

# Guide To Lubriplate® NSF H-1 Registered Food Machinery Lubricants



Synthetic, Multi-Purpose,  
Food Machinery Grade Fluid Lubricants

Synthetic, High Temperature,  
Oven Chain Lubricants

Synthetic, Multi-Purpose,  
Food Machinery Grade Greases

USP Mineral Oil-Based,  
Food Machinery Grade Oils

USP Mineral Oil-Based,  
Food Machinery Grade Greases

Food Machinery Grade  
Spray Lubricants

Refrigeration Compressor Fluid

Cleaning and Flushing Fluid / Oil

Perma Automatic  
Lubricators



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## ■ Complimentary Value Added Services Offered



### Technical Support Hotline and E-mail

Call our technical service center toll free at 800-347-5343 or 800-733-4755 for answers to your lubrication questions by phone, or e-mail your questions to [LubeXpert@lubriplate.com](mailto:LubeXpert@lubriplate.com) or contact your nearest Lubriplate district manager (see back cover for listing) or your local distributor representative for complete technical support.



### Complete Plant Surveys and Lubricant Inventory Consolidation

Complete plant surveys by our professional staff of lubrication engineers are also available to determine your exact lubricant requirements and identify opportunities for lubricant inventory consolidation.



### Customized, Color Coded, Lubricant Specification, Machinery Tags

Customized with your company logo, these color coded machinery tags help prevent lubricant misapplication and ensure that the proper lubricant is used when servicing a particular piece of equipment. Based on a complete plant survey, tags can be provided for each piece of equipment in your plant.



### Lubrication Maintenance Software

Lubriplate offers a PC based computer software program that puts your entire lubrication and maintenance schedules at your fingertips. This service is based on a complete survey of your entire plant. Contact Dan Moroses (Newark office) for details at 973-589-9150.



### No-Charge Oil / Fluid and Grease Analysis

Our Oil/Fluid and Grease Analysis Program that is offered at no-charge on all Lubriplate products. Tests that are performed include: Viscosity, Acidity, Contamination (% sediment and % moisture,) Spectrochemical (PPM of wear metals and additives) ISO Cleanliness (optional). An interpretation of the results is included along with suggested actions to take.



### In Plant User Lubrication Training and Distributor Training

We offer training programs tailored to fit your needs. These educational training sessions focus on all facets of machinery lubrication and are not a sales presentation. Seminars are graphically presented with overheads, and other support material. Available on-site at your facility or in a local conference room. Contact us at 800-733-4755 for more information. Our Online Training Program is available at: <http://www.lubriplate.com/Training-Videos/Lubrication-BasicTraining.aspx>



# Lubriplate® NSF H-1 Registered, Food Grade Lubricants

Lubriplate's complete line of high-performance, NSF H-1 Registered, Food Machinery Grade Lubricants is designed to provide total food processing and bottling plant lubrication capability. Manufactured in compliance with strict ISO 21469 and ISO 9001 Registered quality assurance standards, these lubricants are formulated from the highest quality base stocks combined with state-of-the-art anti-wear additives. They deliver a number of significant, cost effective advantages as outlined on the chart below.

All Lubriplate H-1 Lubricants are manufactured with ingredients that comply with FDA regulation 21 CFR 178.3570 for lubricants with incidental food contact. They meet USDA H-1 safety standards and are authorized for use in federally inspected meat and poultry plants. Clean, safe and non-toxic, their use can eliminate lubrication as a critical control point in HACCP programs.



Select Lubriplate H-1 Lubricants are formulated with LUBRI-ARMOUR® Anti-Microbial Additive. Developed to prevent the decomposition of lubricants caused by microorganisms, greases treated with LUBRI-ARMOUR® remain fresh and last longer in harsh food processing plant environments.



FEATURES	BENEFITS
<b>Advanced High-Performance Formulations</b>	Improved machinery life; decreased wear; reduced power consumption; extended lube intervals.
<b>NSF H-1 Registered Products</b>	Assures compliance with USDA / FDA guidelines and HACCP programs.
<b>Multifunctional use</b>	Reduces, consolidates and simplifies lubricant inventories and reduces lubricant misapplication.
<b>Toll Free Technical Support 800-347-5343</b>	Quick response to your lubrication questions.
<b>Complimentary Plant Surveys</b>	Identify opportunities for lubricant inventory consolidation and improvements.
<b>No-charge Oil/Fluid and Grease Analysis</b>	Helps determine lubricant and/or machinery condition and corrective measures needed.

