

## Sunlube 320

<b>1</b>	<b>PRODUCT AND COMPANY IDENTIFICATION</b>
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**Product Identifier:** Sunlube 320  
**Common Name:** Wax based urethane dry film lubricant  
**SDS Number:** I58  
**Revision Date:** 7/31/2015  
**Version:** 1  
**Supplier Details:** Coatings for Industry, Inc.  
 319 Township Line Road  
 Souderton, PA 18964

**Emergency:** Infotrac  
**Contact:** USA: 1-800-535-5053 / International :352-323-3500  
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<b>2</b>	<b>HAZARDS IDENTIFICATION</b>
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**Classification of the substance or mixture****GHS Classification in accordance with 29 CFR 1910 (OSHA HCS):**

Health, Reproductive toxicity, 1 B  
 Health, Skin corrosion/irritation, 2  
 Health, Serious Eye Damage/Eye Irritation, 2 A  
 Health, Specific target organ toxicity - Single exposure, 3

**GHS Label elements, including precautionary statements****GHS Signal Word:** DANGER**GHS Hazard Pictograms:****GHS Hazard Statements:**

H360 - May damage fertility or the unborn child  
 H315 - Causes skin irritation  
 H319 - Causes serious eye irritation  
 H336 - May cause drowsiness or dizziness

**GHS Precautionary Statements:**

P202 - Do not handle until all safety precautions have been read and understood.  
 P210 - Keep away from heat/sparks/open flames/hot surfaces. No smoking  
 P261 - Avoid breathing dust/fume/gas/mist/vapors/spray.  
 P264 - Wash hands thoroughly after handling.  
 P271 - Use only outdoors or in a well-ventilated area.  
 P280 - Wear protective gloves/protective clothing/eye protection/face protection.  
 P302+352 - IF ON SKIN: Wash with soap and water.  
 P304+340 - IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.  
 P305+351+338 - IF IN EYES: Rinse continuously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing.  
 P308+313 - IF exposed or concerned: Get medical advice/attention.  
 P332+313 - If skin irritation occurs: Get medical advice/attention.  
 P362 - Take off contaminated clothing and wash before reuse.

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P403+233 - Store in a well ventilated place. Keep container tightly closed.  
 P403+235 - Store in a well ventilated place. Keep cool.

### 3 COMPOSITION/INFORMATION OF INGREDIENTS

**Ingredients:**

Cas#	%	Chemical Name
872-50-4	2.5%	1-Methyl-2-pyrrolidone
57-55-6	2.0%	1,2-Propanediol

Non-hazardous ingredients are undisclosed as trade secrets

### 4 FIRST AID MEASURES

- Inhalation:** If affected, remove to fresh air.  
 If not breathing, give artificial respiration.
- Skin Contact:** Wash the affected area thoroughly with plenty of water and soap.
- Eye Contact:** Immediately flush eyes with plenty of clean water for an extended time, not less than five (5) minutes. Flush longer if there is any indication of residual chemical in the eye.  
 Ensure adequate flushing of the eyes by separating the eyelids with fingers and roll eyes in a circular motion.
- Ingestion:** Get medical attention immediately.

### 5 FIRE FIGHTING MEASURES

- Flash Point:** >200F
- Extinguishing Media - Protein type air foams, water spray, ABC dry chemical
- Unusual Fire and Explosion Hazards - Material will not sustain combustion but closed containers may explode due to build up of steam pressure when exposed to heat.

### 6 ACCIDENTAL RELEASE MEASURES

**Containment Techniques**

Contain spill.  
 If spilled in an enclosed area, ventilate.

**Clean-Up Techniques**

Wear proper personal protective clothing and equipment. Do not flush liquid into public sewer, water systems or surface waters. Soak up large spill residue and small spills with an inert absorbent. Place into labeled, closed container; store in safe location to await disposal. Wash the spill area with soap and water.  
 Change contaminated clothing and launder before reuse.

### 7 HANDLING AND STORAGE

- Handling Precautions:**
- Avoid eye contact.
  - Avoid repeated or prolonged skin contact.
  - Avoid inhalation of aerosol, mist, spray, fume or vapor.
  - Avoid drinking, tasting, swallowing or ingesting this product.
  - Wash thoroughly after handling this product. Always wash up before eating, smoking or using the facilities.
  - Provide eyewash fountains and safety showers in the work area.
  - Use under well ventilated conditions.
  - Under normal conditions of use, curing (heating) of this polymer may generate a small amount of dimethyl ethanol amine. Substrates coated or impregnated with this polymer can emit dimethyl ethanol amine until the polymer is fully reacted.

