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

1.1. Product identifier
   Omstar Residual (formerly Omstar R4000 Fuel Conditioner)
   Product Code: 21120-Omstar Residual

1.2. Relevant identified uses of the substance or mixture and uses advised against
   Intended use: See Technical Data Sheet.

1.3. Details of the supplier of the safety data sheet
   Manufacturer: LUBRICATING SPECIALTIES COMPANY
   8015 PARAMOUNT BLVD.
   PICO RIVERA, CA 90660

   Telephone No. (562) 776-4000

1.4. Emergency telephone number
   (800) 424-9300 24hr

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

2.2. Label elements
   Using the Toxicity Data listed in section 11 & 12 the product is labeled as follows.

   P273 Avoid release to the environment.
   P391 Collect spillage.
   P501 Dispose of contents / container in accordance with local / national regulations.

   HMIS Health: 0
   NFPA Health: 0
   Fire: 1
   Fire: 1
Physical Hazards: 0
Reactivity: 0
PPE: C
Special Hazards: --

2.3. Other hazards
This product contains no PBT/vPvB chemicals.

SECTION 3: Composition/information on ingredients

<table>
<thead>
<tr>
<th>Ingredient/Chemical Designations</th>
<th>Weight %</th>
<th>EC No. 1272/2008 / GHS Classification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Naphtha (petroleum), heavy aromatic</td>
<td>&lt;50</td>
<td>Asp. Tox. 1;H304</td>
</tr>
<tr>
<td>CAS Number: 0064742-94-5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Acid Methyl Esters</td>
<td>&lt;40</td>
<td>Not Classified</td>
</tr>
<tr>
<td>CAS Number: Proprietary or N/A</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Polyol Esters</td>
<td>&lt;20</td>
<td>Not Classified</td>
</tr>
<tr>
<td>CAS Number: Proprietary or N/A</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Distillate (petroleum) hydrotreated heavy naphthenic</td>
<td>&lt;10</td>
<td>Not Classified</td>
</tr>
<tr>
<td>CAS Number: 0064742-52-5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Naphthalene</td>
<td>&lt;5</td>
<td>Carc. 2;H351</td>
</tr>
<tr>
<td>CAS Number: 0000091-20-3</td>
<td></td>
<td>Acute Tox. 4;H302</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Aquatic Acute 1;H400</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Aquatic Chronic 1;H410</td>
</tr>
</tbody>
</table>

*The full texts of the phrases are shown in Section 16.*

SECTION 4: First aid measures

4.1. Description of first aid measures

General
In all cases of doubt, or when symptoms persist, seek medical attention.

Never give anything by mouth to an unconscious person.

Inhalation
If inhaled, remove person to fresh air and keep comfortable for breathing. If breathing has stopped, give artificial respiration. If breathing is difficult, give oxygen. If unconscious, place in the recovery position and seek medical attention immediately.

Skin
In case of contact, immediately rinse skin with plenty of water. Remove contaminated clothing and shoes. If skin irritation occurs, seek medical attention. Launder contaminated clothing before reuse.

Eye
In case of contact, immediately rinse eyes with plenty of fresh, clean water for at least 15 minutes. Remove contact lenses if present and continue rinsing. Seek medical attention immediately.

Ingestion
Do not induce vomiting. Call a physician or emergency medical facility immediately.

4.2. Most important symptoms and effects, both acute and delayed
No data available

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

SECTION 5: Fire-fighting measures

5.1. Extinguishing media
Use Carbon dioxide (CO2), dry chemical, or foam to extinguish flames.

5.2. Special hazards arising from the substance or mixture
Hazardous Decomposition Products: May form CO and CO2.

5.3. Advice for fire-fighters
Self-contained full-face positive pressure breathing apparatus (SCBA) should be used. Water can be used to cool and protect exposed material. Do not allow runoff water and contaminants from fire fighting to enter drains or water courses.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures
Avoid contact with spilled material. Use suitable personal protective equipment. Ventilate area if spilled in confined space or other poorly ventilated areas. Evacuate personnel to safe areas. Keep unnecessary personnel away.

6.2. Environmental precautions
Prevent entry into sewers and waterways. Report spills as required to appropriate authorities in accordance with all applicable regulations.

6.3. Methods and material for containment and cleaning up
Ventilate the area and avoid breathing vapors. Take the personal protective measures listed in section 8.

Contain and absorb spillage with non-combustible materials e.g. sand, earth, vermiculite. Place in closed containers outside buildings and dispose of according to the Waste Regulations. (See section 13).

Clean, preferably with a detergent. Do not use solvents.

Do not allow spills to enter drains or water courses.

If drains, sewers, streams or lakes are contaminated, inform the local water company immediately. In the case of contamination of rivers, streams or lakes the Environmental Protection Agency should also be informed.