## F.D.A. CODES (CFR) FOR LUBRICANTS WITH INCIDENTAL FOOD CONTACT

<b>21.CFR 178-3570</b>	Ingredients used to manufacture H-1 lubricants must comply with this code. / All Lubriplate H-1 products comply with this code.
<b>21.CFR 178-3620</b>	Technical White Mineral Oil as a component of non-food articles intended for use in contact with food. / The FMO Series complies.
<b>21.CFR 172-878</b>	USP White Mineral Oil for direct contact with food. / Lubriplate FMO Series complies with this code.
<b>All of the mineral oil based products in the LUBRIPLATE H-1 range are formulated with USP White Mineral Oil which is both the purest and highest quality base oil any manufacturer can use to formulate H-1 lubricants.</b>	
<b>21.CFR 172-882</b>	Synthetic isoparaffinic hydrocarbons, i.e., PAO base stocks / Lubriplate SFGO Ultra Series, SFL Series and the SYNXTREME FG Series.
<b>21.CFR 182</b> with 9 subheadings	Substances Generally Recognized As Safe, e.g., zinc oxide and tocopherols (Vitamin E.)

## NSF Registration Numbers and Category Codes for Lubriplate Food Machinery Lubricants.

LUBRIPLATE PRODUCT	NSF REG. NUMBER	CLASS CODE	LUBRIPLATE PRODUCT	NSF REG. NUMBER	CLASS CODE	LUBRIPLATE PRODUCT	NSF REG. NUMBER	CLASS CODE
CLEARPLEX -1	140575	H1	FP-150	126123	H1	SFGO ULTRA 320	125540	H1
CLEARPLEX -2	129940	H1	FP-150-L	126124	H1	SFGO ULTRA 460	125541	H1
FG COOKER OIL	122669	H1	HTCL FG-68	143869	H1	SFGO ULTRA 680	125542	H1
FGL-00	043532	H1	HTCL FG-220	143870	H1	SFGO ULTRA 1000	125543	H1
FGL-0	043531	H1	GEN. PUR. FG SILICONE (AEROSOL)	126086	H1	SFL-000	136256	H1
FGL-1	043534	H1	PAN DIVIDER OIL	139787	3H, H1	SFL-00	113092	H1
FGL-2	043536	H1	PDO LIGHT	142304	3H, H1	SFL-0	119618	H1
FGL-CC	043530	H1	PGO-FGL 150	141192	H1	SFL-1	043677	H1
FMO-45	122688	3H, H1	PGO-FGL 220	141193	H1	SFL-2	113093	H1
FMO-85	122674	3H, H1	PGO-FGL 320	141194	H1	SILICONE FLUID FG-350	138305	H1
FMO-200	122689	3H, H1	PGO-FGL 460	141195	H1	SPECIAL COOKER CHAIN GREASE	120918	H1
FMO-300	122783	H1	PGO-FGL 680	141196	H1	SSO-FG-100	138390	H1
FMO-350	122666	3H, H1	PM-500	126122	H1	SSO-FG-150	138391	H1
FMO-500	122672	3H, H1	PURE FLUSH	126121	H1	STO-FG	126120	H1
FMO-85-AW	122670	H1	PURE TAC	043649	H1	SUPER FGL-1 (AEROSOL)	126088	H1
FMO-150-AW	132661	H1, HT1	PURE TAC LIGHT	141506	H1	SUPER FML-0	125742	H1
FMO-200-AW	122668	H1	RCO-68 FG	138533	H1	SUPER FML-1	125740	H1
FMO-350-AW	122665	H1	SFGO ULTRA-7 (AEROSOL)	136601	H1	SUPER FML-2	125741	H1
FMO 350 AW SPRAY	126089	H1	SFGO ULTRA 7	125679	H1	SUPER FML-2 (AEROSOL)	126087	H1
FMO-500-AW	122664	H1	SFGO ULTRA 15	138420	H1	SYN H-1 220	138317	H1
FMO-500-AW-OR	124778	H1	SFGO ULTRA 22	138421	H1	SYN H-1 WORM GEAR LUBRICANT	139198	H1
FMO-500-AW-OR (D)	135986	H1	SFGO ULTRA 32	125680	H1,HT1	SYN ST HP H-1 SPECIAL SILICONE	142599	H1
FMO-900-AW	122675	H1	SFGO ULTRA 46	125678	H1	SYNXTREME FG-0	137239	H1
FMO-1100-AW	122687	H1	SFGO ULTRA 68	125681	H1	SYNXTREME FG-1	137238	H1
FMO-1700-AW	122667	H1	SFGO ULTRA 100	125682	H1	SYNXTREME FG-2	136212	H1
FMO-2400-AW	122671	H1	SFGO ULTRA 150	125683	H1	SYNXTREME FG-1/220	142237	H1
FMO-3800-AW	122673	H1	SFGO ULTRA 220	125539	H1	SYNXTREME FG-2/220	142239	H1

