SAFETY DATA SHEET

Moly Gear and Chain Lube

SECTION 1 - IDENTIFICATION

Product Identifier

Product Number(s) *13129*

Product Name *Moly Gear and Chain Lube*

Other Means of Identification *None*

Recommended Use and Restrictions on Use

Recommended Use *Open gear lubricant with molybdenum disulfide.*

Restrictions on Use *None Identified*

24 hr Emergency Phone Number

800-255-3924
(Chem-Tel)

MANUFACTURER DETAILS		SUPPLIER DETAILS	
Name		**Name**	*Sosmetal Products Inc.*
Address		**Address**	*2945 East Tioga Street* *Philadelphia PA 19134*
Phone Number		**Phone Number**	*215-739-6200*
Fax Number		**Fax Number**	*215-423-1443*

SECTION 2 - IDENTIFICATION

Hazard Classification

HEALTH HAZARDS				PHYSICAL HAZARDS							
Acute Tox. Oral		Mutagenicity		Unstable Explosive		Refrigerated Liq. Gas		Pyrophoric Solid	
Acute Tox. Skin		Carcinogenicity		Explosive		Flammable Liquid		Emits Flammable Gas	
Acute Tox. Inhalation		Tox. to Reproduction		Flammable Gas		Flammable Solid		Oxidizing Liquid	
Skin Irritation	2	STOT SE		Aerosol	1	Self-Reactive Sub.		Oxidizing Solid	
Eye Irritation		STOT RE		Oxidizing Gas		Pyrophoric Liquid		Organic Peroxide	
Resp. Sensitization		Aspiration Hazard	1	Gas Under Pressure	X	Self-Heating Substance		Corrosive to Metal	
Skin Sensitization				**ENVIRONMENTAL HAZARDS** *(GHS Rev 3 Only)*					
				Aquatic Acute	1	Aquatic Chronic	1	Ozone Depleting	

Signal Word *Danger*

Hazard Pictograms

Hazard Statements *Extremely flammable aerosol. Contains gas under pressure; may explode if heated. May be fatal if swallowed and enters airways. Causes skin irritation. Very toxic to aquatic life with long lasting effects.*

Precautionary Statements

General *Keep out of reach of children.*

Prevention *Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Do not spray on an open flame or other ignition source. Do not pierce or burn, even after use. Wash hands thoroughly after handling. Wear protective gloves/protective clothing/eye protection/face protection. Avoid release to the environment.*

Response *IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician. IF ON SKIN: Wash with plenty of water. If skin irritation occurs: Get medical advice/attention. Take off contaminated clothing and wash it before reuse. Collect spillage.*

Storage *Store in a well-ventilated place. Store locked up. Protect from sunlight. Do not expose to temperatures exceeding 50 ˚C/122˚F.*

Disposal *Dispose of contents/container in accordance with local regulations.*

Hazards Not Otherwise Classified *None identified.*

Unknown Acute Toxicity *35 % by wt*

SECTION 3 - COMPOSITION / INFORMATION ON INGREDIENTS

ID	INGREDIENT	CAS NUMBER	% WT RANGE*
1	*Liquefied Petroleum Gas*	*0068476-86-8*	*15 - 40*
2	*Extracts (Petroleum), Heavy Paraffinic Distillate Solvent*	*0064742-04-7*	*15 - 40*
3	*N-Heptane*	*0000142-82-5*	*10 - 30*
4	*Process Oil*	*0064742-52-5*	*5 - 10*
5	*Sulfurized Lard Oil*	*0068990-81-8*	*3 - 7*
6	*Molybdenum Disulfide*	*0001317-33-5*	*1 - 5*
7	*Sodium Sulfonate*	*0068608-26-4*	*1 - 5*
8	*Polyisobutylene*	*0009003-27-4*	*0.5 - 1.5*

** Exact percentages of composition withheld as trade secret*

SECTION 4 - FIRST AID MEASURES

Description of First-Aid Measures

General *If exposed or concerned seek medical advice/attention.*

Eye Contact *Immediately flush with clear water for at least 15 minutes, including under the eyelids. Consult a doctor.*

Skin Contact *Remove with soap and water, rinsing and repeating for 15 minutes. Use skin cream to counter any resulting dryness. Consult a physician if irritation continues. If large skin area is affected, remove contaminated clothing.*

