1 Identification

· Product identifier
  · Trade name: **EP63 Lemon Neutral Neutral Cleaner**
  · Article number: 2291278001, 2291257001, 2291334001
  · Recommended use: Neutral cleaner
  · Restrictions on use: All other uses than those indicated on the product label and technical data sheet.

· Details of the supplier of the safety data sheet
  · Manufacturer:
    Avmor Ltd.
    950, Michelin
    Laval, QC,
    Canada
    H7L 5C1
    1-800-387-8074
    www.avmor.com
    info@avmor.com
  · Client Identification Number 119100
  · Emergency telephone number: CANUTEC 1-613-996-6666

2 Hazard(s) identification

· Classification of the product:
  
  ![GHS05](image)
  
  Eye Dam. 1 H318 Causes serious eye damage.

  ![GHS07](image)
  
  Skin Sens. 1 H317 May cause an allergic skin reaction.

· Label elements
  · Hazard pictograms:
    ![GHS05](image) ![GHS07](image)

· Signal word: Danger

· Hazard-determining components of labeling:
  Alcohols, C9-C11, ethoxylated
  Alcohols, C12-15, ethoxylated
  Orange oil
  5-chloro-2-methyl-2H-isothiazol-3-one
Trade name: **EP63 Lemon Neutral Neutral Cleaner**

- **Hazard statements:**
  - H318 Causes serious eye damage.
  - H317 May cause an allergic skin reaction.

- **Precautionary statements**
  - P261 Avoid breathing dust, fume, gas, mist, vapors or spray
  - P280 Wear protective gloves and eye or face protection.
  - P272 Contaminated work clothing must not be allowed out of the workplace.
  - P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
  - P310 Immediately call a poison center or a doctor.
  - P321 Specific treatment (see on this label).
  - P302+P352 If on skin: Wash with plenty of water.
  - P333+P313 If skin irritation or rash occurs: Get medical attention.
  - P363 Wash contaminated clothing before reuse.
  - P501 Dispose of contents and container in accordance with local, regional and national regulations.

- **Classification system:**
  - **NFPA ratings (scale 0 - 4)**
    - Health = 2
    - Fire = 0
    - Reactivity = 0

- **Hazard not otherwise classified** None

- **Notes:** For the wording of the listed abbreviations refer to section 16.

### 3 Composition/information on ingredients

- **Dangerous components:**

<table>
<thead>
<tr>
<th>CAS</th>
<th>Component</th>
<th>% w/w</th>
</tr>
</thead>
<tbody>
<tr>
<td>68439-46-3</td>
<td>Alcohols, C9-C11, ethoxylated</td>
<td>2.5-&lt;3%</td>
</tr>
<tr>
<td>68131-39-5</td>
<td>Alcohols, C12-15, ethoxylated</td>
<td>1-&lt;2.5%</td>
</tr>
<tr>
<td>8008-57-9</td>
<td>Orange oil</td>
<td>0.1-&lt;0.3%</td>
</tr>
</tbody>
</table>

### 4 First-aid measures

- **General information:**
  - **After inhalation:** Rarely cause discomfort; supply fresh air and consult doctor in case of complaints.
  - **After skin contact:** May induce a skin irritation.
  - **After eye contact:** Rinse opened eye for several minutes under running water. Remove contact lenses, if present and easy to do so. Continue rinsing for a minimum of 15 to 60 minutes. Then consult a doctor.
  - **After ingestion:** If symptoms persist consult a doctor.
5 Fire-fighting measures

- Suitable extinguishing media
  - CO₂, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

- Specific hazards arising from the product
  - In case of accidental fire and extreme heat conditions, the following gaseous products can be released after water evaporation: hydrocarbons, carbon monoxides and dioxides (COₓ) and nitrogen dioxide (NOₓ).

- Advice for firefighters
  - Special protective equipment and precautions for fire-fighters: No special measures required.
  - Additional information: This product is not flammable.

6 Accidental release measures

- Personal precautions, protective equipment and emergency procedures
  - Wear recommended protective equipment(s). Keep unprotected persons away.

- Environmental precautions:
  - Do not allow to enter sewers/surface or ground water.

- Methods and material for containment and cleaning up:
  - Surround and absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).
  - Ensure adequate ventilation.

7 Handling and storage

- Handling:
  - Precautions for safe handling
    - Ensure good ventilation at the workplace.
    - Prevent formation of aerosols.

- Conditions for safe storage, including any incompatibilities
  - Requirements to be met by storerooms and receptacles: No special requirements.
  - Information about storage in one common storage facility: Not required.
  - Conditions for safe storage, including any incompatibilities: None.
  - Specific end use(s): No further relevant information available.

8 Exposure controls/personal protection

- Appropriate engineering controls
  - Ensure appropriate aeration and ventilation.
## Control parameters

- **Components with limit values that require monitoring at the workplace:**
  The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

- **Additional information:** The lists that were valid during the creation were used as basis.

