



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

Product identifier:
Identification on the label/trade name: Agip Precis BR-Fluid
REACH registration number: Mixtures must not be registered according to REACH (article 2.7 d). REACH registration numbers of dangerous substances in this mixture (if available): See item 3.
Main use of this product: Hydraulic oil
Relevant identified uses of the substance or mixture and uses advised against:
Identified uses: Recommendation: Hydraulic oil
Uses advised against: Not applicable.
Details of the supplier of the safety data sheet: Eni Schmiertechnik GmbH
Paradiesstr. 14, 97080 Würzburg
TEL. (+ 49) 931 - 900 98-145 FAX (+ 49) 931-98442
<http://www.enischmiertechnik-datenblaetter.de>
Advising/Support: Mr. Steigner (Markus.Steigner@agip.de), Technical Department
Tel. (+ 49) 931/900 98-145 (during work hours)
Tel. (+ 49) 931/900 98-0 (answering machine)

2. Hazards identification.

Classification of the substance or mixture:
67/548/EEC and 1999/45/EC: The mixture is not dangerous in the sense of Guideline 1999/45/EC.
Additional hints: No data available.
Label elements: None
Other hazards: Product can build up a film on the water surface which can inhibit the oxygen exchange. See also sections 11, 12 and 15.

3. Composition/information on ingredients.

Substances:
General description: Not applicable. The product is a mixture.
Hazard ingredients: Not applicable. The product is a mixture.
Additional hints: Not applicable. The product is a mixture.
Mixtures:
General description: Mineral oil, additives.
Hazard ingredients:

Chemical name	EC-No. CAS-No. Index-No. Reg.-No.	Conc. (%)	Classification according Regulation (EC) Nr. 1272/2008	Classification according 68/548/EEC
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Additional hints: All concentrations are quoted as mass percentages for liquids and volume percentages for gases. The mixture does not contain any substance classified as dangerous, whose concentration exceeds the concentration limits described in article 3.2.2 (annex II, VO 1907/2006/EU). Other ingredients which are not classified as dangerous are contained up to 100%. Full text of hazard symbols and R-phrases: see section 16.

4. First aid measures.

Description of the first aid measures:
In case of inhalation: Provide affected person with fresh air. In case of accident or illness/indisposition, seek medical advice immediately (show doctor directions for use or safety data sheet if possible).
In case of skin contact: After skin contact wash immediately soap and plenty of water, remove contaminated, saturated clothing. In case of skin irritation (redness etc.), consult a doctor.



In case of eye contact:	In case of eye contact, rinse immediately thoroughly with plenty of water and if necessary consult a doctor. Carry along safety data sheet.
In case of ingestion:	Do not induce vomiting, consult a doctor immediately. Observe risk of aspiration.
Most important symptoms and effects, both acute and delayed:	No data available.
Indication of any immediate medical attention and special treatment needed:	No data available.

5. Fire fighting measures.

Extinguishing media:	
Suitable extinguishing media:	CO ₂ , foam, dry fire-extinguishing media. Cool containers at risk with water.
Extinguishing media which must not be used for safety reasons:	Water
Special hazards arising from the substance or mixture:	Formation of ignitable vapour/air mixtures possible. Hot product may produce flammable vapours.
Substances potentially set free in case of fire:	Toxic pyrolysis products, smoke, hydrocarbons, carbon oxides, aldehydes, hydrogen sulphides, sulphur oxides, mercaptanes, nitrogen oxides, phosphorus oxides.
Advice for fire fighters:	Wear self-contained breathing apparatus. According to extend of fire wear full protective clothing if necessary. Dispose contaminated fire extinguishing water according to official Directives.
Fire class (EN 2):	B (fires involving flammable or combustible liquids).