Ingestion *Do not induce vomiting! Immediately have the victim drink plenty of water. Do not give milk or digestible oils. Keep airways free. Contact a physician. Never give anything by mouth if victim is rapidly losing consciousness, unconscious, or convulsing.*

Inhalation *Remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Seek medical attention if symptoms persist or if unconscious.*

First-Aid Responder Protection *Wear adequate personal protective equipment based on the nature and severity of the emergency.*

Most Important Symptoms and Effects, Both Acute and Delayed

Eye Contact *Liquid contact may cause pain along with moderate eye irritation.*

Skin Contact *Prolonged or repeated exposure may cause skin irritation. Repeated contact may cause drying or flaking of skin. May cause more severe response if confined to skin.*

Ingestion *Due to being an aerosol, the product does not lend itself to ingestion. Should ingestion occur, it may cause irritation to membranes of the mouth, throat, and gastrointestinal tract resulting in vomiting and/or cramps. Aspiration of vomit into the lungs may cause inflammation, and possible chemical pneumonitis, bronchopneumonia, or pulmonary edema.*

Inhalation *Prolonged or repeated overexposure is anesthetic. May cause irritation of the respiratory tract, or acute nervous system depression characterized by headache, dizziness, staggering gait, confusion or death. Irritation of the mucous membranes, coughing, and dyspnea are also possible.*

Indication of Immediate Medical Attention and Special Treatment

Notes to Physician *Treat symptomatically.*

Specific Treatments/Antidotes *No information available.*

Immediate Medical Attention *No information available.*

SECTION 5 - FIRE-FIGHTING MEASURES

Extinguishing Media

Suitable Extinguishing Media *Water, CO2, dry chemical, or universal aqueous film forming foam*

Unsuitable Extinguishing Media *Water jet*

Specific Hazards Arising from the Chemical or Mixture

Decomposition Products	*Oxides of carbon (CO, CO2), smoke, and/or vapors*
Hazards from the Product	*CONTENTS EXTREMELY FLAMMABLE AND UNDER PRESSURE. In a fire or if heated, a pressure increase will occur which may result in the container bursting. Vapours heavier than air may spread along the ground and travel to an ignition source.*

Advice for Firefighters

Protective Actions	*Use water spray to cool fire exposed containers as contents may rupture violently from heat developed pressure.*
Protective Equipment	*As with any fire wear SCBA pressure-demand, MSHA/NIOSH approved, and full protective gear.*

SECTION 6 - ACCIDENTAL RELEASE MEASURES

Personal Precautions, Protective Equipment and Emergency Procedures

For Non-Emergency Personnel	*No action should be taken by non-emergency personnel without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spill. Remove ignition sources and provide adequate ventilation only if it is safe to do so.*
For Emergency Responders	*Use personal protection as recommended in Section 8. Observe precautions provided for non-emergency personnel.*

Environmental Precautions

Precautions	*Keep out of drains, sewers, ditches, and waterways. Minimize use of water to prevent environmental contamination.*

Methods and Materials for Containment and Cleaning Up

Containment Procedures	*Product is an aerosol, therefore spills and leaks are unlikely. In case of rupture, released content may be contained with oil/solvent absorbent pads, socks, and/or absorbents. DO NOT use combustible material such as sawdust.*
Cleanup Procedures	*Spills from aerosol cans are unlikely and are generally of small volume. Large spills are therefore not normally considered a problem. In case of actual rupture, avoid breathing vapors and ventilate area well. Remove sources of ignition and use non-sparking equipment. Soak up material with inert absorbent and place in safety containers for proper disposal.*
Other Information	*Aerosol products represent a limited hazard and will not spill or leak unless ruptured. In case of rupture contents are generally evacuated from the can rapidly. Area should be ventilated immediately and continuous ventilation provided until all fumes and vapors have been removed. Aerosol cans should never be incinerated or burned. See Section 13 for disposal.*
Prohibited Materials	*Combustible absorbent material such as sawdust, use of equipment that may cause sparking.*

