SECTION 1. IDENTIFICATION

Product name : ADDITIN RC 9300
Material number : 06532764
Recommended use : Additive for lubricants

Manufacturer or supplier’s details
Supplier : LANXESS Corporation
Product Safety & Regulatory Affairs
111 RIDC Park West Drive
Pittsburgh PA 15275-1112
USA
Telephone : +1800LANXESS
+14128091000 (international)
Emergency telephone : CHEMTREC (800) 424 9300
International (703) 527 3887
Lanxess Emergency Phone (800) 410-3063

SECTION 2. HAZARDS IDENTIFICATION


Skin irritation : Category 2
Serious eye damage : Category 1
Skin sensitization : Category 1
Reproductive toxicity : Category 2
Specific target organ systemic toxicity - single exposure : Category 3 (Respiratory system)

GHS label elements
Hazard pictograms : 

Signal Word : Danger
Hazard Statements : Causes skin irritation.
May cause an allergic skin reaction.
Causes serious eye damage.
May cause respiratory irritation.
Suspected of damaging fertility or the unborn child.
Precautionary Statements:

Prevention:
Obtain special instructions before use.
Do not handle until all safety precautions have been read and understood.
Avoid breathing dust/ fume/ gas/ mist/ vapors/ spray.
Wash skin thoroughly after handling.
Use only outdoors or in a well-ventilated area.
Contaminated work clothing must not be allowed out of the workplace.
Wear protective gloves/ protective clothing/ eye protection/ face protection.

Response:
IF ON SKIN: Wash with plenty of soap and water.
IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER/doctor if you feel unwell.
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER/doctor.
IF exposed or concerned: Get medical advice/ attention.
If skin irritation or rash occurs: Get medical advice/ attention.
Take off contaminated clothing and wash before reuse.

Storage:
Store in a well-ventilated place. Keep container tightly closed.
Store locked up.

Disposal:
Dispose of contents/ container to an approved waste disposal plant.

Hazard Not Otherwise Classified (HNOC)
None known.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance / Mixture : Mixture

Hazardous ingredients

<table>
<thead>
<tr>
<th>Chemical name</th>
<th>CAS-No.</th>
<th>Concentration (% w/w)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Butylated Hydroxytoluene</td>
<td>128-39-2</td>
<td>&gt;= 20 - &lt; 30</td>
</tr>
<tr>
<td>Distillates (petroleum), hydrotreated light paraffinic</td>
<td>64742-55-8</td>
<td>&gt;= 10 - &lt; 20</td>
</tr>
<tr>
<td>Distillates, petroleum, hydrotreated light naphthenic</td>
<td>64742-53-6</td>
<td>&gt;= 5 - &lt; 10</td>
</tr>
<tr>
<td>Propanoic acid, 3-[[bis(2- methylpropoxy)phosphinothioyl]thio]-2-methyl-</td>
<td>268567-32-4</td>
<td>&gt;= 5 - &lt; 10</td>
</tr>
<tr>
<td>1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-</td>
<td>94270-86-7</td>
<td>&gt;= 5 - &lt; 10</td>
</tr>
<tr>
<td>9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2.5-furandione</td>
<td>68478-81-9</td>
<td>&gt;= 5 - &lt; 10</td>
</tr>
</tbody>
</table>
and triethylenetetramine

| Lubricating oils (petroleum), C15-30, hy- |
| drotreated neutral oil-based | 72623-86-0 | >= 1 - < 5 |

Any concentration shown as a range is to protect confidentiality or is due to batch variation.

SECTION 4. FIRST AID MEASURES

If inhaled

| Remove victim to fresh air and keep at rest in a position comfortable for breathing. |
| If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. |

In case of skin contact

| Wash off immediately with soap and plenty of water. |
| Remove contaminated clothing and shoes. |
| Continue to rinse for at least 20 minutes. |
| In the case of skin irritation or allergic reactions see a physician. |
| Wash contaminated clothing before reuse. |

In case of eye contact

| Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. |
| Remove contact lenses. |
| Continue to rinse for at least 20 minutes. |
| Chemical burns must be treated promptly by a physician. |
| Get medical attention if symptoms appear. |

If swallowed

| Rinse mouth with water. |
| Do not induce vomiting. Drink water. Call physician immediately. |
| If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. |
| If unconscious, place in recovery position and get medical attention immediately. |
| Maintain open airway. |
| Loosen tight clothing such as a collar, tie, belt or waistband. |