## Exposure controls

- **Personal protective equipment:**

  ![Tightly sealed goggles]

- **General protective and hygienic measures:**
  - Avoid contact with the eyes and skin.
  - Immediately remove all soiled and contaminated clothing.
  - Wash hands before breaks and at the end of work.
  - Avoid breathing dust, fume, gas, mist, vapors or spray

- **Breathing equipment:** Not required.

- **Protection of hands:** Not required.

- **Eye protection:** Tightly sealed goggles

- **Body protection:** No special measures required.

## 9 Physical and chemical properties

<table>
<thead>
<tr>
<th>Information on basic physical and chemical properties</th>
</tr>
</thead>
<tbody>
<tr>
<td>General Information</td>
</tr>
<tr>
<td>Appearance:</td>
</tr>
<tr>
<td>- Form: Fluid</td>
</tr>
<tr>
<td>- Colour: Yellow</td>
</tr>
<tr>
<td>Odour: Citrus.</td>
</tr>
<tr>
<td>Odour threshold: Not determined.</td>
</tr>
</tbody>
</table>

| pH-value at 25 °C: 7.5-8.5 |

<table>
<thead>
<tr>
<th>Change in condition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Melting point/Melting range: Undetermined.</td>
</tr>
<tr>
<td>Boiling point/Boiling range: 100 °C</td>
</tr>
</tbody>
</table>

| Flash point: Not determined. |

| Flammability (solid, gaseous): Not applicable. |

<table>
<thead>
<tr>
<th>Ignition temperature:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Decomposition temperature: Not determined.</td>
</tr>
</tbody>
</table>

| Auto igniting: Product is not selfigniting. |

| Danger of explosion: Product does not present an explosion hazard. |

<table>
<thead>
<tr>
<th>Explosion limits:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lower: Not determined.</td>
</tr>
</tbody>
</table>
Trade name: **EP63 Lemon Neutral Neutral Cleaner**

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Upper</td>
<td>Not determined.</td>
</tr>
<tr>
<td>Vapour pressure at 20 °C:</td>
<td>23 hPa</td>
</tr>
<tr>
<td>Density at 25 °C:</td>
<td>1.000-1.020 g/cm³</td>
</tr>
<tr>
<td>Relative density</td>
<td>Not determined.</td>
</tr>
<tr>
<td>Vapour density (air=1)</td>
<td>Not determined.</td>
</tr>
<tr>
<td>Evaporation rate</td>
<td>Not determined.</td>
</tr>
<tr>
<td>Solubility in / Miscibility with</td>
<td>Fully miscible</td>
</tr>
<tr>
<td>Water</td>
<td></td>
</tr>
<tr>
<td>Partition coefficient (n-octanol/water):</td>
<td>Not determined.</td>
</tr>
<tr>
<td>Viscosity</td>
<td></td>
</tr>
<tr>
<td>Dynamic</td>
<td>Not determined.</td>
</tr>
<tr>
<td>Solvent content:</td>
<td>0.2 %</td>
</tr>
<tr>
<td>Organic solvents:</td>
<td></td>
</tr>
</tbody>
</table>

**10 Stability and reactivity**

- **Reactivity** Not determined.
- **Chemical stability**
  - **Thermal decomposition / conditions to be avoided:** No decomposition if used according to specifications.
- **Possibility of hazardous reactions** No dangerous reactions known.
- **Conditions to avoid** Avoid freezing and extreme heat conditions.
- **Incompatible materials:** This product may react with strong oxidizing agents.
- **Hazardous decomposition products:**
  In case of decomposition: carbon monoxide and carbon dioxide and traces of volatile halogenated compounds.

**11 Toxicological information**

- **Information on the likely routes of exposure** Skin and eyes contact
- **Acute toxicity:**
  - **Numerical measures of toxicity**
    - **Components of toxicological importance**
      - **Mean of exposure**
      - **Type**
      - **Value (Species)**

### ATE (Acute Toxicity Estimates)

<table>
<thead>
<tr>
<th>Mean of exposure</th>
<th>Type</th>
<th>Value (Species)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Oral</td>
<td>LD50</td>
<td>45374 mg/kg (rat)</td>
</tr>
<tr>
<td>Dermal</td>
<td>LD50</td>
<td>43478 mg/kg</td>
</tr>
<tr>
<td>Inhalative</td>
<td>LC50 (4 h)</td>
<td>99.4 mg/L (rat)</td>
</tr>
</tbody>
</table>

### 68131-39-5 Alcohols, C12-15, ethoxylated

<table>
<thead>
<tr>
<th>Mean of exposure</th>
<th>Type</th>
<th>Value (Species)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Oral</td>
<td>LD50</td>
<td>&gt;5000 mg/kg (rat)</td>
</tr>
<tr>
<td>Dermal</td>
<td>LD50</td>
<td>&gt;2000 mg/kg (rat)</td>
</tr>
<tr>
<td>Inhalative</td>
<td>LC50 (4 h)</td>
<td>&gt;1.6 mg/L (rat)</td>
</tr>
</tbody>
</table>
Trade name: **EP63 Lemon Neutral Neutral Cleaner**

