SAFETY DATA SHEET

Gear Fluid 220

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

1.1 Product identifier

Product name: Gear Fluid 220

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

Identified uses: No usage which is apart from.

1.3 Details of the supplier of the safety data sheet

Manufacturer / Supplier: KHS GmbH Juchost. 20
44143 Dortmund
www.khs.com
Germany

Telephone: +49 (0)231 / 569-10000
Fax: +49 (0)231 / 569-410300

Contact Person: Service Products

E-Mail: service.products@khs.com

1.4 Emergency telephone number: +49 (0)6131 / 19240 (24h-emergency call)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

The product has not been classified as hazardous and does not need to be labelled according to regulation (EU) no 1272/2008 (CLP).

2.2 Label elements

not applicable

Hazard statements: none

Precautionary statements:

Supplemental label elements: The product may not be released into the environment without control. By handling of chemical products no particular hazard is known when normal precautions (item 7) and personal protective equipment (item 8) are kept.
SECTION 3: Composition/information on ingredients

3.1 Chemical characterization

General information: Synthesis oil preparation with additives. The ingredients are not hazardous and below the consideration limits.

SECTION 4: First aid measures

General: Change clothes and shoes contaminated or soaked by the product. Never put rags contaminated by the product into clothing pockets. Instantly remove any clothing soiled by the product.

4.1 Description of first aid measures

Inhalation: Supply fresh air; consult doctor in case of symptoms.

Eye contact: Promptly wash eyes with plenty of water while lifting the eye lids.

Skin Contact: Wash with soap and water. Im allgemeinen ist das Produkt nicht hautreizend.

Ingestion: Rinse mouth thoroughly.

4.2 Most important symptoms and effects, both acute and delayed

Product be able to effects skin-, and eye irritations.

4.3 Indication of any immediate medical attention and special treatment needed

Get medical attention if symptoms occur.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media: CO2, fire extinguishing powder or fog like water spraying. Extinguish larger fires with alcohol resistant foam or spray water with suitable surfactant added.
Unsuitable extinguishing media: water in full jet.

Special hazards arising from the substance or mixture
During fire, gases hazardous to health may be formed.

Advice for firefighters
Move container from fire area if it can be done without risk. Dispose of fire debris and contaminated fire fighting water in accordance with official regulations. Collect contaminated fire fighting water separately. It must not enter drains.

Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

SECTION 6: Accidental release measure

6.1 Personal precautions, protective equipment and emergency procedures
In case of spills, beware of slippery floors and surfaces.

6.2 Environmental precautions
Prevent from spreading (e.g. by binding or oil barriers). Avoid release to the environment. Environmental manager must be informed of all major spillages. Prevent further leakage or spillage if safe to do so. Do not allow to enter drainage system, surface or ground water.

6.3 Methods and material for containment and cleaning up
Absorb with liquid-binding material (sand, diatomite, acidbinders, universal binders, sawdust). Dispose of the material collected according to regulations. Stop the flow of material, if this is without risk.

6.4 Reference to other sections
Section 01 Contact information in case of an emergency
Section 07 Handling and storage
Section 08 appropriate personal protective equipment
Section 13 Disposal considerations
SECTION 7: Handling and storage

7.1 Precautions for safe handling
Prevent formation of aerosols. Do not eat, drink or smoke when working with the product. Take usual precautions when handling mineral oil products or chemical products. Observe good industrial hygiene practices. Provide adequate ventilation.

7.2 Conditions for safe storage, including any incompatibilities
Local regulations concerning handling and storage of waterpolluting products have to be followed.

7.3 Specific end use(s)
no data available.

Storage Class:
10, combustible liquids

SECTION 8: Exposure controls/personal protection

8.1 Control parameters
Occupational Exposure Limits

8.2 Exposure controls
None of the components have assigned exposure limits.

8.2.1 Appropriate engineering controls:
no data available.

8.2.2 Individual protection measures, such as personal protective equipment
General information:
Wash hands before breaks and after work. Use personal protective equipment as required. Personal protection equipment should be chosen according to the CEN standards and in discussion with the supplier of the personal protective equipment. The usual precautionary measures should be adhered to in handling the chemicals or the mineral oil products.
Eye/face protection: safety glasses (EN 166) recommended during refilling.