Most important symptoms and effects, both acute and delayed

Symptoms

| May cause respiratory tract irritation with symptoms of coughing, sore throat and runny nose. |
| Eye: Corrosive with symptoms of reddening, tearing, swelling, burning and possible permanent damage. |
| Skin: Causes irritation with symptoms of reddening, itching, and swelling. |
| May cause sensitization by skin contact. |
| Once sensitized, an allergic skin reaction may occur with reddening, swelling, and rash when subsequently exposed to very low levels. |

Effects

| Causes skin irritation. |
| May cause an allergic skin reaction. |
**SECTION 5. FIRE-FIGHTING MEASURES**

<table>
<thead>
<tr>
<th>Protection of first-aiders</th>
<th>If potential for exposure exists refer to Section 8 for specific personal protective equipment.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Notes to physician</td>
<td>No special actions required.</td>
</tr>
<tr>
<td></td>
<td>Treat symptomatically.</td>
</tr>
<tr>
<td></td>
<td>Serious effects may be delayed following exposure.</td>
</tr>
<tr>
<td></td>
<td>The exposed person may need to be kept under medical surveillance for 48 hours.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Suitable extinguishing media</th>
<th>Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. In case of fire, use water spray (fog), foam or dry chemical.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Unsuitable extinguishing media</td>
<td>Water spray jet</td>
</tr>
<tr>
<td>Specific hazards during fire fighting</td>
<td>In a fire or if heated, a pressure increase will occur and the container may burst. Cool closed containers exposed to fire with water spray. Do not allow run-off from fire fighting to enter drains or water courses.</td>
</tr>
<tr>
<td>Hazardous combustion products</td>
<td>Carbon dioxide (CO2)</td>
</tr>
<tr>
<td></td>
<td>Carbon monoxide</td>
</tr>
<tr>
<td></td>
<td>Nitrogen oxides (NOx)</td>
</tr>
<tr>
<td></td>
<td>Sulfur oxides</td>
</tr>
<tr>
<td></td>
<td>Oxides of phosphorus</td>
</tr>
<tr>
<td>Further information</td>
<td>Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.</td>
</tr>
<tr>
<td>Special protective equipment for fire-fighters</td>
<td>Wear self-contained breathing apparatus for firefighting if necessary.</td>
</tr>
</tbody>
</table>

**SECTION 6. ACCIDENTAL RELEASE MEASURES**

| Personal precautions, protective equipment and emergency procedures | No action shall be taken involving any personal risk or without suitable training. Evacuate personnel to safe areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Provide adequate ventilation. |
|---------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------
Put on appropriate personal protection equipment.

Environmental precautions: Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Local authorities should be advised if significant spillages cannot be contained.

Methods and materials for containment and cleaning up: Stop leak if safe to do so. Move containers from spill area. Contain spillage, soak up with non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and transfer to a container for disposal according to local / national regulations (see section 13). Dispose of wastes in an approved waste disposal facility. Do not allow into the sewerage system, surface waters or groundwater or into the soil.

SECTION 7. HANDLING AND STORAGE

Advice on safe handling: Avoid inhalation, ingestion and contact with skin and eyes. Persons with a history of skin sensitization to this product should not be employed in any process in which this product is used. Use only with adequate ventilation/personal protection. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue; observe all precautions for product. Do not re-use empty containers. Remove contaminated clothing and protective equipment before entering eating areas. Workers should wash hands and face before eating, drinking and smoking. Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed.

Conditions for safe storage: Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep containers sealed until ready for use. Containers which are opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate container to avoid environmental contamination.

Further information on storage stability: No decomposition if stored and applied as directed.
### Ingredients with workplace control parameters

#### Hazardous components without workplace control parameters

<table>
<thead>
<tr>
<th>Ingredients</th>
<th>CAS-No.</th>
<th>Value type (Form of exposure)</th>
<th>Control parameters / Permissible concentration</th>
<th>Basis</th>
</tr>
</thead>
<tbody>
<tr>
<td>Distillates (petroleum), hydrotreated light paraffinic</td>
<td>64742-55-8</td>
<td>TWA (Mist)</td>
<td>5 mg/m³</td>
<td>OSHA Z-1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>TWA (Inhalable fraction)</td>
<td>5 mg/m³</td>
<td>ACGIH</td>
</tr>
<tr>
<td>Distillates, petroleum, hydrotreated light naphthenic</td>
<td>64742-53-6</td>
<td>TWA (Mist)</td>
<td>5 mg/m³</td>
<td>OSHA Z-1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>TWA (Inhalable fraction)</td>
<td>5 mg/m³</td>
<td>ACGIH</td>
</tr>
<tr>
<td>Lubricating oils (petroleum), C15–30, hydrotreated neutral oil-based</td>
<td>72623-86-0</td>
<td>TWA (Mist)</td>
<td>5 mg/m³</td>
<td>OSHA Z-1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>TWA (Inhalable fraction)</td>
<td>5 mg/m³</td>
<td>ACGIH</td>
</tr>
</tbody>
</table>