Dispose of in accordance with all federal, state, and local environmental regulations.

SECTION 7: Handling and storage

7.1. Precautions for safe handling
Handling
Avoid skin and eye contact. Wash thoroughly after handling. Avoid breathing vapor. Use with adequate ventilation.

In Storage
Store in a dry location at room temperature.
Keep this container and vapors from the container away from heat and flame. Keep container closed and
maintain all original markings and labels.

7.2. Conditions for safe storage, including any incompatibilities

Keep away from strong oxidizing and reducing agents. CAUTION!!! Do not use cutting or welding torches on drums, even when empty. Do not reuse container. Containers, even those that have been emptied will retain product residue and vapors. Always obey hazard warnings and handle empty containers as if they were full.

7.3. Specific end use(s)

There are no exposure scenarios, see details in section 1.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

The following occupational exposure limits have been established.

<table>
<thead>
<tr>
<th>CAS Number</th>
<th>Ingredient</th>
<th>Source</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>0000091-20-3</td>
<td>Naphthalene</td>
<td>OSHA</td>
<td>TWA 10 ppm (50 mg/m3) STEL 15 ppm</td>
</tr>
<tr>
<td></td>
<td></td>
<td>ACGIH</td>
<td>10 ppm TWA 15 ppm STEL</td>
</tr>
<tr>
<td></td>
<td></td>
<td>NIOSH</td>
<td>TWA 10 ppm (50 mg/m3) ST 15 ppm (75 mg/m3)</td>
</tr>
<tr>
<td>0064742-52-5</td>
<td>Distillate (petroleum) hydrotreated heavy naphthenic</td>
<td>OSHA</td>
<td>No Established Limit</td>
</tr>
<tr>
<td></td>
<td></td>
<td>ACGIH</td>
<td>No Established Limit</td>
</tr>
<tr>
<td></td>
<td></td>
<td>NIOSH</td>
<td>No Established Limit</td>
</tr>
<tr>
<td>0064742-94-5</td>
<td>Naphtha (petroleum), heavy aromatic</td>
<td>OSHA</td>
<td>No Established Limit</td>
</tr>
<tr>
<td></td>
<td></td>
<td>ACGIH</td>
<td>No Established Limit</td>
</tr>
<tr>
<td></td>
<td></td>
<td>NIOSH</td>
<td>No Established Limit</td>
</tr>
<tr>
<td>Proprietary or N/A</td>
<td>Acid Methyl Esters</td>
<td>OSHA</td>
<td>No Established Limit</td>
</tr>
<tr>
<td>Proprietary or N/A</td>
<td>Polyol Esters</td>
<td>OSHA</td>
<td>No Established Limit</td>
</tr>
</tbody>
</table>

Contains mineral oil. The exposure limits for oil mist are 5 mg/m3 OSHA PEL and 10 mg/m3 ACGIH.

Carcinogen Data

<table>
<thead>
<tr>
<th>CAS No.</th>
<th>Ingredient</th>
<th>Source</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>0000091-20-3</td>
<td>Naphthalene</td>
<td>OSHA</td>
<td>Select Carcinogen: No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>IARC</td>
<td>Group 1: No; Group 2A: No; Group 2B: Yes; Group 3: No; Group 4: No;</td>
</tr>
<tr>
<td>0064742-52-5</td>
<td>Distillate (petroleum) hydrotreated heavy naphthenic</td>
<td>OSHA</td>
<td>Select Carcinogen: No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>IARC</td>
<td>Group 1: No; Group 2A: No; Group 2B: No; Group 3: No; Group 4: No;</td>
</tr>
<tr>
<td>0064742-94-5</td>
<td>Naphtha (petroleum), heavy aromatic</td>
<td>OSHA</td>
<td>Select Carcinogen: No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>IARC</td>
<td>Group 1: No; Group 2A: No; Group 2B: No; Group 3: No; Group 4: No;</td>
</tr>
<tr>
<td>Proprietary or N/A</td>
<td>Acid Methyl Esters</td>
<td>OSHA</td>
<td>Select Carcinogen: No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>IARC</td>
<td>Group 1: No; Group 2A: No; Group 2B: No; Group 3: No; Group 4: No;</td>
</tr>
</tbody>
</table>
### DNEL/PNEC values

No Data Available

### 8.2. Exposure controls

No special requirements under ordinary conditions of use and with adequate ventilation.

**Eye/face protection**

Wear safety glasses. If potential for splash or mist exists, wear chemical goggles or face shield.

**Skin protection**

Wear chemical resistant gloves. Gloves should be inspected before each use and discarded if they show tears, pinholes, or signs of wear.

