure good ventilation/exhaustion at the workplace.

Open and handle receptacle with care.

· Information about fire - and explosion protection:

Do not spray onto a naked flame or any incandescent material.

Keep ignition sources away - Do not smoke.

Protect against electrostatic charges.

Pressurised container: protect from sunlight and do not expose to temperatures exceeding 50 °C, i.e. electric lights. Do not pierce or burn, even after use.

- · 7.2 Conditions for safe storage, including any incompatibilities
- · Storage:
- · Requirements to be met by storerooms and receptacles:

Store in a cool location.

Observe official regulations on storing packagings with pressurised containers.

· Information about storage in one common storagefacility:

Observe official regulations on storing packagings with pressurised containers.

· Further information about storage conditions:

Keep receptacle tightly sealed.

Do not seal receptacle gas tight.

Store in cool, dry conditions in well sealed receptacles.

Protect from heat and direct sunlight.

· 7.3 Specific end use(s) No further relevant information available.

### **SECTION 8: Exposure controls/personal protection**

· Additional information about design of technical facilities: No further data; see item 7.

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#### · 8.1 Control parameters

Ingredients with limit values that require monitoring at the workplace:

106-97-8 butane (containing < 0.1% butadiene (203-450-8))

WEL Short-term value: 1810 mg/m³, 750 ppm
Long-term value: 1450 mg/m³, 600 ppm
Carc (if more than 0.1% of buta-1.3-diene)

74-98-6 propane

OEL Short-term value: 3600 mg/m³, 2000 ppm
Long-term value: 1800 mg/m³, 1000 ppm

- · Additional information: The lists valid during the making were used as basis.
- · 8.2 Exposure controls
- · Personal protective equipment:
- · General protective and hygienic measures: Wash hands before breaks and at the end of work.
- · Respiratory protection:

In case of brief exposure or low pollution use respiratory filter device. In case of intensive or longer exposure use self-contained respiratory protective device.

Filter AX/P2

Use suitable respiratory protective device in case of insufficient ventilation.

Filter A/P2

### · Protection of hands:

Solvent resistant gloves

Wear gloves for the protection against chemicals according to EN 374

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

### · Material of gloves

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

Nitrile rubber, NBR

Recommended thickness of the material:  $\geq 0.5$  mm

### · Penetration time of glove material

For continuous contact we recommend gloves with breakthrough time of at least 240 minutes, with the preference given to a breakthrough time greater than 480 minutes. For short-term or splash guard we recommend the same. We are aware that suitable gloves that offer this level of protection may not be available. In that case, a shorter breakthrough time are acceptable as long as the procedures governing maintenance and timely replacement are followed. The thickness of the gloves is not a good measure of the resistance of the gloves against a chemical substance, because this depends on the exact composition of the material from which the gloves are made.

The exact break trough time has to be found out by the manufacturer of the protective gloves and has to be observed.

#### Eye protection:

Safety glasses



Tightly sealed goggles

· Body protection: Use protective suit.

### **SECTION 9: Physical and chemical properties**

- 9.1 Information on basic physical and chemical properties
- · General Information
- · Appearance:

Form: Aerosol

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Colour:	According to product specification
· Odour:	Characteristic
· Odour threshold:	Not determined.
· pH-value:	Not determined.
· Change in condition	
Melting point/Melting range:	Undetermined.
Boiling point/Boiling range:	-44 °C
· Flash point:	-97 °C
· Flammability (solid, gaseous):	Not applicable.
· Ignition temperature:	365 °C
Decomposition temperature:	Not determined.
· Self-igniting:	Product is not selfigniting.
Danger of explosion:	Product is not explosive. However, formation of explosive air/vapour mixtures are possible.
· Explosion limits:	
Lower:	1.5 Vol %
Upper:	10.9 Vol %
· Vapour pressure at 20 °C:	2100 hPa
Density at 20 °C:	0.807 g/cm <sup>3</sup>
Relative density	Not determined.
· Vapour density	Not determined.
· Evaporation rate	Not applicable.
Solubility in / Miscibility with	
water:	Not miscible or difficult to mix.
· Partition coefficient (n-octanol/water):	Not determined.
· Viscosity:	
Dynamic:	Not determined.
Kinematic:	Not determined.
· Solvent content:	
Organic solvents:	20.0 %
Solids content:	2.8 %
9.2 Other information	No further relevant information available.

