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

1.1. Product identifier
- **Product form**: Mixture
- **Trade name**: Septihol® Sterile Sterile Alcohol Solution
- **Product code**: 6248

1.2. Relevant identified uses of the substance or mixture and uses advised against
1.2.1. Relevant identified uses
- **Industrial/Professional use spec**: Industrial Professional use

1.2.2. Uses advised against
No additional information available.

1.3. Details of the supplier of the safety data sheet

Manufacturer:
STERIS Corporation
P. O. Box 147, St. Louis, MO 63166, US
Telephone Number for Information: 1-800-444-9009 (Customer Service-Scientific Products)
US Emergency Telephone No.1-314-535-1395 (STERIS); 1-800-424-9300 (CHEMTREC)

Supplier:
Allied Scientific Products
102 Bakehouse Rd.
Kensington Vic. 3031
Australia
Telephone: 1300 244724
Level 4
17 Albert St.
Auckland CBD 1010
New Zealand
Tel: 0508 338 423, Fax: 649 9913 2009.

1.4. Emergency telephone number
- **Emergency number**: 1 800 429 551 (24 hours) Australia
- **0508 338 423 (New Zealand)
- **1-703-741-5970 (CHEMTREC International)**

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to NOHSC:
Hazardous Substance. Dangerous Goods.

Classification according to Regulation (EC) No. 1272/2008 [CLP]
- Flam. Liq. 2  H225
- Eye Irrit. 2  H319
- STOT SE 3  H336

Full text of H-phrases: see section 16.

Adverse physicochemical, human health and environmental effects
No additional information available.

2.2. Label elements

Labelling according to Regulation (EC) No. 1272/2008 [CLP]
- **Hazard pictograms (CLP)**:
  - GHS02
  - GHS07

- **Signal word (CLP)**: Danger
- **Hazard statements (CLP)**:
  - H225 - Highly flammable liquid and vapour
  - H319 - Causes serious eye irritation
  - H336 - May cause drowsiness or dizziness
Precautionary statements (CLP) | P210 - Keep away from heat, open flames, hot surfaces, sparks. - No smoking.
P240 - Ground/bond container and receiving equipment
P241 - Use explosion-proof ventilating, lighting, electrical equipment
P261 - Avoid breathing vapours, spray, mist
P304+P340 - IF INHALED: remove victim to fresh air and keep at rest in a position comfortable for breathing
P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P501 - Dispose of contents/container to Comply with applicable local, national and international regulation.

2.3. Other hazards
No additional information available.

SECTION 3: Composition/information on ingredients

3.1. Substance
Not applicable.

3.2. Mixture

<table>
<thead>
<tr>
<th>Name</th>
<th>Product identifier</th>
<th>%</th>
<th>Classification according to Regulation (EC) No. 1272/2008 [CLP]</th>
</tr>
</thead>
<tbody>
<tr>
<td>Isopropyl alcohol</td>
<td>(CAS No) 67-63-0</td>
<td>40-70</td>
<td>Flam. Liq. 2, H225</td>
</tr>
<tr>
<td></td>
<td>(EC no) 200-661-7</td>
<td></td>
<td>Eye Irrit. 2, H319</td>
</tr>
<tr>
<td></td>
<td>(EC index no) 603-117-00-0</td>
<td></td>
<td>STOT SE 3, H336</td>
</tr>
<tr>
<td>Other Non-Hazardous Ingredients</td>
<td>NA</td>
<td>Up to 100</td>
<td>NA</td>
</tr>
</tbody>
</table>

Full text of H-phrases: see section 16.

SECTION 4: First aid measures

4.1. Description of first aid measures

First-aid measures general : Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible).
First-aid measures after inhalation : Remove victim to fresh air and keep at rest in a position comfortable for breathing. If not breathing, give artificial respiration. In all cases of doubt, or when symptoms persist, seek medical advice.
First-aid measures after skin contact : Immediately flush skin with plenty of water for at least 15 minutes. Remove/ Take off immediately all contaminated clothing. Seek medical attention if irritation develops.
First-aid measures after eye contact : Immediately flush eyes thoroughly with water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Obtain medical attention if pain, blinking or redness persist.
First-aid measures after ingestion : Rinse mouth. Do NOT induce vomiting. Obtain emergency medical attention. Give water or milk if the person is fully conscious.