Hand Protection: Material: Nitrile butyl rubber (NBR). Avoid long-term and repeated skin contact. Suitable gloves can be recommended by the glove supplier. Use skin protection cream for preventive skin protection. Protective gloves, where permitted in acc. To safety directions. The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

Other: Do not carry cleaning cloths impregnated with the product in trouser pockets. Wear suitable protective clothing.

Respiratory Protection: no data available.

Thermal hazards: no data available.

Hygiene measures: Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing to remove contaminants. Discard contaminated footwear that cannot be cleaned.

Environmental Controls: no data available.

### SECTION 9: Physical and chemical properties

#### 9.1 Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance</td>
<td>liquid</td>
</tr>
<tr>
<td>Physical state:</td>
<td>liquid</td>
</tr>
<tr>
<td>Form:</td>
<td>liquid</td>
</tr>
<tr>
<td>colour:</td>
<td>colourless</td>
</tr>
<tr>
<td>odor:</td>
<td>characteristic</td>
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<tr>
<td>odor threshold:</td>
<td>Not applicable for mixtures</td>
</tr>
<tr>
<td>pH:</td>
<td>not applicable</td>
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<tr>
<td>boiling Point:</td>
<td>Not applicable for mixtures</td>
</tr>
<tr>
<td>flash point:</td>
<td>249°C</td>
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<tr>
<td>flash point:</td>
<td>220°C</td>
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</tbody>
</table>
SAFETY DATA SHEET
Gear Fluid 220


<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>flash point</td>
<td>220°C</td>
</tr>
<tr>
<td>evaporation Rate</td>
<td>Not applicable for mixtures</td>
</tr>
<tr>
<td>flammability (solid, gas)</td>
<td>Value not relevant for classification</td>
</tr>
<tr>
<td>flammability limit - Upper (%) –</td>
<td>Not applicable for mixtures</td>
</tr>
<tr>
<td>flammability Limit - Lower (%) –</td>
<td>Not applicable for mixtures</td>
</tr>
<tr>
<td>vapor pressure</td>
<td>Not applicable for mixtures</td>
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<tr>
<td>vapor density (air=1)</td>
<td>Not applicable for mixtures</td>
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<tr>
<td>density</td>
<td>0,85 g/cm³ (15 °C)</td>
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<tr>
<td>solubility(ies)</td>
<td>unsoluble in water</td>
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<tr>
<td>solubility in Water</td>
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<td>solubility (other)</td>
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<tr>
<td>partition coefficient (n-octanol/water)</td>
<td>Not applicable for mixtures</td>
</tr>
<tr>
<td>autoignition Temperature</td>
<td>value not relevant for classification</td>
</tr>
<tr>
<td>autoignition Temperature</td>
<td>Value not relevant for classification</td>
</tr>
<tr>
<td>decomposition Temperature</td>
<td>Value not relevant for classification</td>
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<tr>
<td>kinematic viscosity</td>
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<tr>
<td>explosive properties</td>
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</tr>
<tr>
<td>oxidizing properties</td>
<td>Value not relevant for classification</td>
</tr>
<tr>
<td>9.2 other information</td>
<td>no data available</td>
</tr>
</tbody>
</table>

SECTION 10: stability and reactivity

10.1 reactivity Stable under normal use conditions.

10.2 chemical stability no data available.

10.3 possibility of hazardous reactions none

10.4 conditions to avoid Avoid heat or contamination.

10.5 incompatible materials Strong oxidizing substances. Strong acids. Strong bases.

10.6 hazardous decomposition products Thermal decomposition or combustion may liberate carbon oxides and other toxic gases or vapors.

SECTION 11: toxicological information

11.1 information on likely routes of exposure

Acute toxicity

Oral product: Not classified for acute toxicity based on available data.

Dermal product: Not classified for acute toxicity based on available data.
**SAFETY DATA SHEET**