## **SECTION 10: Stability and reactivity**

- 10.1 Reactivity No further relevant information available.
- · 10.2 Chemical stability
- Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.
- 10.3 Possibility of hazardous reactions No dangerous reactions known.
- 10.4 Conditions to avoid No further relevant information available.
- $\cdot$  10.5 Incompatible materials: No further relevant information available.
- 10.6 Hazardous decomposition products: No dangerous decomposition products known.

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## **SECTION 11: Toxicological information**

- · 11.1 Information on toxicological effects
- · Acute toxicity

· LD/LC50	LD/LC50 values relevant for classification:		
64742-65-	64742-65-0 Distillates (petroleum), solvent-dewaxed heavy paraffinic <0.1% Benzene		
Oral	LD50	>5000 mg/kg (rat)	
Dermal	LD50	>5000 mg/kg (rabbit)	
Inhalative	LC50/4h	5.53 mg/l (rat)	
61788-46-3 Amine, coco akyl			
Oral	LD50	500-2000 mg/kg (rat)	

- Primary irritant effect:
- · Skin corrosion/irritation Based on available data, the classification criteria are not met.
- · Serious eye damage/irritation Based on available data, the classification criteria are not met.
- Respiratory or skin sensitisation Based on available data, the classification criteria are not met.
- CMR effects (carcinogenity, mutagenicity and toxicity for reproduction)
- Germ cell mutagenicity Based on available data, the classification criteria are not met.
- · Carcinogenicity Based on available data, the classification criteria are not met.
- Reproductive toxicity Based on available data, the classification criteria are not met.
- STOT-single exposure Based on available data, the classification criteria are not met.
- · STOT-repeated exposure Based on available data, the classification criteria are not met.
- · Aspiration hazard Based on available data, the classification criteria are not met.

### **SECTION 12: Ecological information**

- · 12.1 Toxicity
- · Aquatic toxicity:

### 61788-46-3 Amine, coco akyl

EC50 <1 mg/l (algae)

LC50 <1 mg/l (Daphnia magna)

<1 mg/l (Fish)

- 12.2 Persistence and degradability No further relevant information available.
- 12.3 Bioaccumulative potential No further relevant information available.
- 12.4 Mobility in soil No further relevant information available.
- **Ecotoxical effects:**
- · Remark: Toxic for fish
- Additional ecological information:
- General notes:

Water danger class 3 (German Regulation) (Self-assessment): extremely hazardous for water

Do not allow product to reach ground water, water course or sewage system, even in small quantities.

Danger to drinking water if even extremely small quantities leak into the ground.

Also poisonous for fish and plankton in water bodies.

Toxic for aquatic organisms

- 12.5 Results of PBT and vPvB assessment
- · **PBT:** Not applicable.
- · **vPvB:** Not applicable.
- 12.6 Other adverse effects No further relevant information available.

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## **SECTION 13: Disposal considerations**

- · 13.1 Waste treatment methods
- · Recommendation

Must not be disposed together with household garbage. Do not allow product to reach sewage system.

- · Uncleaned packaging:
- · Recommendation: Disposal must be made according to official regulations.

