1. Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier:

Trade name: **Haftschmierspray**
Product number: 71550

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

Use of the substance /Mixture: lubricant

1.3. Details of the supplier of the safety data sheet:

PETEC Verbindungstechnik GmbH
Wüstenbuch 26
96132 Schlüsselfeld / Deutschland
Telefon +49 (0) 9555 80994-0
Fax +49 (0) 9555 80994-25
Homepage www.petec.de
E-Mail: info@petec.de

Information department:
Technical information: info@petec.de
Material Safety Data Sheet: info@petec.de

1.4. Emergency telephone number:

Emergency call number: +49 (0)89-19240 (24h) (deutsch und englisch)

2. Hazard identification

2.1. Classification of the substance or mixture:

Classification (EC) 1272/2008

Aerosol 1; H222, H229
Skin Irrit. 2; H315
Aquatic Chronic 3; H412

Classification (67/548/EEC, 1999/45/EC)

F+; R12
R52/53

2.2. Label elements:

Label elements (CLP)

Signal word: Danger

Hazard statements:

H222	Extremely flammable aerosol.
H229	Pressurized container: May burst if heated.
H315	Causes skin irritation.
H336	May cause drowsiness or dizziness.
H412	Harmful to aquatic life with long lasting effects.

Precautionary statements:

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.

Continued on next page

P251	Do not pierce or burn, even after use.
P302 + P352	IF ON SKIN: Wash with plenty of water/…
P304 + P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
P410 + P412	Protect from sunlight. Do no expose to temperatures exceeding 50 oC/122oF.
P501	Dispose of contents/container to accordance with local / regional / national / international regulations.

Contains: Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic

Text for labelling:

/

2.3. Other hazards:

No data available.

3. Composition/information on ingredients

Substance: ☐

Mixture: ☒

Chemical name:	Content (% m/m):	CAS: EC: Index:	Classification (67/548/EC):	Classification (1272/2008/EC):
Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	10 - 25	/ 927-510-4 /	F; R11, Xn; R65, Xi; R38, R67, N; R51/53	Flam. Liq. 2; H225, Asp. Tox. 1; H304, Skin Irrit. 2; H315, STOT SE 3; H336, Aquatic Chronic 2; H411
Propane	10 – 25	74-98-6 200-827-9 601-003-00-5	F+; R12	Flam. Gas. 1; H220, Press. Gass; H280
Isobutane	25 – 50	75-28-5 200-857-2 601-004-00-0	F+; R12	Flam. Gas. 1; H220, Press. Gass; H280

4. First aid measures

4.1. Description of first measures:

If inhaled	remove to fresh air. If rapid recovery does not occur, transport to nearest medical facility for additional treatment.
In case of skin contact	remove contaminated clothing. Flush exposed area with water and follow by washing with soap if available. In case of skin irritation consult with the doctor.
In case of eye contact	Flush eyes with water while holding eyelids open. Rest eyes for 30 minutes. If redness, burning, blurred vision, or swelling persist, transport to the nearest medical facility for additional treatment.
If swallowed	Not applicable.

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

No data available.

4.3. Identification of any immediate medical attention and special treatment needed:

Symptomatic treatment.

5. Firefighting measures

Continued on next page

5.1. Extinguishing media:

Suitable extinguishing media:	Foam, water spray or fog. Dry chemical powder, carbon dioxide.
Unsuitable extinguishing media	Water jet.

5.2. Special hazards arising from the substance or mixture:

Specific hazards during firefighting:	Exposure to decomposition products may cause health problems. Possible in case of fire / high temperatures the formation of hazardous / toxic fumes.

5.3. Advice for firefighters:

Special protective equipment for firefighters:	In the event of fire, self-contained breathing apparatus. Personal protective equipment.
Other information:	Standard procedure for chemical fires. Use extinguishing measures that suit the environment. Explosion and fire do not breathe fumes. Use water spray to cool unopened containers. Collect contaminated extinguishing water separately, must not be discharged into drains. Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations. Beware of backfiring. Because of the high vapor pressure of the vessels bursting when the temperature rises.

6. Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures:

Refer to protective measures listed in sections 7 and 8 Personal protective equipment. Remove all sources of ignition. Avoid contact with eyes and skin. Ensure adequate ventilation, especially in confined spaces. Avoid inhalation of vapors or mists . Himself against vapors accumulating to form explosive concentrations, beware. Vapors may accumulate in low lying areas.