**Other**

Gloves, overalls, apron, boots, or other suitable protective garments should be worn to minimize contact based on the task being performed.

**Respiratory protection**

Use NIOSH/OSHA approved respirator where high vapor concentrations are present.

**Thermal hazards**

No Data Available

---

## SECTION 9: Physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Appearance</strong></td>
<td>AMBER OILY LIQUID</td>
</tr>
<tr>
<td>Odor</td>
<td>Petroleum Odor</td>
</tr>
<tr>
<td>Odor threshold</td>
<td>Not Determined</td>
</tr>
<tr>
<td><strong>pH</strong></td>
<td>Not Measured</td>
</tr>
<tr>
<td>Melting point / freezing point (C)</td>
<td>Not Determined</td>
</tr>
<tr>
<td>Initial boiling point and boiling range (C)</td>
<td>Not Measured</td>
</tr>
<tr>
<td>Flash point (C)</td>
<td>&gt; 155</td>
</tr>
<tr>
<td>Evaporation rate (H2O = 1)</td>
<td>Not Determined</td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>Upper/lower flammability or explosive limits</td>
<td></td>
</tr>
<tr>
<td>Lower Explosive Limit:</td>
<td>Not Determined</td>
</tr>
<tr>
<td>Upper Explosive Limit:</td>
<td>Not Determined</td>
</tr>
<tr>
<td><strong>Vapor pressure (Pa)</strong></td>
<td>Not Determined</td>
</tr>
<tr>
<td><strong>Vapor density</strong></td>
<td>Heavier than air.</td>
</tr>
<tr>
<td><strong>Relative density</strong></td>
<td>0.8931</td>
</tr>
<tr>
<td><strong>Solubility(ies)</strong></td>
<td>negligible</td>
</tr>
</tbody>
</table>
Partition coefficient n-octanol/water (Log Kow)
Auto-ignition temperature (C)
Decomposition temperature
Viscosity (cSt)
  @ 100 C
  @ 40 C
Pour point temperature (C)
Volatile Organic Compounds
SADT

The data listed above are typical physical and chemical properties that do not constitute product specification.

9.2. Other information
DMSO extract by IP346: Less than 3.0 wt % (mineral oil component only)

SECTION 10: Stability and reactivity

10.1. Reactivity
No data available

10.2. Chemical stability
Material is normally stable at ambient temperature and pressure.

10.3. Possibility of hazardous reactions
May react with: oxidizing agents.

10.4. Conditions to avoid
High temperature, sparks, and open flames.

10.5. Incompatible materials
Keep away from strong oxidizing and reducing agents.

10.6. Hazardous decomposition products
Hazardous Decomposition Products: May form CO and CO2.

SECTION 11: Toxicological information

Acute toxicity

The preparation has been assessed using the Acute Toxicity Data listed below, and classified for toxicological hazards accordingly. See section 2 for details.

<table>
<thead>
<tr>
<th>Ingredient</th>
<th>Oral LD50, mg/kg</th>
<th>Skin LD50, mg/kg</th>
<th>Inhalation vapor LD50, mg/L/4hr</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acid Methyl Esters - (Proprietary or N/A)</td>
<td>Not Available</td>
<td>Not Available</td>
<td>Not Available</td>
</tr>
<tr>
<td>Distillate (petroleum) hydrotreated heavy naphthenic - (0064742-52-5)</td>
<td>&gt;5,000, Rat</td>
<td>5,000.00, Rabbit</td>
<td>Not Available</td>
</tr>
<tr>
<td>Naphtha (petroleum), heavy aromatic - (0064742-94-5)</td>
<td>Not Available</td>
<td>Not Available</td>
<td>Not Available</td>
</tr>
<tr>
<td>Ingredient</td>
<td>96 hr LC50 fish, mg/l</td>
<td>48 hr EC50 crustacea, mg/l</td>
<td>ErC50 algae, mg/l</td>
</tr>
<tr>
<td>------------</td>
<td>-----------------------</td>
<td>--------------------------</td>
<td>-----------------</td>
</tr>
<tr>
<td>Naphtha (petroleum), heavy aromatic - (0064742-94-5)</td>
<td>45.00, Pimephales promelas</td>
<td>12.00, Daphnia magna</td>
<td>2.50 (72 hr), Skeletonema costatum</td>
</tr>
<tr>
<td>Acid Methyl Esters - (Proprietary or N/A)</td>
<td>Not Available</td>
<td>Not Available</td>
<td>Not Available</td>
</tr>
<tr>
<td>Polyol Esters - (Proprietary or N/A)</td>
<td>Not Available</td>
<td>Not Available</td>
<td>Not Available</td>
</tr>
<tr>
<td>Distillate (petroleum) hydrotreated heavy napthenic - (0064742-52-5)</td>
<td>5,000.00, Oncorhynchus mykiss</td>
<td>1,000.00, Daphnia magna</td>
<td>1,000.00 (96 hr), Scenedesmus subspicatus</td>
</tr>
<tr>
<td>Naphthalene - (0000091-20-3)</td>
<td>1.20, Oncorhynchus gorbuscha</td>
<td>1.60, Daphnia magna</td>
<td>68.21 (72 hr), Scenedesmus subspicatus</td>
</tr>
</tbody>
</table>