#### Hazardous components without workplace control parameters

<table>
<thead>
<tr>
<th>Ingredients</th>
<th>CAS-No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Butylated Hydroxytoluene</td>
<td>128-39-2</td>
</tr>
<tr>
<td>Propanoic acid, 3-[(bis[2-methylpropoxy]phosphinothioyl [thio]-2-methyl]-</td>
<td>268567-32-4</td>
</tr>
<tr>
<td>1H-Benzotriazole-1-methanamine, N,N-bis[2-ethylhexyl]-ar-methyl-</td>
<td>94270-86-7</td>
</tr>
<tr>
<td>9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-</td>
<td>68478-81-9</td>
</tr>
<tr>
<td>furandione and triethylenetetramine</td>
<td>68478-81-9</td>
</tr>
</tbody>
</table>

#### Engineering measures

: Thermal processing operations should be ventilated to control gases and fumes given off during processing. If user operations generate dust, fumes, gas, vapor or mist, use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits.

#### Personal protective equipment

**Filter type**

: Combined inorganic and acidic gas/vapor, ammonia/amines and organic vapor type

**Respiratory protection**

: In the case of vapor formation use a respirator with an approved filter.
## Material
- PVC

## Wearing time
- < 60 min

## Remarks
- The suitability for a specific workplace should be discussed with the producers of the protective gloves.

## Hygiene measures
- Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period.
- Appropriate techniques should be used to remove potentially contaminated clothing.
- Wash contaminated clothing before reusing.
- Ensure that eyewash stations and safety showers are close to the workstation location.

## SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical state</td>
<td>liquid</td>
</tr>
<tr>
<td>Color</td>
<td>yellow</td>
</tr>
<tr>
<td>Odor</td>
<td>phenol-like</td>
</tr>
<tr>
<td>Odor Threshold</td>
<td>No data available</td>
</tr>
<tr>
<td>pH</td>
<td>No data available</td>
</tr>
<tr>
<td>Melting point/range</td>
<td>-15 °F (-26 °C)</td>
</tr>
<tr>
<td>Boiling point/boiling range</td>
<td>No data available</td>
</tr>
<tr>
<td>Flash point</td>
<td>284 °F (140 °C)</td>
</tr>
<tr>
<td>Method</td>
<td>closed cup</td>
</tr>
<tr>
<td>Evaporation rate</td>
<td>No data available</td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
<td>No data available</td>
</tr>
<tr>
<td>Upper explosion limit / Upper flammability limit</td>
<td>No data available</td>
</tr>
<tr>
<td>Lower explosion limit</td>
<td>No data available</td>
</tr>
<tr>
<td>Vapor pressure</td>
<td>No data available</td>
</tr>
<tr>
<td>Relative vapor density</td>
<td>No data available</td>
</tr>
<tr>
<td>Relative density</td>
<td>No data available</td>
</tr>
<tr>
<td>Density</td>
<td>0.98 g/cm³ (68 °F (20 °C))</td>
</tr>
</tbody>
</table>
Solubility(ies)
  Water solubility : insoluble

Partition coefficient: n-octanol/water : No data available

Ignition temperature : No data available

Decomposition temperature : > 176 °F (> 80 °C)

Viscosity
  Viscosity, kinematic : 60 mm2/s (104 °F (40 °C))

Explosive properties : No data available

Oxidizing properties : No data available

SECTION 10. STABILITY AND REACTIVITY

Reactivity : No specific test data related to reactivity available for this product or its ingredients.

Chemical stability : The product is stable.

Possibility of hazardous reactions : Under normal conditions of storage and use, hazardous reactions will not occur.

Conditions to avoid : Extremes of temperature and direct sunlight.

Incompatible materials : Reducing agents
  : Oxidizing agents
  : Acids and bases

Hazardous decomposition products : Spontaneous decomposition may start at 150°C. After prolonged heating, slow decomposition may start at above 80°C. Formation of alkylmercaptans, dialkylsulphides, traces of hydrogen sulphide possible.

SECTION 11. TOXICOLOGICAL INFORMATION

The most important known symptoms and effects are described in Section 2 and/or Section 4.

Information on likely routes of exposure

Inhalation
Eye contact
Skin contact
Ingestion
Acute toxicity
Not classified based on available information.