6.2. Environmental precautions:

Do not flush into surface water or sanitary sewer. Prevent further leakage or spillage if possible without risk. If the product contaminates rivers and lakes or drains inform respective authorities.

6.3. Methods and material for containment and cleaning up:

Contain spilled liquid with sand, earth or other suitable absorbents. Recover free liquid in suitable containers. Clean contaminated area. Dispose of according to local regulations.

6.4. Reference to other sections:

See section: 7, 8, 11, 12 and 13.

7. Handling and storage

7.1. Precautions for safe handling:

Advice on safe handling:	Inventory levels at the workplace must be restricted. Use only in well ventilated areas. Vapors and spray mists. Avoid contact with eyes and skin. Do not spray on a naked flame or any incandescent material. Prevent the creation of flammable or explosive concentrations of vapor in air and avoid vapor exposure limits. Measures against electrostatic discharges. Personal protective equipment see section 8
Advice on protection against fire and explosion	Normal measures for preventive fire protection. Vapors are heavier than air and may spread along floors. Vapors may form explosive mixtures with air. Keep away from heat and ignition sources. Do not smoke. Sparking tools. Electrical equipment should be protected to the appropriate standards.

7.2. Conditions for safe storage, including any incompatibilities:

Requirements for storage arease and containers:	Store in original container. CAUTION: Aerosol are under pressure. Keep away from direct sunlight and temperatures above 50 ° C. Do not apply force or throw into fire even after use. Do not spray on flames or red-hot objects. Keep container tightly closed in a dry, cool and well ventilated place. Storage regulations for aerosols!
Storage class:	2B, Aerosols

7.3. Specific en use(s):

Continued on next page

No data available.

8. Exposure controls/personal protection

8.1. Control parameters:

8.1.1. Limits for occupational exposure

Components	CAS-No.	Control parameters		Excess factor	Base
		ml/m³ (ppm)	mg/m³		
Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	/	200	1.000	4	
Propane	74-98-6	1.000	1.800	4	
Isobutane	75-28-5	1.000	2.400	4	

8.1.2. DNEL-and PNEC-values

Substance	Type	Type of exposure	Exposure time	Value
Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	DNEL (workers)	Inhalation	Long term exposure – systemic effects	2085 mg/m³
Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	DNEL (workers)	dermal	Long term exposure – systemic effects	300 mg/kg bw/day
Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	DNEL (consumer)	inhalation	Long term exposure – systemic effects	447 mg/m³
Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	DNEL (consumer)	dermal	Long term exposure – systemic effects	149 mg/kg bw/day
Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	DNEL (consumer)	oral	Long term exposure – systemic effects	149 mg/kg bw/day

8.2. Exposure controls:

Technical protective equipment:

Provide sufficient air exchange and / or exhaust in work rooms.

Personal protective equipment:

Respiratory protection: When exceeding the Occupational Exposure Limits (OEL) is to wear a respirator. Filter AX identification color brown, according to EN 371. Keep willing self-contained breathing apparatus for emergency use.

Hand protection: Solvent resistant protective gloves according to EN 374. Gloves material: nitrile rubber, butyl rubber or fluorine rubber. Breakthrough time (maximum wearing period):> 480 min. The manufacturer of the protective gloves on permeability and breakthrough time must be observed.

Eye protection: Tightly sealed goggles according to EN 166th

Protective clothing: Flame retardant antistatic protective clothing Choose body protection according to the amount and concentration of the dangerous substance at the work.

Hygien measures: Handle with good industrial hygiene and safety practice. General industrial hygiene measures. Do not breathe spray. Contact with skin, eyes and clothing. When using do not eat, drink or smoke. Wash hands before breaks and after work. Skin protection plan note. Wash contaminated clothing before reuse.

Environmental exposure controls:

General advice: Do not flush into surface water or sanitary sewer. Further leakage or spillage if possible without risk. If the product contaminates rivers and lakes or drains inform respective authorities.

9. Physical and chemical properties

9.1. Information on basis physical and chemical properties:

Value	Unit	At	Method	Notice

Continued on next page

Appearance:	aerosol		
Color:	colorless to light yellow		
Odor:	characteristic		
Flash point:	Ca. -80	°C	isobutane
Lower explosion limit:	1,40	Vol. %	isobutane
Upper explosion limit:	8,3	Vol. %	isobutane
Density:	0,839	g/cm^3	
Water solubility:	insoluble		

9.2. Other information:

No data available.