6. Accidental release measures.

Personal precautions, protective equipment and emergency procedures:	Provide adequate ventilation. Keep away from sources of ignition, do not smoke. Avoid eye and skin contact as well as inhalation. Do not put any rags impregnated with the product into your trouser pockets. Attention, risk of slipping.
Environmental precautions:	Contain spillage. Do not allow to enter drains. Avoid entering surface waters or groundwater as well as into soil.
Methods and material for containment and cleaning up:	Absorb with liquid-binding material (e. g. general-purpose binder), treat recovered material as prescribed in section 13.
Reference to other sections:	See section 13. As well as personal protective equipment see section 8.

7. Handling and storage.

Precautions for safe handling:	
Hints for safe handling:	See section 6. Avoid eye and skin contact. Avoid formation of oil spray. Keep away from sources of ignition - refrain from smoking. Wash hands before breaks and on finishing work. Apply the general hygienic measures for handling of chemicals. Pay attention to the indications on the label and to the instructions for use. Do not heat up to temperatures near Flashpoint ($T \geq 180^{\circ}\text{C}$). Possibly take precautionary measures against electrostatic loading and risk of explosion.
Conditions for safe storage, including any incompatibilities:	
Requirements for storage rooms and vessels:	Do not store product in alley ways and staircases. Store only in original container and keep locked up. Do not store together with fire promoting or spontaneously combustible substances.
Further information on storage conditions:	See section 10. Keep locked up and avoid humidity. Do store in a cool place. Do not store at temperatures exceeding 50°C. Protect against frost. Storage class acc to VCI: 10
Specific end use(s):	Observe technical data sheet.



8. Exposure controls/personal protection.

Control parameters:

Exposure limit values:

Air limit values:

Limit value type (country of origin)	Substance name	EC no. CAS no.	Limit value	Remark
TLV-ACGIH	Mineral oil mist	--- / ---	5 mg/m ³	

Additional exposure limits under the conditions of use:

No data available.

Exposure controls:

Occupational exposure controls:

Product related measures to prevent exposure:

No data available.

Instructual measures to prevent exposure:

No data available.

Organisational measures to prevent exposure:

No data available.

Technical measures to prevent exposure:

Ensure sufficient aeration. This can be achieved by local exhaust ventilation or general exhaust air. If this is not sufficient to keep concentrations below AGW values suitable respiratory protection apparatus has to be worn.

Personal protection equipment:

Respiratory protection:

Not required in normal case. In case of mineral oil mist formation, in case of vapour formation: Filter A - P2 (EN 141).

Hand protection:

Suitable are for example hand gloves from the company KCL GmbH, D-36124 Eichenzell, e-mail: vertrieb@kcl.de, with the following specification (test according to EN 374):

Article no.	Product name	Glove material	Layer thickness (min.)	Breakthrough time
731	Camatril	Nitril	0,33 mm	480 min
740	Dermatril	Nitril	0,11 mm	30 min

The protective gloves to be used must comply with the specifications of EC Directive 89/686/EEC and the resultant standard EN 374. The breakthrough times stated above were determined by KCL in laboratory tests according to EN 374 and are only authoritative for the recommended glove types. Skin cream is recommendable.

Eye protection:

If there is a risk of eye contact: Eye glasses with side protection (EN 166).

Protective clothing:

Protective clothing (e. g. safety shoes EN 344, work clothes with long sleeves). According to working process wear apron, boots (EN 347).

Environmental exposure controls:

Product related measures to prevent exposure:

No data available.

Instructual measures to prevent exposure:

No data available.

Organisational measures to prevent exposure:

No data available.

Technical measures to prevent exposure:

See section 6.

Consumer exposure control:

Measures related to consumer uses of the substance (as such or in preparations):

No data available.

Measures related to the service life of the substance in articles:

No data available.