Product:
Acute oral toxicity: Acute toxicity estimate: > 5,000 mg/kg
Method: Calculation method

Acute inhalation toxicity: Acute toxicity estimate: 50.48 mg/l
Exposure time: 4 h
Test atmosphere: dust/mist
Method: Calculation method

Acute dermal toxicity: Acute toxicity estimate: > 5,000 mg/kg
Method: Calculation method

Ingredients:
Butylated Hydroxytoluene:
Acute oral toxicity: LD50 (Rat): > 5,000 mg/kg
Acute dermal toxicity: LD50 (Rabbit): > 10,000 mg/kg

Distillates (petroleum), hydrotreated light paraffinic:
Acute oral toxicity: LD50 (Rat, male and female): > 5,000 mg/kg
Method: OECD Test Guideline 401
GLP: yes

Acute inhalation toxicity: LC50 (Rat, male and female): > 5.53 mg/l
Exposure time: 4 h
Test atmosphere: dust/mist
Method: OECD Test Guideline 403
GLP: yes

Acute dermal toxicity: LD50 (Rabbit, male and female): > 5,000 mg/kg
Method: OECD Test Guideline 402
GLP: yes

Distillates, petroleum, hydrotreated light naphthenic:
Acute oral toxicity: LD50 Oral (Rat, male and female): > 5,000 mg/kg
Method: OECD Test Guideline 401

Acute inhalation toxicity: LC50 (Rat, male and female): > 5.53 mg/l
Exposure time: 4 h
Test atmosphere: dust/mist
Method: OECD Test Guideline 403
Assessment: The substance or mixture has no acute inhalation toxicity

Acute dermal toxicity: LD50 Dermal (Rabbit, male and female): > 5,000 mg/kg
Method: OECD Test Guideline 402
1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-:

Acute oral toxicity: LD50 (Rat): 3,313 mg/kg
Method: OECD Test Guideline 401

Acute dermal toxicity: LD50 (Rat): > 2,000 mg/kg
Method: OECD Test Guideline 402

9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:

Acute oral toxicity: LD50 (Rat): > 5,000 mg/kg
Method: Extrapolation according to Regulation (EC) No. 440/2008
GLP: yes
Remarks: Dosage caused no mortality

LD50 (Rat): > 2,000 mg/kg
Method: OPPTS 870.1100
GLP: yes
Remarks: Dosage caused no mortality

LD50 (Rat): > 2,000 mg/kg
Method: OECD Test Guideline 423
GLP: yes
Remarks: Dosage caused no mortality

Lubricating oils (petroleum), C15-30, hydrotreated neutral oil-based:

Acute oral toxicity: LD50 (Rat): > 5,000 mg/kg
Method: OECD Test Guideline 401

Acute inhalation toxicity: LC50 (Rat): > 5.53 mg/l
Exposure time: 4 h
Test atmosphere: dust/mist
Method: OECD Test Guideline 403
Assessment: The substance or mixture has no acute inhalation toxicity
Remarks: Highest producible concentration.

Acute dermal toxicity: LD50 (Rabbit): > 5,000 mg/kg
Method: OECD Test Guideline 402

Skin corrosion/irritation
Causes skin irritation.

Ingredients:

Butylated Hydroxytoluene:
Result: Irritating to skin.

Distillates, petroleum, hydrotreated light naphthenic:
Species: Rabbit
Result: No skin irritation
1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-:
Species: Rabbit
Exposure time: 24 h
Result: Irritating to skin.

9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:
Assessment: Irritating to skin.
Method: OECD Test Guideline 431
Result: Irritating

Serious eye damage/eye irritation
Causes serious eye damage.

Ingredients:

Butylated Hydroxytoluene:
Species: Rabbit
Result: No eye irritation

Distillates, petroleum, hydrotreated light naphthenic:
Species: Rabbit
Result: No eye irritation
Method: OECD Test Guideline 405

Propanoic acid, 3-[[bis(2-methylpropoxy)phosphinothioyl]thio]-2-methyl-:
Species: Rabbit
Result: Risk of serious damage to eyes.
Method: OECD Test Guideline 405

1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-:
Species: Rabbit
Result: No eye irritation

9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:
Result: No eye irritation
Method: OECD Test Guideline 437

Respiratory or skin sensitization

Skin sensitization
May cause an allergic skin reaction.