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

Symptoms/injuries after inhalation : May cause drowsiness or dizziness.
Symptoms/injuries after skin contact : Frequent or prolonged contact with skin may cause dermal irritation.
Symptoms/injuries after eye contact : Causes eye irritation. tearing.
Symptoms/injuries after ingestion : Ingestion may cause nausea and vomiting.

4.3. Indication of any immediate medical attention and special treatment needed
No additional information available.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media : Dry powder. Water fog, alcohol foam, carbon dioxide.
Unsuitable extinguishing media : Do not use a heavy water stream.

5.2. Special hazards arising from the substance or mixture

Fire hazard : Highly flammable liquid and vapour.
Explosion hazard : May form flammable/explosive vapour-air mixture.

5.3. Advice for firefighters

Firefighting instructions : Use water spray or fog for cooling exposed containers. Exercise caution when fighting any chemical fire. Prevent fire-fighting water from entering environment. Evacuate the personnel away from the flames.
Protective equipment for firefighters : Full protective flameproof clothing. Do not enter fire area without proper protective equipment, including respiratory protection. Wear positive pressure air supplied respirator if required by safe entry procedures.
Other information : Heat may build pressure, rupturing closed containers, spreading fire and increasing risk of burns and injuries. Cool closed containers exposed to fire with water spray.
SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General measures: Remove ignition sources. Use special care to avoid static electric charges. No naked lights. No smoking. Avoid breathing mist or vapor.

6.1.1. For non-emergency personnel

Protective equipment: Refer to section 8.
Emergency procedures: Evacuate unnecessary personnel.

6.1.2. For emergency responders

Protective equipment: Equip cleanup crew with proper protection.
Emergency procedures: Ventilate area.

6.2. Environmental precautions

Prevent entry to sewers and public waters. Notify authorities if liquid enters sewers or public waters.

6.3. Methods and material for containment and cleaning up

Methods for cleaning up: Soak up spills with inert solids, such as clay or diatomaceous earth as soon as possible. Collect spillage. Store away from other materials. Small spills may be flushed with large amounts of water; larger spills should be collected for disposal. Prevent large quantities from entering sewers, watercourses or low areas.

6.4. Reference to other sections

See Heading 8. Exposure controls and personal protection.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Additional hazards when processed: Handle empty containers with care because residual vapours are flammable.
Precautions for safe handling: Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Provide good ventilation in process area to prevent formation of vapour. No naked lights. No smoking. Use only non-sparking tools. Avoid breathing mist or vapor. Use only outdoors or in a well-ventilated area. Do not spray into eyes. Keep away from heat and direct sunlight.

7.2. Conditions for safe storage, including any incompatibilities

Technical measures: Proper grounding procedures to avoid static electricity should be followed. Use explosion-proof electrical equipment. Ensure adequate ventilation. A washing facility/water for eye and skin cleaning purposes should be present.
Storage conditions: Keep in fireproof place. Keep container tightly closed. Keep only in the original container in a cool well ventilated place.
Incompatible materials: Strong oxidizing agents.
Heat and ignition sources: Store away from excessive heat. Remove all sources of ignition. These can cause flammability/explosion hazards.

7.3. Specific end use(s)

No additional information available.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

