Fuel Line Cleaner

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

Product identifier

Fuel Line Cleaner

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

Use of the substance/mixture

Cleaning agent for Fuel Systems

Details of the supplier of the safety data sheet

Company name:	PRO-TEC Deutschland	
Street:	Großgeschwenda 51	
Place:	D-07330 Probstzella	
Telephone:	+4936735/444-0	Telefax: +4936735/444-44
e-mail:	info@pro-tec-deutschland.com	
Contact person:	Jens Möller, Dipl.-Chem.	
Internet:	www.pro-tec-deutschland.de	

Further Information

Article Number: 1101, 1102, 1105, 1107, 1108, 1109, 3011

SECTION 2: Hazards identification

Classification of the substance or mixture

Indications of danger : Highly flammable, Harmful, Irritant
R-phrases:
Highly flammable.
Harmful by inhalation and in contact with skin.
Irritating to eyes and skin.
Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.
Harmful: may cause lung damage if swallowed.

Label elements

Danger symbols: F - Highly flammable; Xn - Harmful

F - Highly flammable

Xn - Harmful

Hazardous components which must be listed on the label

xylene
Distillates (petroleum, gasoline), hydrotreated light

R phrases

11	Highly flammable.
20/21	Harmful by inhalation and in contact with skin.
36/38	Irritating to eyes and skin.
52/53	Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.
65	Harmful: may cause lung damage if swallowed.

S phrases

02	Keep out of the reach of children.
46	If swallowed, seek medical advice immediately and show this container or label.

SECTION 3: Composition/information on ingredients

Mixtures

Chemical characterization

Surface tension compounds
Detergents, Dispersants
Synthetic agent combinations
Anti wear agents not classified

Sum of ingredients:
20 - 60 %

Hazardous components

EC No.	Chemical name	Quantity
CAS No.	Classification	
Index No.	GHS classification	
REACH No.		
215-535-7	xylene	30 - 35 %
1330-20-7	Xn, Xi R10-20/21-38	
601-022-00-9	Flam. Liq. 3, Acute Tox. 4, Acute Tox. 4, Skin Irrit. 2; H226 H332 H312 H315	
265-149-8	Distillates (petroleum, gasoline), hydrotreated light	10 - 25 %
64742-47-8	Xn R10-65	
	Flam. Liq. 3, STOT SE 3, Asp. Tox. 1, Aquatic Chronic 2; H226 H336 H304 H411	
200-661-7	propan-2-ol; isopropyl alcohol; isopropanol	10 - 20 %
67-63-0	F, Xi R11-36-67	
603-117-00-0	Flam. Liq. 2, Eye Irrit. 2, STOT SE 3; H225 H319 H336	
	ketone	10 - 25 %
Mixture	F, Xi R11-36-66-67	
	Flam. Liq. 2, Eye Irrit. 2, STOT SE 3; H225 H319 H336	
	phenole, ethoxylised	1 - 5 %
37205-87-1	Xn, Xi, N R22-41-51-53	
265-198-5	solvent naphtha	1 - 5 %
64742-94-5	Xn, N R65-66-67-51-53	
	STOT SE 3, Asp. Tox. 1; H336 H304	
202-436-9	1,2,4-trimethylbenzene	< 1 %
95-63-6	Xn, Xi, N R10-20-36/37/38-51-53	
601-043-00-3	Flam. Liq. 3, Acute Tox. 4, Eye Irrit. 2, STOT SE 3, Skin Irrit. 2, Aquatic Chronic 2; H226 H332 H319 H335 H315 H411	
202-049-5	naphthalene	< 1 %
91-20-3	Carc. Cat. 3, Xn, N R40-22-50-53	
601-052-00-2	Carc. 2, Acute Tox. 4, Aquatic Acute 1, Aquatic Chronic 1; H351 H302 H400 H410	

Full text of R- and H-phrases: see section 16.

SECTION 4: First aid measures

Description of first aid measures

General information

Move victim to fresh air. Put victim at rest and keep warm.