Respiratory sensitization
Not classified based on available information.
Ingredients:

Distillates (petroleum), hydrotreated light paraffinic:
Routes of exposure: Skin contact
Species: Guinea pig
Method: OECD Test Guideline 406
Result: Did not cause sensitization on laboratory animals.
GLP: yes

Distillates, petroleum, hydrotreated light naphthenic:
Routes of exposure: Skin contact
Species: Guinea pig
Method: OECD Test Guideline 406
Result: Did not cause sensitization on laboratory animals.

Propanoic acid, 3-[[bis(2-methylpropoxy)phosphinothioyl]thio]-2-methyl-:
Result: May cause sensitization by skin contact.

1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-:
Routes of exposure: Dermal
Species: Guinea pig
Result: May cause sensitization by skin contact.

9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:
Test Type: Buehler Test
Routes of exposure: Dermal
Species: Guinea pig
Method: OECD Test Guideline 406
Result: Does not cause skin sensitization.

Germ cell mutagenicity
Not classified based on available information.

Ingredients:

Distillates (petroleum), hydrotreated light paraffinic:
Genotoxicity in vitro
Test system: Mammalian-Animal
Metabolic activation: with and without metabolic activation
Method: OECD Test Guideline 473
Result: negative
GLP: yes

Test system: Mammalian-Animal
Metabolic activation: with and without metabolic activation
Method: OECD Test Guideline 476
Result: negative
GLP: yes

Test system: Bacteria
Metabolic activation: with and without metabolic activation
Method: OECD Test Guideline 471
Result: positive

9-Octadecenoic acid (Z), reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:
Genotoxicity in vitro: Test Type: gene mutation test
Test system: mouse lymphoma cells
Method: OECD Test Guideline 473
Result: negative

Carcinogenicity
Not classified based on available information.

Ingredients:
Butylated Hydroxytoluene:
Remarks: No known significant effects or critical hazards.

Distillates (petroleum), hydrotreated light paraffinic:
Carcinogenicity - Assessment: Classified based on DMSO extract content < 3% (Regulation (EC) 1272/2008, Annex VI, Part 3, Note L)

Distillates, petroleum, hydrotreated light naphthenic:
Carcinogenicity - Assessment: Classified based on DMSO extract content < 3% (Regulation (EC) 1272/2008, Annex VI, Part 3, Note L)

Lubricating oils (petroleum), C15-30, hydrotreated neutral oil-based:
Carcinogenicity - Assessment: Classified based on DMSO extract content < 3% (Regulation (EC) 1272/2008, Annex VI, Part 3, Note L)

IARC
No ingredient of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

OSHA
No component of this product present at levels greater than or equal to 0.1% is on OSHA’s list of regulated carcinogens.

NTP
No ingredient of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

Reproductive toxicity
Suspected of damaging fertility or the unborn child.

Ingredients:
Distillates (petroleum), hydrotreated light paraffinic:
Effects on fertility: Species: Rat, male and female
Application Route: Oral
Dose: >= 1000 milligram per kilogram
Duration of Single Treatment: 2.5 yr
General Toxicity F1: NOAEL: >= 1,000 mg/kg body weight
Method: OECD Test Guideline 421
GLP: yes

Effects on fetal development:
Species: Rat, female
Application Route: Dermal
Dose: 125 milligram per kilogram
Duration of Single Treatment: 18 d
General Toxicity Maternal: LOAEL: 125 mg/kg body weight
Method: OECD Test Guideline 414
GLP: yes

Species: Rat, female
Application Route: Dermal
Dose: >= 2000 milligram per kilogram
Duration of Single Treatment: 18 d
Teratogenicity: NOAEL: >= 2,000 mg/kg body weight
Method: OECD Test Guideline 414
GLP: yes

1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-:
Effects on fertility:
General Toxicity Parent: NOAEL: 45 mg/kg body weight
Fertility: NOAEL: 150 mg/kg body weight
Early Embryonic Development: NOAEL: 45 mg/kg body weight

9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:
Effects on fetal development:
Species: Rat
Application Route: Oral
Dose: 75 milligram per kilogram
Developmental Toxicity: NOAEL: 75 mg/kg body weight
Method: OECD Test Guideline 422
Result: Some evidence of adverse effects on development, based on animal experiments.
GLP: yes

Reproductive toxicity - Assessment:
Some evidence of adverse effects on sexual function and fertility, and/or on development, based on animal experiments.

STOT-single exposure
May cause respiratory irritation.

Ingredients:
Distillates (petroleum), hydrotreated light paraffinic:
Assessment: May cause respiratory irritation.
Distillates, petroleum, hydrotreated light naphthenic:
Assessment: May cause respiratory irritation.

Lubricating oils (petroleum), C15-30, hydrotreated neutral oil-based:
Assessment: May cause respiratory irritation.