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**Storage Requirements:** Do not store in open, unlabeled or mislabeled containers.  
 Do not allow product to freeze.  
 Do not puncture or stack drums.  
 Keep container closed when not in use.  
 Do not reuse empty container without commercial cleaning or reconditioning.

<b>8</b>	<b>EXPOSURE CONTROLS/PERSONAL PROTECTION</b>
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**Engineering Controls:** Always provide effective general and, when necessary, local exhaust ventilation to draw spray, aerosol, fume, mist and vapor away from workers to prevent routine inhalation. Ventilation must be adequate to maintain the ambient workplace atmosphere below the exposure limit(s) outlined in the MSDS. Ventilation guidelines/techniques may be found in publications such as Industrial Ventilation: American Conference of Governmental Industrial Hygienists, 1330 Kemper Meadow Drive, Cincinnati, OH, 45240 1634, USA.

**Personal Protective Equipment:** Eye/Face Protection:  
 Wear eye protection.

Skin Protection:  
 Wear chemical resistant (impervious) gloves.

Respiratory Protection:  
 Wear a respirator approved by NIOSH/MSHA (e.g., an organic vapor respirator, a full face air purifying respirator for organic vapors, or a self contained breathing apparatus) whenever exposure to aerosol, mist, spray, fume or vapor exceed the exposure limit(s) of any chemical substance listed in this MSDS. Use respirator in accordance with manufacturer's use limitations and OSHA standard 1910.134 (29CFR).

1-Methyl-2-pyrrolidone (872-50-4) [2.5%]  
 TWA 10 ppm USA. Workplace Environmental Exposure Levels (WEEL)

Skin

1,2-Propanediol (57-55-6) [2.0%]  
 TWA 10 mg/m3 USA. Workplace Environmental Exposure Levels (WEEL)

<b>9</b>	<b>PHYSICAL AND CHEMICAL PROPERTIES</b>
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<b>Appearance:</b>	Red	<b>Odor:</b>	Slight
<b>Physical State:</b>	Liquid	<b>Solubility:</b>	Soluble-water based
<b>Spec Grav./Density:</b>	0.98-1.02	<b>Percent Volatile:</b>	75

<b>10</b>	<b>STABILITY AND REACTIVITY</b>
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**Chemical Stability:** This product is stable

**Conditions to Avoid:** Do not freeze.

**Materials to Avoid:** Acidic conditions will cause the urethane resin to precipitate out of solution.

**Hazardous Decomposition:** Carbon monoxide, carbon dioxide, and oxides of nitrogen.

**Hazardous Polymerization:** Hazardous polymerization will not occur.

<b>11</b>	<b>TOXICOLOGICAL INFORMATION</b>
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1-Methyl-2-pyrrolidone (872-50-4) [2.5%]

### Information on toxicological effects

#### Acute toxicity:

LD50 Oral - rat - 3,914 mg/kg

LDLO Inhalation - rat - 4 h - > 5100 ppm

LD50 Dermal - rabbit - 8,000 mg/kg

no data available

Skin corrosion/irritation: no data available

Serious eye damage/eye irritation: Eyes - rabbit Result: Eye irritation

Respiratory or skin sensitisation: no data available

Germ cell mutagenicity: no data available

#### Carcinogenicity:

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

ACGIH: No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by ACGIH.

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

OSHA: No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

Reproductive toxicity: Damage to fetus possible

no data available

Specific target organ toxicity - single exposure: Inhalation - May cause respiratory irritation.

Specific target organ toxicity - repeated exposure: no data available

Aspiration hazard: no data available

#### Additional Information:

RTECS: UY5790000

prolonged or repeated exposure can cause: Vomiting, Diarrhoea, Abdominal pain, Rats exposed to 1-methyl-2- pyrrolidinone at a concentration of 1 mg/L as an aerosol for 10 days showed depletion of hematopoietic cells in the bone marrow and atrophy of the lymphoid tissues of the thymus, spleen, and lymph nodes.

Bone marrow - Irregularities - Based on Human Evidence

1,2-Propanediol (57-55-6) [2.0%]

### Information on toxicological effects

#### Acute toxicity:

Oral LD50 LD50 Oral - rat - 20,000 mg/kg

Inhalation LC50 no data available

Dermal LD50 LD50 Dermal - rabbit - 20,800 mg/kg

Other information on acute toxicity LD50 Intramuscular - rat - 14 g/kg

LD50 Intravenous - dog - 26 g/kg

LD50 Intraperitoneal - rat - 6,660 mg/kg

LD50 Subcutaneous - rat - 22,500 mg/kg

LD50 Intravenous - rat - 6,423 mg/kg

LD50 Intraperitoneal - mouse - 9,718 mg/kg

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Remarks: Lungs, Thorax, or Respiration:Chronic pulmonary edema. Kidney, Ureter, Bladder:Changes in both tubules and glomeruli. Blood:Changes in spleen.