After inhalation

Move victim to fresh air. Put victim at rest and keep warm.
In case of difficulties of breathing consult physician.
If victim is at risk of losing consciousness, position and transport on their side.

After contact with skin

Take off immediately all contaminated clothing, including underwear and shoes .
After contact with skin, wash immediately with plenty of Water and soap.
Rub in high-fat content cream.

After contact with eyes

Immediately flush eyes with plenty of flowing water for 10 to 15 minutes holding eyelids apart.
Consult physician.

After ingestion

Let water be swallowed in little sips (dilution effect). Consult physician.

Most important symptoms and effects, both acute and delayed

Frequently or prolonged contact with skin may cause dermal irritation.
Irritation of eyes: Irritant effect possible.
After ingestion: Harmful: may cause lung damage if swallowed.
Harmful: danger of serious damage to health by prolonged exposure through inhalation.

Indication of any immediate medical attention and special treatment needed

Warning about danger of aspiration.

SECTION 5: Firefighting measures

Extinguishing media

Suitable extinguishing media

Extinguishing powder.
Sand.
alcohol resistant foam.
Carbon dioxide (CO_2).

Extinguishing media which must not be used for safety reasons

High power water jet.

Special hazards arising from the substance or mixture

Formation of decomposition products possible.
In case of fire and/or explosion do not breathe fumes.

Advice for firefighters

In case of fire: Wear self-contained breathing apparatus.

Additional information

Cool endangered container in case of fire.
Contaminated fire-fighting water must be collected separately.

SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

In case of fire: Wear self-contained breathing apparatus.
Keep away from sources of ignition. No smoking.

Environmental precautions

Beat down gas/vapours/mist with water spray.
Do not empty into drains or the aquatic environment.
In case of gas being released or leakage into waters, ground or the drainage system, the appropriate authorities must be informed.

Methods and material for containment and cleaning up

Prevent spreading of spillages (e.g. by oil barrier).
Wipe up with absorbent material (eg. cloth, fleece).

SECTION 7: Handling and storage

Precautions for safe handling

Advice on safe handling

Closed devices. Vapours / aerosols must be extracted by suction immediately at point of origin.
Avoid contact with skin and eyes.

Advice on protection against fire and explosion

Keep away from sources of ignition. No smoking. Take precautionary measures against static discharges.

Conditions for safe storage, including any incompatibilities

Requirements for storage rooms and vessels

Keep container tightly closed in a cool, well-ventilated place.

Further information on storage conditions

Packaging materials: metal.

SECTION 8: Exposure controls/personal protection

Control parameters

Exposure limits (EH40)

CAS No.	Chemical name	ml/m³	mg/m³	F/ml	Category	Origin
91-20-3	Naphthalene	-	-		TWA (8 h)	CHAN
		-	-		STEL (15 min)	CHAN
95-63-6	Trimethylbenzenes	25	125		TWA (8 h)	WEL
		-	-		STEL (15 min)	WEL
1330-20-7	Xylene, o-, m-, p- or mixed isomers	50	220		TWA (8 h)	WEL
		100	441		STEL (15 min)	WEL

Biological Monitoring Guidance Values (EH40)

CAS No.	Chemical name	Parameter	Value	Test material	Sampling time
1330-20-7	Xylene, o-, m-, p- or mixed isomers	methyl hippuric acid	650 mmol/mol	urine	Post shift

Exposure controls

Protective and hygiene measures

When using do not eat, drink or smoke.
"Wash hands when done working with material; at breaks, lunch, shift changes, etc."

Respiratory protection

In case of accumulation of fumes/aerosols, provide adequate ventilation.
In case of insufficient ventilation, wear suitable respiratory equipment.

Hand protection

Tested protective gloves are to be worn: Butyl rubber. (EN 374)

Eye protection

Wear tightly sealed safety glasses against possible splashes into the eyes. (EN 166)

Skin protection

Wear suitable solvent-proof protective clothing according to EN 465.

SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state:	liquid
Colour:	red
Odour:	aromatic

		Test method
Changes in the physical state		
Boiling point:	110 - 116 °C	
Flash point:	-6.5 °C	
Lower explosion limits:	0,6 vol. %	
Upper explosion limits:	12 vol. %	
Ignition temperature:	> 200 °C	
Vapour pressure: (at 20 °C)	20 hPa	
Density (at 20 °C):	0.78-0.82 g/cm³	
Water solubility: (at 20 °C)	insoluble	
Solubility in other solvents:	Organic solvents	

SECTION 10: Stability and reactivity

Conditions to avoid

Only use material in places where open light, fire and other sources of ignition can be kept away.

Incompatible materials

Oxidizing agents. acid, concentrated. Alkalis (alkalis), concentrated.

Hazardous decomposition products

Carbon monoxide (CO)., Carbon dioxide (CO2).

SECTION 11: Toxicological information

Information on toxicological effects

Acute toxicity

LD50(oral, rat) > 2000 mg/Kg.

CAS No.	Chemical name				
	Exposure routes	Method	Dose	Species	h
1330-20-7	xylene				
	Acute oral toxicity	LD50	4300 mg/kg	rat.	
	Acute dermal toxicity	LD50	3200 mg/kg	Rabbit.	
64742-47-8	Distillates (petroleum, gasoline), hydrotreated light				
	Acute oral toxicity	LD50	>15000 mg/kg	rat.	
	Acute dermal toxicity	LD50	3400 mg/kg	rat.	
67-63-0	propan-2-ol; isopropyl alcohol; isopropanol				
	Acute oral toxicity	LD50	5280 mg/kg	rat.	
	Acute dermal toxicity	LD50	12800 mg/kg	Rabbit.	
	Acute inhalation toxicity	LC50	47,5 mg/l	rat.	4
Mixture	ketone				
	Acute oral toxicity	LD50	5800 mg/kg	rat.	
	Acute dermal toxicity	LD50	20000 mg/kg	Rabbit.	
37205-87-1	phenole, ethoxylised				
	Acute oral toxicity	LD50	2000 mg/kg	rat.	
64742-94-5	solvent naphtha				
	Acute oral toxicity	LD50	5 mg/kg	rat.	
	Acute dermal toxicity	LD50	>2 mg/kg	Rabbit.	
95-63-6	1,2,4-trimethylbenzene				
	Acute oral toxicity	LD50	5000 mg/kg	Ratte	
	Acute inhalation toxicity	LC50	18 mg/l	Ratte	4
91-20-3	naphthalene				
	Acute oral toxicity	ATE	500 mg/kg		

Irritation and corrosivity

After skin contact: Frequently or prolonged contact with skin may cause dermal irritation.
Irritation of eyes: Irritant effect possible.
After ingestion:
Harmful: may cause lung damage if swallowed.

SECTION 12: Ecological information

Toxicity

CAS No.	Chemical name			
	Aquatic toxicity	Method Dose	Species	h
1330-20-7	xylene			
	Acute fish toxicity	LC50 26,7 mg/l	Pimephales promelas	96
64742-47-8	Distillates (petroleum, gasoline), hydrotreated light			
	Acute fish toxicity	LC50 10 mg/l	Oncorhynchus mykiss	96
	Acute algae toxicity	ErC50 4,6 mg/l	Pseudokirchneriella subcapitata	72
	Acute crustacea toxicity	EC50 10 mg/l	Daphnia magna	48
67-63-0	propan-2-ol; isopropyl alcohol; isopropanol			
	Acute fish toxicity	LC50 9640 mg/l	Pimephales promelas	96
	Acute algae toxicity	ErC50 1000 mg/l	Algae	72
	Acute crustacea toxicity	EC50 13299 mg/l	Daphnia magna	48
Mixture	ketone			
	Acute fish toxicity	LC50 5540 mg/l	Oncorhynchus mykiss	96
37205-87-1	phenole, ethoxylised			
	Acute fish toxicity	LC50 1-10 mg/l	Brachydanio rerio	96
	Acute algae toxicity	ErC50 1-10 mg/l	Scenedesmus subspicatus	72
64742-94-5	solvent naphtha			
	Acute fish toxicity	LC50 2-5 mg/l	Fish	96
	Acute algae toxicity	ErC50 1-3 mg/l	Algae	72
	Acute crustacea toxicity	EC50 3-10 mg/l	Daphnia	48
95-63-6	1,2,4-trimethylbenzene			
	Acute fish toxicity	LC50 7,72 mg/l	Pimephales promelas	96
	Acute crustacea toxicity	EC50 3,6 mg/l	Daphnia	48

Bioaccumulative potential

Swims on the water.
Low potential of bio-accumulation.