STOT-repeated exposure
Not classified based on available information.

Repeated dose toxicity

Ingredients:

Distillates (petroleum), hydrotreated light paraffinic:
Species: Rat, male
LOAEL: 125 mg/kg
Application Route: Oral
Exposure time: 90 d
Number of exposures: 5 days/week
Dose: 125 mg/kg
Method: OECD Test Guideline 408
Remarks: Subchronic toxicity

Species: Rabbit, male and female
NOAEL: 1,000 mg/kg
Application Route: Skin contact
Exposure time: 28 d
Dose: 1000 mg/kg
Method: OECD Test Guideline 410
GLP: yes
Remarks: Subacute toxicity

Species: Rat, male and female
NOAEL: > 980 mg/m³
Application Route: Inhalation
Test atmosphere: dust/mist
Exposure time: 28 d
Dose: > 980 mg/m³
GLP: no
Remarks: Subacute toxicity

1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-:
Species: Rat
NOAEL: 45 mg/kg
Application Route: Oral

Aspiration toxicity
Not classified based on available information.
Ingredients:

Distillates (petroleum), hydrotreated light paraffinic:
May be fatal if swallowed and enters airways.

Distillates, petroleum, hydrotreated light naphthenic:
May be fatal if swallowed and enters airways.

Lubricating oils (petroleum), C15-30, hydrotreated neutral oil-based:
The substance or mixture is known to cause human aspiration toxicity hazards or has to be regarded as if it causes a human aspiration toxicity hazard.

SECTION 12. ECOLOGICAL INFORMATION

Ecotoxicity

Ingredients:

Butylated Hydroxytoluene:
Toxicity to fish : LC50 (Pimephales promelas (fathead minnow)): 1.4 mg/l
Exposure time: 96 h

Toxicity to daphnia and other aquatic invertebrates : EC50: 0.45 mg/l
Exposure time: 48 h

M-Factor (Acute aquatic toxicity) : 1

Toxicity to fish (Chronic toxicity) : LC50: 0.006 mg/l
Exposure time: 60 Days

Toxicity to microorganisms : EC50: > 1,000 mg/l
Exposure time: 3 h

Distillates (petroleum), hydrotreated light paraffinic:
Toxicity to fish : LC50 (Pimephales promelas (fathead minnow)): > 100 mg/l
Exposure time: 96 h
Method: OECD Test Guideline 203
GLP: yes
Remarks: Fresh water

Toxicity to daphnia and other aquatic invertebrates : LC50 (Daphnia magna (Water flea)): > 10,000 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202
Remarks: Fresh water

Toxicity to algae : NOEC (Pseudokirchneriella subcapitata (microalgae)): > 100 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
Remarks: Fresh water

Toxicity to fish (Chronic toxicity) : NOAEL (No observed adverse effect level) (Oncorhynchus mykiss (rainbow trout)): > 1,000 mg/l
Exposure time: 14 d
Method: QSAR
GLP: yes
Remarks: Fresh water

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity) : NOEC (Daphnia magna (Water flea)): 10 mg/l
Exposure time: 21 d
Method: OECD Test Guideline 211
GLP: yes
Remarks: Fresh water

Distillates, petroleum, hydrotreated light naphthenic:

Toxicity to fish : LC50 (Pimephales promelas (fathead minnow)): > 100 mg/l
Exposure time: 96 h
Method: OECD Test Guideline 203

Toxicity to daphnia and other aquatic invertebrates : EC50 (Daphnia magna (Water flea)): > 100 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202

Toxicity to algae : NOEC (Pseudokirchneriella subcapitata (green algae)): > 100 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201

Propanoic acid, 3-[[bis(2-methylpropoxy)phosphinoothioyl]thio]-2-methyl-:

Ecotoxicology Assessment
Chronic aquatic toxicity : Harmful to aquatic life with long lasting effects.

