

Molykiron 30	MSDS No.	3203
SUMICO LUBRICANT CO., LTD.	Revision Date	Oct. 01, 2010

## MATERIAL SAFETY DATA SHEET

### 1 PRODUCT AND COMPANY IDENTIFICATION

Product Name : Molykiron 30  
 Company Name : SUMICO LUBRICANT CO., LTD.  
 Address : Shinjuku Nomura Bldg., 1-26-2, Nishishinjuku, Shinjuku-ku, Tokyo, 163-0575, Japan  
 Phone Number : +81-3-3344-6831  
 Fax Number : +81-3-3344-6839  
 Mail Address : tech\_sumico@ni.smm.co.jp

### 2 HAZARDS IDENTIFICATION

Hazards Category  
 Classification not possible

Allocation of Label Elements

Pictogram  
 Classification not possible

Signal Word  
 Classification not possible

Hazard Statement  
 Classification not possible

### 3 COMPOSITION/INFOTMATION ON INGREDIENTS

Ingredients and Contents

Component name	CAS number	wt%
Molybdenum disulfide	1317-33-5	<1
Mineral oil	Trade secret	90~100

### 4 FIRST-AID MEASURES

Inhalation

Remove victim to fresh air and keep at rest in a position comfortable for breathing.  
 Call a physician if you feel unwell.

Skin

Wash with plenty of soap and water.  
 Call a physician if you feel unwell.

Eye

Immediately flush eyes with plenty of water for at least 15 minutes.  
 Call a physician.

Ingestion

Rinse mouth. Do not induce vomiting.  
 Call a physician.

### 5 FIRE-FIGHTING MEASURES

Extinguishing Media

Dry chemical, carbon dioxide(CO2), and foam

Specific Fire Fighting

On small fires use carbon dioxide (CO2) or dry chemical.  
 On large fires use dry chemical or foam.  
 Do not approach containers suspected to be hot.  
 May emit poisonous fumes or corrosive fumes.

Protection for Fire-fighter

Wear full body protective clothing with breathing apparatus.

Molykiron 30	MSDS No.	3203
SUMICO LUBRICANT CO., LTD.	Revision Date	Oct. 01, 2010

## 6 ACCIDENTAL RELEASE MEASURES

### Personal Precautions

- Ventilate well indoor until disposal is finished.
- Wear protective equipments in case of operation.

### Environmental Precautions

- Avoid release to the environment.

### Methods for Cleaning Up

- Remove potential ignition source in vicinity as soon as possible.
- Prepare extinguishing agent.
- Prevent leakage by enclosing with nonflammables and collect into empty container by scoop or the like.

## 7 HANDLING AND STORAGE

### Handling

- Do not breathe vapor or mist.
- Do not get in eyes, on skin, or on clothing.
- Wear protective equipments when risk of exposure occurs.
- Use in a well ventilated area.
- Use spark-proof tools and explosion-proof equipment.
- Keep away from heat, spark and flames.
- Fire prohibited strictly.
- After handling, wash well hands and face and rinse your mouth.
- Do not eat, drink or smoke during work.
- Avoid physical damage to containers.
- Keep containers securely sealed when not in use.

### Storage

- Fire prohibited strictly.
- Keep away from sources of ignition.
- Store in a tightly closed container.
- Store in a cool, dry, well-ventilated area away from incompatible substances.
- Separate from oxidizing materials.
- Store in a tightly closed container.

## 8 EXPOSURE/PERSONAL PROTECTION

### Engineering Controls

- Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower.
- Use adequate general or local exhaust ventilation to keep airborne concentrations below the permissible exposure limits.
- Ventilation fans and other electrical service must be non-sparking and have an explosion-proof design.

### Exposure Limit Values

Chemical name	ACGIH
Molybdenum disulfide	TWA 3mg/m <sup>3</sup>
Mineral oil	TWA 5mg/m <sup>3</sup> (mist)

### Personal Protective Equipment

#### Respiratory Protection

- In case of insufficient ventilation, wear suitable respiratory equipment.

#### Skin Protection

- Wear chemical protective gloves and protective clothing to prevent skin exposure.

#### Eye Protection

- Wear chemical worker's goggles.

## 9 PHYSICAL AND CHEMICAL PROPERTIES

Physical State	:	Liquid
Color	:	Dark gray
Odour	:	Oil odor
pH	:	Not available
Boiling Point(°C)	:	Not available
Melting Point(°C)	:	Not available
Flash point(°C)	:	258
Auto-ignition Temperature(°C)	:	Not available

Molykiron 30	MSDS No.	3203
SUMICO LUBRICANT CO., LTD.	Revision Date	Oct. 01, 2010

## Flammability or Explosive Limits

Lower	:	Not available
Upper	:	Not available
Vapour Pressure (KPa)	:	Not available
Vapour Density	:	Not available
Relative density(g/cm <sup>3</sup> )	:	0.89
Solubility	:	Insoluble in water
Partition Coefficient: n-octanol/water	:	Not available
Decomposition Temperature(°C)	:	Not available

## 10 STABILITY AND REACTIVITY

## Stability

Stable under normal temperatures and pressures.

## Conditions to Avoid

Heat, flames, ignition sources and incompatibles.

## Incompatible Materials

Strong oxidizing agents, acids, alkalies.

## Hazardous Decomposition Products

Carbon monoxide, carbon dioxide and other oxidized substances.

## 11 TOXICOLOGICAL INFORMATION

Chemical name	Acute toxicity (oral)	Acute toxicity (dermal)	Acute toxicity (inhalation: gas)	Acute toxicity (inhalation: vapour)	Acute toxicity (inhalation: dust, mist)	Skin corrosion / irritation	Serious eye damage / eye irritation
Molybdenum disulfide	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible
Mineral oil	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible

Chemical name	Respiratory/skin sensitizer	Germ cell mutagenicity	Carcinogenicity	Toxic to reproduction	Specific target organs/systemic toxicity following single exposure	Specific target organs/systemic toxicity following repeated exposure	Aspiration hazard
Molybdenum disulfide	Respiratory sensitizer: Classification not possible; Skin sensitizer: Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible
Mineral oil	Respiratory sensitizer: Classification not possible; Skin sensitizer: Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible	Classification not possible

## 12 ECOLOGICAL INFORMATION

Chemical name	Hazardous to the aquatic environment (Acute)	Hazardous to the aquatic environment (Chronic)
---------------	--	--

Molykiron 30	MSDS No.	3203
SUMICO LUBRICANT CO., LTD.	Revision Date	Oct. 01, 2010

Molybdenum disulfide	Classification not possible	Classification not possible
Mineral oil	Classification not possible	Classification not possible

---

### 13 DISPOSAL CONSIDERATIONS

Dispose of contents /container in accordance with local/regional/national/international regulations.

---

### 14 TRANSPORT INFORMATION

UN Class

Not determined.

UN No.

Not determined.

Packing Group

Not determined.

---

### 15 REGULATORY INFORMATION

Follow all regulations in your country.

---

### 16 OTHER INFORMATION

References

JIS Z 7250

GHS data-base (NITE)

The information above is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes. In no event shall the company be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential or exemplary damages, howsoever arising, even if the company has been advised of the possibility of such damages.