**Gear Fluid 220**

<table>
<thead>
<tr>
<th>Inhalation product:</th>
<th>Not classified for acute toxicity based on available data.</th>
</tr>
</thead>
<tbody>
<tr>
<td>skin corrosion/irritation:</td>
<td>Prolonged or repeated skin contact may cause irritation.</td>
</tr>
<tr>
<td>serious eye damage/eye irritation</td>
<td>Splashes can cause irritation.</td>
</tr>
<tr>
<td>respiratory or skin sensitization:</td>
<td>Skin sensitisation: Based on available data, the classification criteria are not met.</td>
</tr>
<tr>
<td>germ cell mutagenicity product:</td>
<td>Based on available data, the classification criteria are not met.</td>
</tr>
<tr>
<td>carcinogenicity product:</td>
<td>Based on available data, the classification criteria are not met.</td>
</tr>
<tr>
<td>reproductive toxicity product:</td>
<td>Based on available data, the classification criteria are not met.</td>
</tr>
<tr>
<td>specific target organ toxicity - single exposure product:</td>
<td>Based on available data, the classification criteria are not met.</td>
</tr>
<tr>
<td>specific target organ toxicity - repeated exposure product:</td>
<td>Based on available data, the classification criteria are not met.</td>
</tr>
<tr>
<td>aspiration hazard product:</td>
<td>Based on available data, the classification criteria are not met.</td>
</tr>
<tr>
<td>other adverse effects:</td>
<td>no data available.</td>
</tr>
</tbody>
</table>

**SECTION 12: Ecological information**

**12.1 Toxicity**
- Acute toxicity: Based on available data, the classification criteria are not met.
- Chronic toxicity product: Based on available data, the classification criteria are not met.

**12.2 Persistence and Degradability**
- Biodegradation product: Not applicable for mixtures

**12.3 Bioaccumulative potential product:** Not applicable for mixtures

**12.4 mobility in soil product:** Not applicable for mixtures

**12.5 results of PBT and vPvB assessment:**
- product does not includes indegrients
12.6 other adverse effects

water hazard class (WGK):

no data available.

WGK 1: slightly water-endangering.

SECTION 13: disposal considerations

13.1 waste treatment methods

general information: Dispose in accordance with all applicable regulations.

disposal methods: Do not empty into drains; dispose of this material and its container in a safe way. When storing used products, ensure that the waste categories and mixing instructions are observed.

SECTION 14: transport information

ADR/RID
14.1 UN number:
14.2 UN proper shipping name:
14.3 transport hazard class(es) non-dangerous goods
class
label(s)
hazard no. (ADR):
tunnel restriction code:
14.4 packing group:
14.5 environmental hazards:
14.6 special precautions for user:

ADN
14.1 UN number:
14.2 UN proper shipping name:
14.3 transport hazard class(es) non-dangerous goods
class
14.4 packing group:
14.5 environmental hazards:
14.6 special precautions for user:

IMDG
14.1 UN number:
14.2 UN proper shipping name:
14.3 transport hazard class(es) non-dangerous goods class
14.4 packing group:
14.5 environmental hazards:
14.6 special precautions for user:

IATA
14.1 UN number:
14.2 UN proper shipping name:
14.3 transport hazard class(es) non-dangerous goods class
14.4 packing group:
14.5 environmental hazards:
14.6 special precautions for user:

SECTION 15: regulatory information
15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture:

EU Regulations

Regulation (EC) No. 2037/2000 Substances that deplete the ozone layer:
none

Regulation (EC) No. 850/2004 on persistent organic pollutants:
none

national regulations
water hazard class (WGK):
WGK 1: slightly water-endangering.

15.2 chemical safety assessment: No Chemical Safety Assessment has been carried out.
SECTION 16: other information

revision Information: Vertical lines in the margin indicate an amendment.

wording of the H-statements in section 2 and 3

H315 Causes skin irritation.

H317 May cause an allergic skin reaction

H318 Causes serious eye damage

H412 Harmful to aquatic life with long lasting effects

other information: The classification is in line with current EC lists. It is expanded, however, by information from technical literature and by information furnished by supplier companies. The classification results from the Conventional Method mentioned in regulation EU 1272/2008 (CLP).

revision date: 05.02.2018

section 10.5 has been corrected.

disclaimer: The data contained in this safety data sheet are based on our current knowledge and experience and are given to the best of our knowledge and belief. It characterizes the product only with regard to safety requirements for handling, transport and disposal. The data do not describe the product’s properties (tech. product specification). Neither should any agreed property nor the suitability of the product for any specific technical application be deduced from the data contained in this safety data sheet. Modifications on this document are not allowed. The data are not transferable to other products. In the case of mixing the product with other products or in the case of processing, the data in this safety data sheet are not necessarily valid for the new-made material. It is the responsibility of the recipient of the product to observe federal, state and local law. Please contact us to obtain up-to-date safety data sheets. This document was issued electronically and has no signature.