<table>
<thead>
<tr>
<th>Isopropyl alcohol (67-63-0)</th>
<th>United Kingdom WEL TWA (mg/m³)</th>
<th>999 mg/m³</th>
</tr>
</thead>
<tbody>
<tr>
<td>United Kingdom</td>
<td>WEL TWA (ppm)</td>
<td>400 ppm</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>WEL STEL (mg/m³)</td>
<td>1250 mg/m³</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>WEL STEL (ppm)</td>
<td>500 ppm</td>
</tr>
<tr>
<td>USA ACGIH</td>
<td>ACGIH TWA (ppm)</td>
<td>200 ppm</td>
</tr>
<tr>
<td>USA ACGIH</td>
<td>ACGIH STEL (ppm)</td>
<td>400 ppm</td>
</tr>
<tr>
<td>USA IDLH</td>
<td>US IDLH (ppm)</td>
<td>2000 ppm (10% LEL)</td>
</tr>
<tr>
<td>USA NIOSH</td>
<td>NIOSH REL (TWA) (mg/m³)</td>
<td>980 mg/m³</td>
</tr>
<tr>
<td>USA NIOSH</td>
<td>NIOSH REL (TWA) (ppm)</td>
<td>400 ppm</td>
</tr>
<tr>
<td>USA NIOSH</td>
<td>NIOSH REL (STEL) (mg/m³)</td>
<td>1225 mg/m³</td>
</tr>
<tr>
<td>USA NIOSH</td>
<td>NIOSH REL (STEL) (ppm)</td>
<td>500 ppm</td>
</tr>
<tr>
<td>USA OSHA</td>
<td>OSHA PEL (TWA) (mg/m³)</td>
<td>980 mg/m³</td>
</tr>
<tr>
<td>USA OSHA</td>
<td>OSHA PEL (TWA) (ppm)</td>
<td>400 ppm</td>
</tr>
</tbody>
</table>
### 8.2. Exposure controls

| Appropriate engineering controls | Emergency eye wash fountains and safety showers should be available in the immediate vicinity of any potential exposure. Provide local exhaust or general room ventilation. Provide local exhaust or general room ventilation to minimize vapour concentrations. |
| Personal protective equipment | Avoid all unnecessary exposure. The following pictograms represent the minimum requirements for personal protective equipment. Personal protective equipment should be selected based upon the conditions under which this product is handled or used. Protective goggles. Protective clothing. Gloves. |

#### Hand protection
- Wear protective gloves. rubber gloves.

#### Eye protection
- Chemical goggles or face shield.

#### Skin and body protection
- Wear protective clothing. Wear protective shoes.

#### Respiratory protection
Where exposure through inhalation may occur from use, respiratory protection equipment is recommended.

#### Other information
- Do not eat, drink or smoke during use.

### SECTION 9: Physical and chemical properties

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

| Physical state | Liquid |
| Appearance | Colorless liquid at low temperature or under pressure |
| Colour | Colourless |
| Odour | Alcohol odour |
| Odour threshold | No data available |
| pH | No data available |
| Relative evaporation rate (butylacetate=1) | No data available |
| Melting point | No data available |
| Freezing point | No data available |
| Boiling point | No data available |
| Flash point | 21 °C Closed cup |
| Self ignition temperature | No data available |
| Decomposition temperature | No data available |
| Flammability (solid, gas) | No data available |
| Vapour pressure | No data available |
| Relative vapour density at 20 °C | No data available |
**Septihol® Sterile**
Sterile Alcohol Solution
Safety Data Sheet
according to Regulation (EC) No. 453/2010

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Relative density</td>
<td>No data available</td>
</tr>
<tr>
<td>Density</td>
<td>0.87 Specific Gravity</td>
</tr>
<tr>
<td>Solubility</td>
<td>Water: completely soluble</td>
</tr>
<tr>
<td>Log Pow</td>
<td>No data available</td>
</tr>
<tr>
<td>Log Kow</td>
<td>No data available</td>
</tr>
<tr>
<td>Viscosity, kinematic</td>
<td>No data available</td>
</tr>
<tr>
<td>Viscosity, dynamic</td>
<td>No data available</td>
</tr>
<tr>
<td>Explosive properties</td>
<td>No data available</td>
</tr>
<tr>
<td>Oxidising properties</td>
<td>No data available</td>
</tr>
<tr>
<td>Explosive limits</td>
<td>No data available</td>
</tr>
</tbody>
</table>

**9.2. Other information**
No additional information available.

**SECTION 10: Stability and reactivity**

**10.1. Reactivity**
No additional information available.

**10.2. Chemical stability**
The product is stable at normal handling and storage conditions. Exposure to heat may cause bursting. Highly flammable liquid and vapour. May form flammable/explosive vapour-air mixture.