10. Stability and reactivity

10.1. Reactivity:

No data available.

10.2. Chemical stability:

The product is chemical stable.

10.3. Possibility of hazardous reactions:

No decomposition if stored and applied. Vapors may form explosive mixtures with air. Because of the high vapor pressure when heated bursting of the vessels.

10.4. Conditions to avoid:

Extremely flammable. Keep away from heat, sparks and open flames. Vapours may form explosive mixtures with air, which are heavier than air. Protect from sunlight and do not expose to temperatures exceeding 50 ° C.

10.5. Incompatible materials:

Strong oxidizing agents.

10.6. Hazardous decomposition products:

Hazardous decomposition products::	Possible in case of fire / high temperatures the formation of hazardous / toxic fumes.

11. Toxicological information

Acute toxicity:

Acute oral toxicity:

Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	LD_{50} > 8 ml/kg (rat)

Acute inhalation toxicity:

Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	LC_{50} > 23,3 mg/l (rat, 4 h)

Acute dermal toxicity:

Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	LD_{50} > 4 ml/kg (rat)

Skin corrosion/irritation:	Cause irritation.
Serious eye damage/eye irritation:	May cause irritation.
Respiratory or skin sensitization:	No data available
Germ cell mutagenicity:	No data available
Carcinogenicity:	No data available

Continued on next page

Reproductive and developmental toxicity: No data available

Other information: Drowsiness and dizziness. Irritation and dermatitis, weakness.

12. Ecological information

12.1. Toxicity:

Toxicity to fish:

Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	LL/EL/IL50 >1 - <= 10 mg/l

Toxicity to Dapnia:

Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	LL/EL/IL50 >1 - <= 10 mg/l

Toxicity to algae:

Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	LL/EL/IL50 >10 - <= 100 mg/l

Toxicity to bacteria:

Hydrocarbons, C7, n-alkanes, iso-alkanes, cyclic	LL/EL/IL50 >10 - <= 100 mg/l

12.2. Persistence and degradability:

No data available.

12.3. Bioaccumulative potential:

No data available.

12.4. Mobility in soil:

No data available.

12.5. Results of PBT- and vPvB assessment:

No data available.

12.6. Other adverse effects:

The penetration of the product into drains, water courses or the soil should be prevented.

13. Disposal considerations

13.1. Product:

Waste key number: 160504* = Accumulators containing certain dangerous gases in pressurized containers.
* = The disposal must be provided.

Recommendation: Do not open, even after use or burn.
Disposal according to official regulations.

13.2. Packaging:

Waste key number: 150110 = Packaging containing residues of hazardous substances or contaminated by dangerous substances

Recommendation: Drain thoroughly and completely as possible.
Disposal according to official regulations.

14. Transport information

ADR/RID

UN number: 1950

Product designation: AEROSOLS

Class: 2

Packaging group: --

Continued on next page

Code:	5F
Label:	2.1
Limited quantities:	1 L
Tunnel restriction code:	(D)
Environmentally hazardous:	no

RID

UN number	1950
Product designation:	AEROSOLS
Class:	2
Packaging group:	--
Code:	5F
Label:	2.1
Hazard identification No.	23
Limited quantities:	LQ2
Tunnel restriction code:	(D)

Special precautions for user:

See chapter: 6, 7 and 8

15. Regulatory information

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

		Quantity 1	Quantity 2
Council Directive (96/82/EC):	Extremely flammable	10 t	50 t
	Petroleum	2.500 t	25.000 t
VOC (Directive 1999/13/EG):	VOC: 590 g/l = 73 %		

15.2. Chemical safety assessment:

No data available.

16. Other information

Full text of R-phrases referred to under sections 2 and 3:

R11	Highly flammable.
R12	Extremely flammable.
R38	Irritating to skin.
R65	Harmful: May cause lung damage if swallowed.
R67	Vapours may cause drowsiness and dizziness.
R51/53	Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Full text of H-statements referred to under sections 2 and 3:

H220	Extremely flammable gas.
H225	Highly flammable liquid and vapour.
H280	Contains gas under pressure; may explode if heated.
H304	May be fatal if swallowed and enters airways.
H315	Causes skin irritation.
H336	May cause drowsiness or dizziness.
H411	Toxic to aquatic life with long lasting effects.