LD50 Subcutaneous - mouse - 17,370 mg/kg

Remarks: Behavioral:Change in motor activity (specific assay). Behavioral:Muscle contraction or spasticity. Cyanosis

LD50 Intravenous - mouse - 6,630 mg/kg

LD50 Intravenous - rabbit - 6,500 mg/kg

Skin corrosion/irritation: Skin - Human - Mild skin irritation - 7 d

Serious eye damage/eye irritation: Eyes - rabbit - Mild eye irritation

Respiratory or skin sensitisation: no data available

Germ cell mutagenicity: no data available

Carcinogenicity:

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

ACGIH: No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by ACGIH.

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

OSHA: No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

Reproductive toxicity: no data available

Teratogenicit

Specific target organ toxicity - single exposure (Globally Harmonized System):  
no data available

Specific target organ toxicity - repeated exposure (Globally Harmonized System):  
no data available  
Aspiration hazar

Potential health effects: Inhalation May be harmful if inhaled. May cause respiratory tract irritation. Ingestion May be harmful if swallowed. Skin May be harmful if absorbed through skin. May cause skin irritation. Eyes May cause eye irritation.

Signs and Symptoms of Exposure: Gastrointestinal disturbance, Nausea, Headache, Vomiting, Central nervous system depression

Synergistic effects: no data available

Additional Informatio RTECS: TY2000000

<b>12</b>	<b>ECOLOGICAL INFORMATION</b>
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1-Methyl-2-pyrrolidone (872-50-4) [2.5%]

Information on ecological effects

Toxicity:

Toxicity to fish LC50 - other fish - 4,000 mg/l - 96 h.

LC50 - Leuciscus idus (Golden orfe) - > 500 mg/l - 96 h

Toxicity to daphnia and EC50 - Daphnia magna (Water flea) - > 1,000 mg/l - 24 h.

other aquatic invertebrates

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Toxicity to bacteria LC50 - Bacteria - > 9,000 mg/l:

Persistence and degradability: Biodegradability Result: 90 % - Readily biodegradable.

Bioaccumulative potential: no data available

Mobility in soil: no data available

Results of PBT and vPvB assessment PBT/vPvB assessment not available as chemical safety assessment not required/not conducted

Other adverse effects: no data available

1,2-Propanediol (57-55-6) [2.0%]

Information on ecological effects

Toxicity:

Toxicity to fish mortality NOEC - Pimephales promelas (fathead minnow) - 52,930 mg/l - 96 h.

Toxicity to daphnia mortality NOEC - Daphnia - 13,020 mg/l - 48 h.  
and other aquatic invertebrates

EC50 - Daphnia magna (Water flea) - > 10,000 mg/l - 48 h

Persistence and degradability: no data available

Bioaccumulative potential: no data available

Mobility in soil: no data available

PBT and vPvB assessment: no data available

Other adverse effects: no data available

<b>13</b>	<b>DISPOSAL CONSIDERATIONS</b>
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Waste treatment methods

Product: Offer surplus and non-recyclable solutions to a licensed disposal company. Contact a licensed professional waste disposal service to dispose of this material. Dispose of in accordance with all federal, state, and local regulations.

Contaminated packaging: Dispose of as unused product.

## Sunlube 320

**14** TRANSPORT INFORMATION

Non-regulated for transportation.

**15** REGULATORY INFORMATION

Component (CAS#) [%] - CODES

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1-Methyl-2-pyrrolidone (872-50-4) [2.5%] MASS, NJHS, PA, SARA313, TSCA

1,2-Propanediol (57-55-6) [2.0%] HAP, PA, TSCA

Regulatory CODE Descriptions

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MASS = MA Massachusetts Hazardous Substances List  
NJHS = NJ Right-to-Know Hazardous Substances  
PA = PA Right-To-Know List of Hazardous Substances  
SARA313 = SARA 313 Title III Toxic Chemicals  
TSCA = Toxic Substances Control Act  
HAP = Hazardous Air Pollutants

**16** OTHER INFORMATION

**NOTICE :** This information is presented in good faith and believed to be accurate as of the effective date below. However, no warranty is express or implied regarding the accuracy of this data or the results to be obtained from the use thereof. Coatings For Industry, Inc. assumes no responsibility for personal injury or property damage to vendees, users, or third parties caused by the material, such vendees or users assume all risks associated with the use of the material. Regulatory requirements are subject to change and may differ from one location to another; it is the buyer's responsibility to ensure that its activities comply with federal, state or provincial, and local laws. The preceding specific information is made for the purpose of complying with numerous federal, state or provincial, and local laws and regulations.