SECTION 7 - HANDLING AND STORAGE

Precautions for Safe Handling

General Handling Precautions	*KEEP OUT OF THE REACH OF CHILDREN. Avoid prolonged or repeated skin contact. Avoid breathing of vapors. Do not incinerate (burn) containers. Always replace overcap when not in use. Avoid use around open flames or other sources of ignition. Exposure to heat or prolonged exposure to sun may cause can to burst. Use only with adequate ventilation, opening doors or windows to achieve cross-ventilation. Wash hands after use.*
Hygiene Recommendations	*Do not eat, drink or smoke when using this product. Wash hands thoroughly after use. Remove contaminated clothing and protective equipment before entering eating or smoking areas.*

Conditions for Safe Storage Including Any Incompatibilities

Storage Requirements	*Storage of individual cans should be done in an area below 50˚C (122˚F), and away from heat sources. Ensure can is in a secure place to prevent knocking over and accidental rupture. For storage of pallet quantities, compliance with NFPA 30B (Manufacture and Storage of Aerosol Products) is recommended. This product is classified as a Level 3 Aerosol.*
Incompatibilities	*Segregate storage away from materials indicated in Section 10*

SECTION 8 - EXPOSURE CONTROLS / PERSONAL PROTECTION

Control Parameters

Occupational Exposure Limits

ID	OSHA PEL	OSHA STEL	OSHA CEILING	NIOSH IDLH	NIOSH REL	NIOSH STEL	NIOSH CEILING	ACGIH TLV	ACGIH STEL	ACGIH CEILING	AIHA WEEL
1	1000 ppm	–	–	2000 ppm	1000 ppm	–	–	1000 ppm	–	–	–
3	500 ppm	–	–	750 ppm	85 ppm	–	440 ppm	400 ppm	500 ppm	–	–
4	10 mg/m3	–	–	–	–	–	–	–	–	–	–
6	10 mg/m3	–	–	–	–	–	–	–	–	–	–

Biological Exposure Indices

ID	DETERMINANT	SAMPLING TIME	BEI	NOTATION
–	–	–	–	–

Other Control Parameters *Not Available*

Appropriate Engineering Control

Engineering Measures *Use only with adequate ventilation. General ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. Local exhaust ventilation or an enclosed handling system may be necessary to control air contamination below that of the lowest OEL from the table above.*

Individual Protection Measures

Hygiene Considerations *Avoid breathing vapors and contact with the skin and eyes. Always replace overcap when not in use. Keep out the reach of children. Wash hands after use.*

Thermal Protection *This product does not present a thermal hazard.*

Respiratory Protection *An approved respirator with organic vapor cartridge may be permissible under certain circumstances where airborne concentrations are expected to exceed occupational exposure limits. If respirators are needed, compliance with OSHA standard 29 CFR 1910.134 is necessary.*

Skin Protection *For brief contact, no precautions other than clean body-covering clothing should be needed. When prolonged or repeated contact could occur, use protective clothing impervious to the ingredients listed in Section 2.*

Eye/Face Protection *Safety glasses with side shields are recommended as a minimum for any type of industrial chemical handling. Where eye contact with this material could occur, chemical splash proof goggles are recommended.*

Other Protective Equipment *Safety showers and eye-wash stations should be available in the workplace near where the material will be used.*

SECTION 9 - PHYSICAL AND CHEMICAL PROPERTIES

Physical Properties

Boiling Point	*> 98.4 °C (209.2 °F)*	**Melting / Freezing Point**	*>-90.6 °C (-131.0 °F)*
Flash Point, Liquid	*> -4.0 °C (24.8°F)*	**Flash Point, Propellant**	*-104.4 °C (-156.0 °F)*
Explosive Limits	*1.05% - 6.70%*	**Autoignition Temperature, Liquid**	*204.0 °C (399.2 °F)*
Flammability	*Extremely Flammable Aerosol*	**Relative Density (H2O = 1)**	*0.752 g/cc*
Molecular Weight	*Not Available*	**Weight**	*6.274 lbs/gal*
Vapor Pressure	*70.00 psig*	**pH**	*Not Available*
Vapor Density	*3.500 g/cc Maximum*	**Evaporation Rate**	*Not Available*
Form	*Pressurized Product*	**Partition Coefficient**	*Not Available*
Viscosity	*Not Available*	**Refractive Index**	*Not Available*
Odor Threshold	*Not Available*	**Heat of Combustion (△Hc)**	*Not Available*
Odor	*Oily/Musty odor*	**Water Solubility**	*Not Available*
Appearance / Color	*Black coating*	**Decomposition Temperature**	*Not Available*