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	1/1.	Tranchart	information
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· 14.1 UN-Number · ADR, ADN, IMDG, IATA	UN1950
· 14.2 UN proper shipping name	
· ADR, ADN	UN1950 AEROSOLS, ENVIRONMENTALLY
,	HAZARDOUS
· IMDG	AEROSOLS (Amine, coco akyl), MARINE
	POLLUTANT
· IATA	AEROSOLS, flammable
· 14 3 Transport hazard class(es)	

- · 14.3 Transport hazard class(es)
- · ADR





· Class	2	5F Gases.
· Label	2.	1

- $\cdot$  ADN
- · ADN/R Class: 2 5F
- · IMDG





· Class	2.1
· Label	2.1

· IATA



· Class	2.1
· Label	2.1

· 14.4 Packing group · ADR, IMDG, IATA

Void

· 14.5 Environmental hazards:

Product contains environmentally hazardous substances:

Amine, coco akyl

· Special marking (ADR):

· Marine pollutant:

Symbol (fish and tree) Symbol (fish and tree)

· 14.6 Special precautions for user

Warning: Gases.

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Danger code (Kemler):	-	
EMS Number:	F-D,S-U	
· Segregation groups	Alkalis	
· 14.7 Transport in bulk according to Anno	ex II of	
Marpol and the IBC Code	Not applicable.	
Transport/Additional information:		
· ADR		
· Limited quantities (LQ)	1L	
Excepted quantities (EQ)	Code: E0	
	Not permitted as Excepted Quantity	
Transport category	2	
Tunnel restriction code	D	
· IMDG		
Limited quantities (LQ)	1L	
Excepted quantities (EQ)	Code: E0	
_	Not permitted as Excepted Quantity	
· UN "Model Regulation":	UN1950, AEROSOLS, ENVIRONMENTALLY	
<del>-</del>	HAZARDOUS, 2.1	

## **SECTION 15: Regulatory information**

- 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture
- Directive 2012/18/EU
- · Named dangerous substances ANNEX I None of the ingredients is listed.
- · National regulations:
- Technical instructions (air):

Class	Share in %
NK	10-<25

- · VOC-CH 20.00 %
- · VOC-EU 161.4 g/l
- Danish MAL Code 5-3
- · 15.2 Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

#### **SECTION 16: Other information**

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

## $\cdot \ Relevant \ phrases$

H220 Extremely flammable gas.

H280 Contains gas under pressure; may explode if heated.

H302 Harmful if swallowed.

H304 May be fatal if swallowed and enters airways.

H314 Causes severe skin burns and eye damage.

H335 May cause respiratory irritation.

H373 May cause damage to organs through prolonged or repeated exposure.

H400 Very toxic to aquatic life.

H410 Very toxic to aquatic life with long lasting effects.

- $\cdot \ \textbf{Department issuing MSDS:} \ Research \ \& \ Development$
- · Contact: fds@amperesystem.com

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· Abbreviations and acronyms:

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RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)

ICAO: International Civil Aviation Organisation

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

GHS: Globally Harmonised System of Classification and Labelling of Chemicals

EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

MAL-Code: Måleteknisk Arbejdshygiejnisk Luftbehov (Regulation for the labeling concerning inhalation hazards, Denmark)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

PBT: Persistent, Bioaccumulative and Toxic vPvB: very Persistent and very Bioaccumulative

Flam. Gas 1: Flammable gases, Hazard Category 1 Flam. Aerosol 1: Flammable aerosols, Hazard Category 1

Press. Gas C: Gases under pressure: Compressed gas

Acute Tox. 4: Acute toxicity, Hazard Category 4

Skin Corr. 1B: Skin corrosion/irritation, Hazard Category 1B

STOT SE 3: Specific target organ toxicity - Single exposure, Hazard Category 3

STOT RE 2: Specific target organ toxicity - Repeated exposure, Hazard Category 2

Asp. Tox. 1: Aspiration hazard, Hazard Category 1

Aquatic Acute 1: Hazardous to the aquatic environment - AcuteHazard, Category 1

Aquatic Chronic 1: Hazardous to the aquatic environment - Chronic Hazard, Category 1

Aquatic Chronic 2: Hazardous to the aquatic environment - Chronic Hazard, Category 2