Partition coefficient n-octanol/water

CAS No.	Chemical name	Log Pow
95-63-6	1,2,4-trimethylbenzene	3,63

SECTION 13: Disposal considerations

Waste treatment methods

Advice on disposal

Do not dispose with household waste.
Do not empty into drains or the aquatic environment.
Have to add a Special treatment in compliance with official regulations in contact with approved waste disposal companies and with authorities in charge.
Arrange about the exact waste code with the local waste disposal expert.

Contaminated packaging

Contaminated packing must be completely emptied and can be re-used following appropriate cleaning.
Do not pierce, cut up or weld unclean container. (Explosion hazard.)

SECTION 14: Transport information

Land transport (ADR/RID)

UN number:	UN1993
UN proper shipping name:	FLAMMABLE LIQUID, N.O.S.
Transport hazard class(es):	3
Packing group:	II
Hazard label:	3

Classification code:	F1
Special Provisions:	274 601 640C
Limited quantity:	1 L
Transport category:	2
Hazard-no.:	33
Tunnel restriction code:	D/E

Inland waterways transport

UN number:	UN1993
UN proper shipping name:	FLAMMABLE LIQUID, N.O.S.
Transport hazard class(es):	3
Packing group:	II
Hazard label:	3

Classification code:	F1
Special Provisions:	274 601 640C
Limited quantity:	1 L

Marine transport

UN number:	UN1993
UN proper shipping name:	FLAMMABLE LIQUID, N.O.S.
Transport hazard class(es):	3
Packing group:	II
Hazard label:	3

Marine pollutant:	-
Special Provisions:	274
Limited quantity:	1 L
EmS:	F-E, S-E

Air transport

UN/ID number:	UN1993
UN proper shipping name:	FLAMMABLE LIQUID, N.O.S.

Transport hazard class(es):	3
Packing group:	II
Hazard label:	3

Special Provisions:	-	
Limited quantity Passenger:	1 L	
IATA-packing instructions - Passenger:		353
IATA-max. quantity - Passenger:		5 L
IATA-packing instructions - Cargo:		364
IATA-max. quantity - Cargo:		60 L

Environmental hazards

Dangerous for the environment: no

SECTION 15: Regulatory information

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

EU regulatory information

Additional information

Contains:
15 - 30 % hydrocarbons, aliphatic.
> 30 % hydrocarbons, aromatic.
< 5 % Phenols and halogenated phenols

National regulatory information

Water contaminating class (D): 2 - water contaminating

SECTION 16: Other information

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

10	Flammable.
11	Highly flammable.
20	Harmful by inhalation.
20/21	Harmful by inhalation and in contact with skin.
22	Harmful if swallowed.
36	Irritating to eyes.
36/37/38	Irritating to eyes, respiratory system and skin.
36/38	Irritating to eyes and skin.
38	Irritating to skin.
40	Limited evidence of a carcinogenic effect.
41	Risk of serious damage to eyes.
50	Very toxic to aquatic organisms.
51	Toxic to aquatic organisms.
52/53	Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.
53	May cause long-term adverse effects in the aquatic environment.
65	Harmful: may cause lung damage if swallowed.
66	Repeated exposure may cause skin dryness or cracking.
67	Vapours may cause drowsiness and dizziness.

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

H225	Highly flammable liquid and vapour.
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.
H319	Causes serious eye irritation.
H332	Harmful if inhaled.
H335	May cause respiratory irritation.
H336	May cause drowsiness or dizziness.
H351	Suspected of causing cancer.
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
H411	Toxic to aquatic life with long lasting effects.

Further Information

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

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