1H-Benzotriazol-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-:

Toxicity to fish : LC50 (Danio rerio (zebra fish)): 1.3 mg/l
Exposure time: 96 h
Method: OECD Test Guideline 203

Toxicity to daphnia and other aquatic invertebrates : EC10 (Daphnia magna (Water flea)): 1.93 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202

Toxicity to algae : ErC50 (Desmodesmus subspicatus (green algae)): 0.976 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
EC10 (Desmodesmus subspicatus (green algae)): 0.658 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201

M-Factor (Acute aquatic tox- : 1
icity)

Toxicity to microorganisms : EC50 (Bacteria): 13 mg/l
Exposure time: 3 h
Method: OECD Test Guideline 209

9-Octadecenoic acid (Z), reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:

Toxicity to fish : LC50 (Oncorhynchus mykiss (rainbow trout)): 1,000 mg/l
Exposure time: 96 h
Method: OECD Test Guideline 203
GLP: yes

NOEC (Oncorhynchus mykiss (rainbow trout)): 1,000 mg/l
Method: OECD Test Guideline 203
GLP: yes

Lowest Observed Effect Concentration (Oncorhynchus mykiss (rainbow trout)): > 1,000 mg/l
Method: OECD Test Guideline 203
GLP: yes

Toxicity to daphnia and other aquatic invertebrates : EC50 (Daphnia magna (Water flea)): 1,000 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202
GLP: yes

NOEC (Daphnia magna (Water flea)): 1,000 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202
GLP: yes

Lowest Observed Effect Concentration (Daphnia magna (Water flea)): > 1,000 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202
GLP: yes

Toxicity to algae : EC50 (Pseudokirchneriella subcapitata (green algae)): 496 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
GLP: yes

NOEC (Pseudokirchneriella subcapitata (green algae)): 318 mg/l
Exposure time:
Method: OECD Test Guideline 201
GLP: yes

Toxicity to microorganisms : EC50: 1,000 mg/l
Exposure time: 3 h
Method: OECD Test Guideline 209
GLP:
NOEC: 1,000 mg/l
Exposure time: 3 h
Method: OECD Test Guideline 209

Ecotoxicology Assessment
Chronic aquatic toxicity: May cause long lasting harmful effects to aquatic life.

Lubricating oils (petroleum), C15-30, hydrotreated neutral oil-based:
Toxicity to fish:
LC50 (Pimephales promelas (fathead minnow)): > 100 mg/l
Exposure time: 96 h
Method: OECD Test Guideline 203

Toxicity to daphnia and other aquatic invertebrates:
EC50 (Daphnia magna (Water flea)): > 10,000 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202

Toxicity to algae:
NOEC (Pseudokirchneriella subcapitata (microalgae)): > 100 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity):
NOEC (Daphnia magna (Water flea)): 10 mg/l
Exposure time: 21 Days
Method: OECD Test Guideline 211

Persistence and degradability

Ingredients:

Butylated Hydroxytoluene:
Biodegradability: Result: Not readily biodegradable.

Distillates (petroleum), hydrotreated light paraffinic:
Biodegradability: aerobic
Result: Not readily biodegradable.
Biodegradation: 2 - 4 %
Exposure time: 28 d
Method: OECD Test Guideline 301B
GLP: yes

Distillates, petroleum, hydrotreated light naphthenic:
Biodegradability: Result: Not readily biodegradable.
Biodegradation: 31 %
Exposure time: 28 d
Method: OECD Test Guideline 301F

1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-:
Biodegradability: Concentration: 20 mg/l
Exposure time: 28 d
Biodegradation: 94.4 %
Method: OECD Test Guideline 301B

9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:
Biodegradability: Concentration: 3.77 mg/l
Result: Not readily biodegradable.
Biodegradation: 10 %
Exposure time: 28 d
Method: OECD Test Guideline 301D

Lubricating oils (petroleum), C15-30, hydrotreated neutral oil-based:
Biodegradability: Result: Not readily biodegradable.

Bioaccumulative potential:

Ingredients:

Butylated Hydroxytoluene:
Partition coefficient: n-octanol/water: log Pow: 4.92

Mobility in soil:

Ingredients:

9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylenetetramine:
Distribution among environmental compartments: Koc: 269153.48
Method: OECD Test Guideline 121

Other adverse effects:

Product:
Additional ecological information: An environmental hazard cannot be excluded in the event of unprofessional handling or disposal.
Very toxic to aquatic life.
Toxic to aquatic life with long lasting effects.

SECTION 13. DISPOSAL CONSIDERATIONS

RCRA - Resource Conservation and Recovery Authorization Act: If discarded in its purchased form, this product would not be a hazardous waste either by listing or by characteristic. However, under RCRA, it is the responsibility of the product user to determine at the time of disposal, whether a material containing the product or derived from the product should be classified as a hazardous waste. (40 CFR 261.20-24)
Disposal methods: The generation of waste should be avoided or minimized wherever possible. This material and its container must be disposed of in a safe way. Empty containers retain product residue; observe all precautions for product. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Waste disposal should be in accordance with existing federal, state, provincial and/or local environmental controls.