9. Physical and chemical properties.

Information on basic physical and chemical properties:

Physical and chemical properties:

Physical state:	Liquid
Odour:	Characteristic
Colour:	Yellow, brown
Safety relevant basis data:	
Boiling point/range:	≥ 320°C
Flashpoint:	≥ 180°C (DIN ISO 2592)
Ignition temperature:	> 250°C (ASTM E 659)
Lower explosion limit:	In case of formation of oil sprays, ~ 0,6 Vol%
Upper explosion limit:	In case of formation of oil sprays, ~ 6,5 Vol%
Vapour pressure:	1013 mbar at 320°C
Relative Density at 15°C:	865 kg/m ³ (DIN 51757)
Water solubility:	Insoluble
Partition coefficient (n-octanol/water):	No data available
Vapour Density (air = 1):	Vapours, heavier than air
Viscosity at 40°C:	45,6 mm ² /s (DIN 51562)
Other information:	No data available

10. Stability and reactivity.

Reactivity:	See section 9.
Chemical stability:	If product is stored and handled as prescribed it is stable.
Possibility of hazardous reactions:	Formation of ignitable vapours/gases possible: ≥ 180°C.
Conditions to avoid:	Avoid contact with strong oxidizing agents. See section 7.
Incompatible materials:	No data available.
Hazardous decomposition products:	See section 5.

11. Toxicological information.

Information on toxicological effects:

General remarks:	Toxicological data for the preparation are not available. The preparation was evaluated on the basis of the calculation procedure of the preparation Directive 1999/45/EC.
CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction):	On basis of present data the components (base oil & additives) in this preparation do not meet the criteria for classification as CMR category 1 or 2 (DSD, 67/548/EEC). This information is based on our present-day knowledge.
Other information:	
It can occur:	Eye irritation.
In case of prolonged exposure:	Skin dehydration. Skin irritation. Dermatitis.

12. Ecological information.

Toxicity:	Eco-toxicological data of the preparation are not available. The preparation was evaluated on the basis of the calculation procedure of the preparation directive 1999/45/EC and not classified as dangerous for the environment.
Persistence and degradability:	Not readily biodegradable (according to OECD criteria). Inherently biodegradable (main ingredient indication).
Bioaccumulative potential:	No data available.
Mobility in soil:	No data available.



Results of PBE and vPvB assessment:

Behaviour in waste water treatment plants:

Can be separated mechanically.

Other adverse effects:

No data available.

13. Disposal considerations.

Waste treatment methods:

Appropriate disposal / product:

Saturated contaminated cloth, paper or other organic material pose a fire danger and have to be collected and disposed in a controlled way.

Waste code EC:

13 01 10 - mineral-based non-chlorinated hydraulic oils

The named waste codes are recommendations because of the likely use of this product. Due to specific use and disposal circumstances at the user other waste codes may be suitable.

Recommendation:

Send to a facility for oil re-refining in compliance with official regulations. Observe official regulations.

Appropriate disposal / packaging:

See above. Observe official regulations. Non-contaminated packages can be reused. Packages that cannot be cleaned have to be disposed like the product.

14. Transport information.

UN number:

Not classified

UN proper shipping name:

Not classified

Transport hazard class:

Not classified

Packing group:

Not classified

Environmental hazards:

Not classified

Special precautions for user:

Not classified

Transport in bulk according to Annex

II of MARPOL 73/78 and the IBC Code: No data available

15. Regulatory information.

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

National Regulations (Germany):

Water hazardous class:

Slightly water hazardous (WGK - 1, self-classification, VwVwS)

TA-Air:

No data available.

Additions:

No data available.

Observe restrictions:

No data available.

Material Safety Data Sheet is available on request for professional users.

Chemical safety assessment:

No data available.

16. Other information.

The information contained in this safety data sheet is based on our current information level. It does not give assurance for certain product properties and does not establish a contractual relationship. This information relates only to the specific material and may not be valid if the material is used in combination with any other material or in any process.

Hazard statements and R-phrases named in item 3: None

Additional information:

This information refers to the product in delivery condition.

Changes:

1 - 16