**10.3. Possibility of hazardous reactions**
Not established.

**10.4. Conditions to avoid**
Direct sunlight. Extremely high or low temperatures. Open flame.

**10.5. Incompatible materials**
Strong acids. Strong bases.

**10.6. Hazardous decomposition products**

**SECTION 11: Toxicological information**

**11.1. Information on toxicological effects**

<table>
<thead>
<tr>
<th>Effect</th>
<th>Classification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acute toxicity</td>
<td>Not classified</td>
</tr>
<tr>
<td>Septihol® Sterile</td>
<td></td>
</tr>
<tr>
<td>LD50 oral rat</td>
<td>&gt; 5000 mg/kg</td>
</tr>
<tr>
<td>LC50 inhalation rat (ppm)</td>
<td>&gt; 5000 ppm/1h</td>
</tr>
<tr>
<td>Isopropyl alcohol (67-63-0)</td>
<td></td>
</tr>
<tr>
<td>LD50 oral rat</td>
<td>4396 mg/kg</td>
</tr>
<tr>
<td>LD50 dermal rabbit</td>
<td>12800 mg/kg</td>
</tr>
<tr>
<td>LC50 inhalation rat (ppm)</td>
<td>16000 ppm (Exposure time: 8 h)</td>
</tr>
<tr>
<td>ATE (oral)</td>
<td>4396,000 mg/kg bodyweight</td>
</tr>
<tr>
<td>ATE (dermal)</td>
<td>12800,000 mg/kg bodyweight</td>
</tr>
<tr>
<td>Skin corrosion/irritation</td>
<td>Not classified</td>
</tr>
<tr>
<td>Based on available data, the classification criteria are not met</td>
<td></td>
</tr>
<tr>
<td>Serious eye damage/irritation</td>
<td>Causes serious eye irritation</td>
</tr>
<tr>
<td>Respiratory or skin sensitisation</td>
<td>Not classified</td>
</tr>
<tr>
<td>Based on available data, the classification criteria are not met</td>
<td></td>
</tr>
<tr>
<td>Germ cell mutagenicity</td>
<td>Not classified</td>
</tr>
<tr>
<td>Based on available data, the classification criteria are not met</td>
<td></td>
</tr>
<tr>
<td>Carcinogenicity</td>
<td>Not classified</td>
</tr>
<tr>
<td>Based on available data, the classification criteria are not met</td>
<td></td>
</tr>
<tr>
<td>Reproductive toxicity</td>
<td>Not classified</td>
</tr>
<tr>
<td>Based on available data, the classification criteria are not met</td>
<td></td>
</tr>
<tr>
<td>Specific target organ toxicity (single exposure)</td>
<td>May cause drowsiness or dizziness.</td>
</tr>
<tr>
<td>Specific target organ toxicity (repeated exposure)</td>
<td>Not classified</td>
</tr>
<tr>
<td>Based on available data, the classification criteria are not met</td>
<td></td>
</tr>
</tbody>
</table>
Aspiration hazard : Not classified
   Based on available data, the classification criteria are not met

Potential Adverse human health effects and symptoms : Based on available data, the classification criteria are not met.

SECTION 12: Ecological information

12.1. Toxicity

**Isopropyl alcohol (67-63-0)**

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>LC50 fishes 1</td>
<td>9640 mg/l (Exposure time: 96 h - Species: Pimephales promelas [flow-through])</td>
</tr>
<tr>
<td>EC50 Daphnia 1</td>
<td>13299 mg/l (Exposure time: 48 h - Species: Daphnia magna)</td>
</tr>
<tr>
<td>EC50 other aquatic organisms 1</td>
<td>&gt; 1000 mg/l (Exposure time: 96 h - Species: Desmodesmus subspicatus)</td>
</tr>
<tr>
<td>LC50 fish 2</td>
<td>11130 mg/l (Exposure time: 96 h - Species: Pimephales promelas [static])</td>
</tr>
<tr>
<td>EC50 other aquatic organisms 2</td>
<td>&gt; 1000 mg/l (Exposure time: 72 h - Species: Desmodesmus subspicatus)</td>
</tr>
</tbody>
</table>

12.2. Persistence and degradability

**Septihol® Sterile**

Persistence and degradability : Not established.

12.3. Bioaccumulative potential

**Septihol® Sterile**

Bioaccumulative potential : Not established.

**Isopropyl alcohol (67-63-0)**

Log Pow : 0.05 (at 25 °C)

12.4. Mobility in soil

No additional information available.

12.5. Results of PBT and vPvB assessment

No additional information available.

