1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Material Identity
Product Name: AC 15W40 1/55 GA
General or Generic ID: PETROLEUM BASED-LUBRICATING OIL

Company
The Valvoline Company
P.O. Box 14000
Lexington, KY 40512

Telephone Numbers
Emergency: 1-800-274-5263
Information: 1-859-355-7206

2. COMPOSITION/INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>Ingredient(s)</th>
<th>CAS Number</th>
<th>% (by weight)</th>
</tr>
</thead>
<tbody>
<tr>
<td>ALIPHATIC PETROLEUM DISTILLATES</td>
<td>64742-65-0</td>
<td>80.0-90.0</td>
</tr>
<tr>
<td>DETERGENT/DISPERSANT ENGINE OIL PACKAGE</td>
<td></td>
<td>10.0-20.0</td>
</tr>
<tr>
<td>PETROLEUM DISTILLATE</td>
<td>64741-88-4</td>
<td>1.0-10.0</td>
</tr>
<tr>
<td>ZINC DIALKYLDITHIOPHOSPHATE</td>
<td>68649-42-3</td>
<td>2.2-2.2</td>
</tr>
</tbody>
</table>

3. HAZARDS IDENTIFICATION

Potential Health Effects

Eye
May cause mild eye irritation.

Skin
May cause mild skin irritation. Prolonged or repeated contact may dry and crack the skin.

Swallowing
Swallowing small amounts of this material during normal handling is not likely to cause harmful effects. Swallowing large amounts may be harmful. This material can get into the lungs during swallowing or vomiting. This results in lung inflammation and other lung injury.

Inhalation
It is possible to breathe this material under certain conditions of handling and use (for example, during heating, spraying, or stirring). Breathing small amounts of this material during normal handling is not likely to cause harmful effects. Symptoms usually occur at air concentrations higher than the recommended exposure limits (See Section 8).

Symptoms of Exposure
Signs and symptoms of exposure to this material through breathing, swallowing, and/or passage of the material through the skin may include: stomach or intestinal upset (nausea, vomiting, diarrhea) irritation (nose, throat, airways), pain in the abdomen.
Target Organ Effects
No data

Developmental Information
No data

Cancer Information
Used motor oil has been shown to cause skin cancer in laboratory animals continually exposed by repeated applications. Avoid prolonged or repeated skin contact.

Other Health Effects
No data

Primary Route(s) of Entry
No data

4. FIRST AID MEASURES

Eyes
If symptoms develop, immediately move individual away from exposure and into fresh air. Flush eyes gently with water for at least 15 minutes while holding eyelids apart; seek immediate medical attention.

Skin
Remove contaminated clothing. Wash exposed area with soap and water. If symptoms persist, seek medical attention. Launder clothing before reuse.

Swallowing
Seek medical attention. If individual is drowsy or unconscious, do not give anything by mouth; place individual on the left side with the head down. Contact a physician, medical facility, or poison control center for advice about whether to induce vomiting. If possible, do not leave individual unattended.

Inhalation
If symptoms develop, move individual away from exposure and into fresh air. If symptoms persist, seek medical attention. If breathing is difficult, administer oxygen. Keep person warm and quiet; seek immediate medical attention.

Note to Physicians
This material is an aspiration hazard. Potential danger from aspiration must be weighed against possible oral toxicity (See Section 3 - Swallowing) when deciding whether to induce vomiting. Preexisting disorders of the following organs (or organ systems) may be aggravated by exposure to this material: skin.

5. FIRE FIGHTING MEASURES

Flash Point
> 425.0 °F (218.3 °C) COC

Explosive Limit
No data

Autoignition Temperature
No data

Hazardous Products of Combustion

Fire and Explosion Hazards
Never use welding or cutting torch on or near drum (even empty) because product (even just residue) can ignite explosively. Dense smoke may be generated while burning.

Extinguishing Media
regular foam, carbon dioxide, dry chemical.

Fire Fighting Instructions
Water or foam may cause frothing which can be violent and possibly endanger the life of the firefighter. Wear a self-contained breathing apparatus with a full facepiece operated in the positive pressure demand mode with appropriate turn-out gear and chemical resistant personal protective equipment. Refer to the personal protective equipment section of this MSDS.

NFPA Rating
Health - 1, Flammability - 1, Reactivity - 0

6. ACCIDENTAL RELEASE MEASURES

Small Spill
Absorb liquid on vermiculite, floor absorbent or other absorbent material.