12.2. Persistence and degradability
There is no data available on the preparation itself.

12.3. Bioaccumulative potential
Not Measured

12.4. Mobility in soil
No data available

12.5. Results of PBT and vPvB assessment
This product contains no PBT/vPvB chemicals.

12.6. Other adverse effects
No data available

SECTION 13: Disposal considerations

13.1. Waste treatment methods
Consult federal, state and local regulations regarding disposal methods, recycle used oil. Do not contaminate used oil with solvents or other chemicals.

SECTION 14: Transport information

14.1. UN number
14.2. UN proper shipping name
14.3. Transport hazard class(es)

US DOT Label
ADR/RID
IMDG
Sub Class

14.4. Packing group
Not applicable

14.5. Environmental hazards

ADR/RID
Environmentally Hazardous: Yes - Not regulated

IMDG
Marine Pollutant: Yes (Naphtha (petroleum), heavy aromatic) - Not regulated

14.6. Special precautions for user
No further information

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

SECTION 15: Regulatory information

National Legislation
United States:
The regulatory data in Section 15 is not intended to be all-inclusive, only selected regulations are represented.
All ingredients of this product are listed on the TSCA (Toxic Substance Control Act) Inventory or are not required to be listed on the TSCA Inventory.

SARA 311/312 (>0.1%): Not applicable

SARA 313 (>0.1%):
- 1,2,4-trimethylbenzene
- Naphthalene

CERCLA (>0.1%):
- Naphthalene

Inventory - Canada - Non-Domestic Substances List (NDSL):
- Not applicable

California Proposition 65 Cancer:
- Naphthalene

California Proposition 65 Developmental:
- Not applicable

California Proposition 65 Female Reproductive:
- Not applicable

California Proposition 65 Male Reproductive:
- Not applicable

Inventory - Australia - Inventory of Chemical Substances (AICS):
- 1,2,4-trimethylbenzene
- Distillate (petroleum) hydrotreated heavy naphthenic
- Naphtha (petroleum), heavy aromatic
- Naphthalene

Inventory - Japan Existing and New Chemical Substances (ENCS):
- 1,2,4-trimethylbenzene (3-7; 3-3427)
- Distillate (petroleum) hydrotreated heavy naphthenic
- Naphthalene (4-311)

Korean Existing Chemicals Inventory:
- Not applicable

Inventory of Existing Chemical Substances in China:
- Not applicable

Philippines Inventory of Chemicals and Chemical Substances (PICCS):
1,2,4-trimethylbenzene
Distillate (petroleum) hydrotreated heavy naphthenic
Naphtha (petroleum), heavy aromatic
Naphthalene

Taiwan List of Toxic Chemical
Substances regulated under
Toxic Chemical Substances
Control Act:

EU REACH: Annex XVII,
Dangerous Substances and
Preparations:
Distillate (petroleum) hydrotreated heavy naphthenic

Inventory - European Union -
European Inventory of Existing
Commercial Chemical
Substances (EINECS):
1,2,4-trimethylbenzene  (202-436-9)
Distillate (petroleum) hydrotreated heavy naphthenic  (265-155-0)
Naphtha (petroleum), heavy aromatic  (265-198-5)
Naphthalene  (202-049-5)

EU List of Notified Chemical
Substances (ELINCS):

Risk Phrases
R40 Limited evidence of a carcinogenic effect.
R51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

SECTION 16: Other information

This information has been compiled from sources considered to be dependable and is accurate to the best of Lubricating Specialties Company knowledge. Lubricating Specialties Company makes no warranty whatsoever, expressed or implied, of MERCHANTABILITY OR FITNESS FOR THE PARTICULAR PURPOSE, regarding the accuracy of such data or the results to be obtained from the use thereof. Lubricating Specialties Company assumes no responsibility for injury to recipient or third persons, or for any damage to any property and recipient assumes all such risks.

The full text of the phrases appearing in section 3 is:

H302 Harmful if swallowed
H304 May be fatal if swallowed and enters airways
H351 Suspected of causing cancer
H400 Very toxic to aquatic life
H410 Very toxic to aquatic life with long lasting effects

This is the first revision of this SDS format, changes from previous revision not applicable.