12.6. Other adverse effects

: Avoid release to the environment

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Waste disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.

Additional information : Handle empty containers with care because residual vapours are flammable.

Ecology - waste materials : Avoid release to the environment.

SECTION 14: Transport information

In accordance with ADR / RID / IMDG / IATA / ADN

14.1. UN number

<table>
<thead>
<tr>
<th>UN-No</th>
<th>1219</th>
</tr>
</thead>
<tbody>
<tr>
<td>UN-No.(IATA)</td>
<td>1219</td>
</tr>
<tr>
<td>UN-No. (IMDG)</td>
<td>1219</td>
</tr>
</tbody>
</table>

14.2. UN proper shipping name

Proper Shipping Name : ISOPROPANOL (ISOPROPYL ALCOHOL)

Transport document description : UN 1219 ISOPROPANOL (ISOPROPYL ALCOHOL), 3, II

14.3. Transport hazard class(es)

| Class (UN) | 3 |
| Class (IATA) | 3 |
| Class (IMDG) | 3 |

Hazard labels (UN) : 3
Septihol® Sterile
Sterile Alcohol Solution
Safety Data Sheet
according to Regulation (EC) No. 453/2010

14.4. Packing group
Packing group (UN) : II

14.5. Environmental hazards
Other information : No supplementary information available.

14.6. Special precautions for user
Special transport precautions : Road/Rail: ADR/RID Class: UN 1219, Isopropanol, 3, Flammable Liquid, PG II, LTD QTY (European labeled 16 fl. oz. size only). Sea: (US and Canada): (16 fl. oz. and 32 fl. oz.) UN 1219, Isopropanol, 3, Flammable Liquid, PG II, LTD QTY (1 gal.): UN 1219, Isopropanol, 3, Flammable Liquid, PG II
Air: All package sizes not approved for air.

14.6.1. Overland transport
Hazard identification number (Kemler No.) : 33
Classification code (UN) : F1
Orange plates : [Image]

Special provision (ADR) : 601
Transport category (ADR) : 2
Tunnel restriction code : D/E
Limited quantities (ADR) : 1L
Excepted quantities (ADR) : E2
EAC code : •2YE

14.6.2. Transport by sea
No additional information available.

14.6.3. Air transport
No additional information available.

14.6.4. Australia
ADG/HazChem Code: 2[Y]E

14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code
Not applicable.

SECTION 15: Regulatory information

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

15.1.1. Australia
AICS Listed or Exempt. Hazard Category : Highly Flammable, Irritant

15.1.2. EU-Regulations
No REACH Annex XVII restrictions
Contains no REACH candidate substance

Other information, restriction and prohibition regulations : This preparation is classified as dangerous as defined by the UK Chemicals (Hazard Information and Packaging for Supply) Regulations. These regulations implement a number of EC Directives including the Dangerous Substances Directive (67/548/EEC and amendments), the Dangerous Preparations Directive (1999/45/EEC and amendments) and the Safety Data Sheets Directive (91/155/EEC and amendment).

15.1.3. National regulations
No additional information available.

15.2. Chemical safety assessment
No chemical safety assessment has been carried out.

SECTION 16: Other information

Revision Date : 06/11/2018

Other information : None.

Full text of H- phrases:

<table>
<thead>
<tr>
<th>H-phrase</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Eye Irrit. 2</td>
<td>Serious eye damage/eye irritation, Category 2</td>
</tr>
<tr>
<td>Flamm. Liqu. 2</td>
<td>Flammable liquids Category 2</td>
</tr>
<tr>
<td>STOT SE 3</td>
<td>Specific target organ toxicity (single exposure) Category 3</td>
</tr>
<tr>
<td>H225</td>
<td>Highly flammable liquid and vapour</td>
</tr>
</tbody>
</table>
Septihol® Sterile
Sterile Alcohol Solution
Safety Data Sheet
according to Regulation (EC) No. 453/2010

SDS EU (REACH Annex II)

The information on this sheet is not a specification and does not guarantee specific properties. The information is intended to provide general knowledge as to health and safety based upon our knowledge of the handling, storage and use of the product. It is not applicable to unusual or non-standard uses of the product or where instruction or recommendations are not followed.