Large Spill
Prevent run-off to sewers, streams or other bodies of water. If run-off occurs, notify proper authorities as required, that a spill has occurred. Persons not wearing protective equipment should be excluded from area of spill until clean-up has been completed. Stop spill at source, dike area of spill to prevent spreading, pump liquid to salvage tank. Remaining liquid may be taken up on sand, clay, earth, floor absorbent, or other absorbent material and shoveled into containers.

7. HANDLING AND STORAGE

Handling
Containers of this material may be hazardous when emptied. Since emptied containers retain product residues (vapor, liquid, and/or solid), all hazard precautions given in the data sheet must be observed.

Storage
Not applicable

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Eye Protection
Not required under normal conditions of use. However, if misting
or splashing conditions exist, then safety glasses or chemical splash goggles are advised.

Skin Protection
Not normally required. However, wear resistant gloves such as nitrile rubber to prevent irritation which may result from prolonged or repeated skin contact with product. Wear normal work clothing covering arms and legs.

Respiratory Protections
Not required under normal conditions of use. However, if oil mists are generated above recommended PEL/TLV of 5 mg/m³, then a NIOSH/MSHA approved respirator is advised in absence of proper environmental control. (See your industrial hygienist.)

Engineering Controls
Not required under normal conditions of use. However, if unusual operating conditions exist, then provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below PEL/TLV (s).

Exposure Guidelines
Component
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ALIPHATIC PETROLEUM DISTILLATES (64742-65-0)
OSHA VPEL 5.000 mg/m³ - TWA Oil Mist
ACGIH TLV 5.000 mg/m³ - TWA Oil Mist

DETERGENT/DISPERSANT ENGINE OIL PACKAGE
No exposure limits established

PETROLEUM DISTILLATE (64741-88-4)
OSHA VPEL 5.000 mg/m³ - TWA
ACGIH TLV 5.000 mg/m³ - TWA

ZINC DIALKYLDITHIOPHOSPHATE (68649-42-3)
No exposure limits established

9. PHYSICAL AND CHEMICAL PROPERTIES

Boiling Point
No data

Vapor Pressure
No data

Specific Vapor Density
No data

Specific Gravity
.890 @ 60.00 F

Liquid Density
7.400 lbs/gal @ 60.00 F
.890 kg/l @ 15.60 C

Percent Volatiles (Including Water)
No data

Evaporation Rate
No data

Appearance
No data

State
LIQUID

Physical Form
No data

Color
AMBER

Odor
PETROLEUM

pH
Not applicable

Viscosity
\[
\begin{array}{ccc}
\text{<= 7000.0} & \text{cps} & @ \\
14.5 & - 15.5 & \text{cst} & @ \\
& & 100 \text{ C}
\end{array}
\]

10. STABILITY AND REACTIVITY

Hazardous Polymerization
Product will not undergo hazardous polymerization.

Hazardous Decomposition

Chemical Stability
Stable.

Incompatibility
Avoid contact with: strong acids, strong oxidizing agents.

11. TOXICOLOGICAL INFORMATION

No data

12. ECOLOGICAL INFORMATION

No data

13. DISPOSAL CONSIDERATION

Waste Management Information
Dispose of in accordance with all applicable local, state and federal regulations.
14. TRANSPORT INFORMATION

DOT Information - 49 CFR 172.101
DOT Description:
Not Regulated

Container/Mode:
CASES/SURFACE - NO EXCEPTIONS

NOS Component:
None

RQ (Reportable Quantity) - 49 CFR 172.101
Not applicable

15. REGULATORY INFORMATION

US Federal Regulations
TSCA (Toxic Substances Control Act) Status
TSCA (UNITED STATES) The intentional ingredients of this product are listed.

CERCLA RQ - 40 CFR 302.4
None

SARA 302 Components - 40 CFR 355 Appendix A
None

Section 311/312 Hazard Class - 40 CFR 370.2
Immediate( ) Delayed( ) Fire( ) Reactive( ) Sudden Release of Pressure( )

SARA 313 Components - 40 CFR 372.65
Section 313 Component(s) CAS Number

| ZINC C1-C14 ALKYLDITHIOPHOSPHATE | 68649-42-3 |

International Regulations
Inventory Status
DSL (CANADA) The intentional ingredients of this product are listed.
EINECS (EUROPE) The intentional ingredients of this product are listed.

State and Local Regulations
California Proposition 65
None

16. OTHER INFORMATION

The information accumulated herein is believed to be accurate but is not warranted to be whether originating with the company or not. Recipients are advised to confirm in advance of need that the information is current, applicable, and suitable to their circumstances.

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