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Irritation of skin</td>
<td>OECD guideline 404 Not classified. (rabbit)</td>
</tr>
<tr>
<td>Irritation of eyes</td>
<td>OECD, guideline 405 cat. 1 (rabbit)</td>
</tr>
<tr>
<td>Sensitization</td>
<td>OECD, guideline 406 Not classified. (guinea pig)</td>
</tr>
</tbody>
</table>

**8008-57-9 Orange oil**

<table>
<thead>
<tr>
<th>Route</th>
<th>LD50</th>
</tr>
</thead>
<tbody>
<tr>
<td>Oral</td>
<td>4400 mg/kg (rat)</td>
</tr>
</tbody>
</table>

- **Symptoms related to the physical, chemical and toxicological characteristics**
  - by inhalation:
    - Vapours may cause irritation to the airways. Inhalation of larger amounts may induce discomfort, nausea, dizziness, headache, narcosis, and unconsciousness.
  - If on the skin: May cause irritation by prolonged contact with skin.
  - If on the eye: Strong irritant with the danger of severe eye injury.
  - after ingestion: May cause irritation of the gastrointestinal tract, nausea, vomiting and headache.
  - Sensitization: No sensitizing effects known.

- **Delayed and immediate effects, and chronic effects from short-term and long-term exposure**
  - Prolonged or frequent contact can cause eczema and inflammation of the skins as a results of degreasing.

- **Additional toxicological information:**
  - The product shows the following dangers according to internally approved calculation methods for preparations:
    - Irritant

- **Carcinogenic categories**
  - IARC (International Agency for Research on Cancer)
    - None of the ingredients is listed.
  - NTP (National Toxicology Program)
    - None of the ingredients is listed.

**12 Ecological information**

- **Toxicity**
  - **Aquatic toxicity:**

  **68131-39-5 Alcohols, C12-15, ethoxylated**

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>EC50 (48 h, OECD guideline 202)</td>
<td>0.23 mg/L (daphnia magna [water flea])</td>
</tr>
<tr>
<td>EC50 (72 h, OECD guideline 201) (static)</td>
<td>0.75 mg/L (pseudokirchnerella subcapitata)</td>
</tr>
<tr>
<td>LC50 (96 h, OECD guideline 203)</td>
<td>1.3-1.7 mg/L (oncorhynchus mykiss [rainbow trout])</td>
</tr>
<tr>
<td>NOEC (21 d, ASTM 1988)</td>
<td>0.77 mg/L (daphnia magna [water flea])</td>
</tr>
<tr>
<td>NOEC (30 d, OECD directive 204) (dynamic)</td>
<td>0.11-0.28 mg/L (pimephales promelas [fathead minnow])</td>
</tr>
</tbody>
</table>

- **Persistence and degradability**
  - Organic compounds of this product are readily biodegradable according to the OECD Guideline 301.

- **Behavior in environmental systems:**
  - Bioaccumulative potential: Does not accumulate in organisms
  - Mobility in soil: No further relevant information available.

- **Ecotoxicity**
  - No relevant information available

(Contd. on page 7)
13 Disposal considerations

- General notes: Not known to be hazardous to water.

- Waste treatment methods
  - Recommendation:
    Must not be disposed of together with household garbage. Do not allow product to reach sewage system unless significantly diluted or neutralized.

- Uncleaned packagings:
  - Recommendation: Disposal must be made according to official regulations.
  - Recommended cleansing agent: Water.

14 Transport information

- DOT, ADN, IMDG, IATA
  Not regulated.

- UN proper shipping name
  - DOT
    Not regulated.

- Transport hazard class(es)
  - Class
    Not regulated.

- Packing group
  - DOT
    Not regulated.

- Environmental hazards:
  - Marine pollutant:
    No

- Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code
  Not applicable.

15 Regulatory information

- Safety, health and environmental regulations/legislation specific for the substance or mixture
  - Chemicals known to cause cancer:
    None of the ingredients is listed.
  - Chemicals known to cause reproductive toxicity for females:
    None of the ingredients is listed.
  - Chemicals known to cause reproductive toxicity for males:
    None of the ingredients is listed.
  - Chemicals known to cause developmental toxicity:
    None of the ingredients is listed.
  - EPA (Environmental Protection Agency)
    None of the ingredients is listed.
  - TLV (Threshold Limit Value established by ACGIH)
    None of the ingredients is listed.
Safety Data Sheet
acc. to SOR/2015-17 and OSHA 29 CFR Parts 1910, 1915, 1926

Trade name: **EP63 Lemon Neutral Neutral Cleaner**

- NIOSH-Ca (National Institute for Occupational Safety and Health)

| None of the ingredients is listed. |

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.

- **Date of creation/last revision:** 05/06/2015
- **Abbreviations and acronyms:**
  - 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
  - DOT: US Department of Transportation
  - IATA: International Air Transport Association
  - ACGIH: American Conference of Governmental Industrial Hygienists
  - 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)
  - NFPA: National Fire Protection Association (USA)
  - LC50: Lethal concentration, 50 percent
  - LD50: Lethal dose, 50 percent
  - Eye Dam. 1: Serious eye damage/eye irritation, Hazard Category 1
  - Skin Sens. 1: Sensitisation - Skin, Hazard Category 1