Air Quality Properties

Percent Volatile	*49% Wt (61% Vol) Max*	**VOC Regulatory**	*3.037 lbs/gal (363.848 g/L)*

Percent VOC	*49% Wt (61% Vol) Max*	**VOC Actual**	*3.037 lbs/gal (363.848 g/L)*
Percent HAP	*0% Wt (0% Vol) Max*	**HAP Content**	*None*
Solids/Non Volatile Content	*52% Wt (40% Vol) Max*	**Maximum Incremental Reactivity**	*0.55 g O3/g*
Global Warming Potential	*0.555*		

SECTION 10 - STABILITY AND REACTIVITY

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

Chemical Stability *This product is stable.*

Hazardous Reactions *Under normal conditions of storage and use, hazardous reactions are not expected to occur.*

Conditions to Avoid *Keep away from heat, sparks, flame, and red hot metal.*

Material Incompatibility *Chlorine Dioxide, Strong Oxidizing Agents*

Decomposition Productions *Oxides of carbon, Sulfur Oxides may be formed depending on fire conditions.*

SECTION 11 - TOXICOLOGICAL INFORMATION

Acute Toxicity Estimates (mixture)

Oral LD_{50}	*5769 mg/kg*
Dermal LD_{50}	*2617 mg/kg*
Inhalation LC_{50}	*787 mg/L 4-hour*

Acute Toxicity on Ingredients

ID	ORAL LD50		DERMAL LD50		INHALATION LC50		
	VALUE	SPECIES	VALUE	SPECIES	VALUE	TIME	SPECIES
1	–	–	–	–	658 mg/L	4h	rat
2	>5000 mg/kg	rat	>3000 mg/kg	rabbit	–	–	–
3	>15000 mg/kg	rat	–	–	103 g/m3	4h	rat
4	>5000 mg/kg	rat	>2000 mg/kg	rabbit	>5560 mg/m3	4h	rat
6	>2000 mg/kg	rat	>2000 mg/kg	rabbit	>2820 mg/kg	4h	rat
7	>5000 mg/kg	rat	–	–	–	–	–
8	>5000 mg/kg	rat	>2000 mg/kg	rabbit	–	–	–

Health Hazard Classification

Skin Corrosion / Irritation	*Category 2*
Eye Damage / Irritation	*Classification criteria not met*
Respiratory Irritation	*Classification criteria not met*
Respiratory / Skin Sensitization	*Classification criteria not met*
Germ Cell Mutagenicity	*Classification criteria not met*
Reproductive Toxicity	*Classification criteria not met*
STOT - Single Exposure	*Classification criteria not met*
STOT - Repeated Exposure	*Classification criteria not met*
Aspiration Hazard	*Category 1*

Carcinogen Data

ID	Calif Prop-65	OSHA	NIOSH	ACGIH	NTP	IARC
	No	No	No	No	No	No

Information on the Likely Routes of Exposure

Routes of Exposure *Skin contact, skin absorption, eye contact, inhalation*

Information on Physical, Chemical and Toxicological Effects

Symptoms of Exposure *Asphyxia, Chemical Pneumonitis, Dermatitis, Dizziness, Drowsiness, Stupor*

Delayed and Immediate Effects and also Chronic Effects from Short and Long-Term Exposure

Delayed Effects	*No known delayed effects.*
Immediate Effects	*No known immediate effects.*
Chronic Effects	*Reports have associated repeated and prolonged occupational overexposure to solvents with irreversible brain and nervous system damage (sometimes referred to as "Solvent or Painter's Syndrome"). Intentional misuse by concentrating and inhaling this product may be harmful or fatal.*
Medical Conditions Aggravated	*May aggravate personnel with pre-existing disorders associated with any of the Target Organs.*
Target Organs	*Central Nervous System, Eyes, Respiratory System*

SECTION 12 - ECOLOGICAL INFORMATION

Acute Aquatic Toxicity

ID	FISH			INVERTEBRATES			AQUATIC PLANTS			MICROORGANISMS		
	TYPE	VALUE	PERIOD	TYPE	VALUE	PERIOD	TYPE	VALUE	PERIOD	TYPE	VALUE	PERIOD
2	LC50	>1000 mg/L	96h	EC50	1.4 mg/L	48h	EC50	3.1 mg/L	96h	EC20	>1000 mg/L	15m
3	EC50	220 mg/L	96h	LC50	>10 mg/L	24h	EC50	1.5 mg/L	8h	–	–	–