SECTION 14. TRANSPORT INFORMATION

Domestic regulation

DOT
UN/ID/NA number: UN 3082
Proper shipping name: Environmentally hazardous substance, liquid, n.o.s. (2,6-DI-TERT-BUTYLPHENOL, DI-ALKYLAMINOMETHYL-TOLYLTRIAZOLE)
Class: 9
Packing group: III
Labels: 9:

Marine pollutant: yes

Further information for transport: Only bulk packages (greater than 119 Gallons) are regulated as marine pollutants when shipped by highway or rail.

International Regulations

IATA-DGR
UN/ID No.: UN 3082
Proper shipping name: Environmentally hazardous substance, liquid, n.o.s. (2,6-DI-TERT-BUTYLPHENOL, DI-ALKYLAMINOMETHYL-TOLYLTRIAZOLE)
Class: 9
Packing group: III
Labels: 9:

Packing instruction (cargo): 964: 450.00 L
Packing instruction (passenger aircraft): 964: 450.00 L
Environmentally hazardous: yes

IMDG-Code
UN number: UN 3082
Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (2,6-DI-TERT-BUTYLPHENOL, DI-ALKYLAMINOMETHYL-TOLYLTRIAZOLE)
Class: 9
Packing group: III
Labels: 9

Marine pollutant: yes

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code
Not applicable for product as supplied.

SECTION 15. REGULATORY INFORMATION

CERCLA
None

Reportable Quantity
This material does not contain any components with a CERCLA RQ.

SARA 302 Extremely Hazardous Substances Threshold Planning Quantity
This material does not contain any components with a section 302 EHS TPQ.

SARA 311/312 Hazards: Skin corrosion or irritation
Serious eye damage or eye irritation
Respiratory or skin sensitization
Reproductive toxicity
Specific target organ toxicity (single or repeated exposure)

SARA 313
This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.
US State Regulations

Massachusetts Right To Know
- Distillates (petroleum), hydrotreated light paraffinic: 64742-55-8, >= 10 - < 20
- Distillates, petroleum, hydrotreated light napthenic: 64742-53-6, >= 5 - < 10
- Lubricating oils (petroleum), C15-30, hydrotreated neutral oil-based: 72623-86-0, >= 1 - < 5
- Distillates, petroleum, solvent-refined light napthenic: 64741-97-5, >= 0.1 - < 1

Pennsylvania Right To Know
- Benzenamine, N-phenyl-, styrenated: 68442-68-2, >= 20 - < 30
- Distillates (petroleum), hydrotreated light paraffinic: 64742-55-8, >= 10 - < 20
- Distillates, petroleum, hydrotreated light napthenic: 64742-53-6, >= 5 - < 10
- Propanoic acid, 3-[[bis(2-methylpropoxy)phosphinothioyl]thio]-2-methyl-1H-Benzotriazole-1-methanamine, N,N-bis(2-ethylhexyl)-ar-methyl-9-Octadecenoic acid (Z)-, reaction products with 3-(dodecenyl)dihydro-2,5-furandione and triethylene-tetramine: 68478-81-9, >= 5 - < 10
- Lubricating oils (petroleum), C15-30, hydrotreated neutral oil-based: 72623-86-0, >= 1 - < 5

California Prop. 65
This product does not contain any chemicals known to the State of California to cause cancer, birth, or any other reproductive defects.

TSCA inventory
- TSCA: On TSCA Inventory

TSCA list
No substances are subject to a Significant New Use Rule.

No substances are subject to TSCA 12(b) export notification requirements.
SECTION 16. OTHER INFORMATION

Further information

**NFPA:**
- Flammability: 1
- Health: 3
- Instability: 0

**HMIS® IV:**

<table>
<thead>
<tr>
<th>Health</th>
<th>Flammability</th>
<th>Physical Hazard</th>
</tr>
</thead>
<tbody>
<tr>
<td>3</td>
<td>1</td>
<td>0</td>
</tr>
</tbody>
</table>

HMIS® ratings are based on a 0-4 rating scale, with 0 representing minimal hazards or risks, and 4 representing significant hazards or risks. The "*" represents a chronic hazard, while the "/" represents the absence of a chronic hazard.

LANXESS' method of hazard communication is comprised of Product Labels and Safety Data Sheets. HMIS and NFPA ratings are provided by LANXESS as a customer service.

Revision Date: 06/25/2018

This information is furnished without warranty, express or implied. This information is believed to be accurate to the best knowledge of our knowledge. The information provided in this Safety Data Sheet (SDS) is correct to the best of our knowledge, information and belief at the date of its publication. We assume no legal responsibility for use of or reliance upon the information in this SDS.