Ecological Data

ID	PERSISTENCE AND DEGRADABILITY				BIOACCUMULATIVE POTENTIAL		MOBILITY
	PERSISTENCE	BOD	COD	ThOD	Pow / Kow	BCF	Koc
3	–	–	–	–	4.66 log Pow	3.11 log BCF	2.44 log Koc
4	–	–	–	–	3.9 log Pow	–	–

Other Adverse Effects *No additional information available.*

SECTION 13 - DISPOSAL CONSIDERATIONS

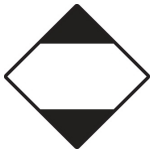
Waste Disposal *Characteristics and waste stream classification can change with product use and location. It is the responsibility of the user to determine the proper storage, transportation, treatment, and/or disposal methodologies for spent materials and residues at the time of disposition. All waste must be disposed of in compliance with the respective national, federal, state, and/or local regulations.*

Waste Disposal of Packaging *An aerosol container that does not contain a significant amount of liquid would meet the definition of scrap metal (40 CFR 261.1(c)(6)), and would be exempt from RCRA regulation under 40 CFR 261.6(a)(3)(iv) if it is to be recycled. If containers are to be disposed of (not recycled) it must be managed under all applicable RCRA and state regulations.*

Landfill Precautions *Not available*

Incineration Precautions *** DO NOT INCINERATE ** CONTENTS UNDER PRESSURE ***

SECTION 14 - TRANSPORTATION INFORMATION

Transportation Information	**Ground Transportation** (DOT)	**Air Transportation** (IATA)	**Ocean Transportation** (IMDG)
UN Number	*UN1950*	*UN1950*	*UN1950*
Proper Shipping Name	*Aerosols, Limited Quantity*	*Aerosols, Flammable, Limited Quantity*	*Aerosols, Limited Quantity*
Hazard Class(es)	*2.1*	*2.1*	*2.1*
Packaging Group	—	—	—
Marine Pollutant	*No*	*No*	*No*
Hazard Label(s)			

SECTION 15 - REGULATORY INFORMATION

Federal Regulations

ID	TSCA LISTED	SARA 302 EHS TPQ	RCRA	CERCLA	SARA 313	FIRE	REACTIVITY	SARA 311/312 ACUTE	SARA 311/312 CHRONIC	SARA 311/312 PRESSURE	CLEAN AIR ACT HAP	CLEAN AIR ACT SOCMI	CLEAN WATER ACT
1	Yes	–	–	–	–	Yes	–	–	–	–	–	–	–
2	Yes	–	–	–	–	–	–	–	–	--	–	–	–
3	Yes	–	–	–	–	Yes	–	Yes	–	–	–	–	–
4	Yes	–	–	–	–	–	–	–	–	–	–	–	–
5	Yes	–	–	–	–	–	–	–	–	–	–	–	–
6	Yes	–	–	–	–	–	–	–	–	–	–	–	–
7	Yes	–	–	–	–	–	–	–	–	–	–	–	–
8	Yes	–	–	–	–	–	–	–	–	–	–	–	–

State Regulations

ID	CA P-65	DE RQ	MA RTK CODES	ME TYPE	ME RQ	MN RTK	MN AIR	MN WATER	NJ RTK	NY AIR	NY LAND	NY ACUTE	PA LISTED	WA PEL TWA	WI TABLE	WV TAP
2	–	–	1 *E*C*	–	–	–	–	–	–	–	–	–	–	–	–	–
3	–	–	2,4,5,6	–	–	ANO	–	–	–	–	–	–	Yes	400 ppm	–	–
6	–	–	2	–	–	–	–	–	–	–	–	–	–	–	–	–

SECTION 16 - OTHER INFORMATION

SDS Revision History

Revision 3, 06/09/2004, Update
Revision 4, 07/09/2015, Updated to GHS Version 3 Format.
Revision 5, 08/10/2015, Changed to reflect Sosmetal information only.

SDS Compliance

This SDS complies with the below listed regulations only. For SDS that comply with other countries, please contact our Regulatory Department at msds@chem-pak.com
OSHA Hazard Communication Standard (HCS 2012) 29 CFR 1910.1200
Globally Harmonized System of Classification and Labeling of Chemicals (GHS) Revision 3

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