**SFGO Ultra Series:** 100% Synthetic, Polyalphaolefin (PAO)-Based, High-Performance, Multi-Purpose Fluid Lubricants.

Formulated with 100% PAO synthetic base fluids for a variety of demanding applications. They are outstanding lubricants for use under severe conditions subject to extremely high or low temperatures. They exhibit outstanding oxidation resistance and thermal stability capabilities. Recommended for air compressors, hydraulic systems, bearings, gearboxes, pumps and chains. Meets FDA 21 CFR 178.3570 and FDA 21 CFR 172.882 for applications where incidental contact with the edible product may occur. SFGO Ultra 220 and 460 pass 14 stages of the FZG Test.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO GRADE	AGMA NO.	SAE GEAR OIL NO.	SAE NO.	VISCOSITY cSt @40°C / 100°C	VISCOSITY SUS @100°F / 210°F	VISCOSITY INDEX	FLASH POINT	FIRE POINT	POUR POINT
SFGO Ultra-7	L0912-	7	-	-	5W	7 / 2	51 / 34	104	305°F / 152°C	400°F / 204°C	-65°F / -54°C
SFGO Ultra-15	L0930-	15	-	-	5W	16 / 4	89 / 39	122	405°F / 207°C	435°F / 224°C	-60°F / -51°C
SFGO Ultra-22	L0931-	22	-	-	5W	20 / 4	106 / 41	128	405°F / 207°C	430°F / 221°C	-65°F / -54°C
SFGO Ultra-32	L0915-	32	-	75	10	30 / 6	160 / 46	135	475°F / 246°C	515°F / 268°C	-58°F / -50°C
SFGO Ultra-46	L0916-	46	1	80	20	50 / 8	220 / 52	134	480°F / 249°C	520°F / 271°C	-45°F / -43°C
SFGO Ultra-68	L0917-	68	2	80	30	67 / 10	325 / 59	141	495°F / 257°C	530°F / 277°C	-45°F / -43°C
SFGO Ultra-100	L0983-	100	3	85	40	98 / 14	556 / 77	145	485°F / 252°C	520°F / 271°C	-43°F / -42°C
SFGO Ultra-150	L0984-	150	4	90	50	146 / 19	762 / 97	141	495°F / 257°C	525°F / 274°C	-43°F / -42°C
SFGO Ultra-220	L0985-	220	5	90	50	222 / 26	1088 / 128	146	520°F / 271°C	540°F / 282°C	-42°F / -41°C
SFGO Ultra-320	L0986-	320	6	140	60	318 / 34	1557 / 161	152	520°F / 271°C	545°F / 285°C	-40°F / -40°C
SFGO Ultra-460	L0987-	460	7	140	-	452 / 46	2143 / 211	159	480°F / 249°C	515°F / 268°C	-40°F / -40°C
SFGO Ultra-680	L0988-	680	8	250	-	623 / 57	3289 / 275	157	500°F / 260°C	545°F / 285°C	-45°F / -43°C
SFGO Ultra-1000	L0989-	1000	-	-	-	950 / 77	4900 / 372	157	500°F / 260°C	545°F / 285°C	-35°F / -37°C
SFGO Ultra-1500	L0926-	1500	-	-	-	1520 / 85	7590 / 326	126	470°F / 243°C	500°F / 260°C	10°F / -12°C

\*SFGO Ultra Fluids are available in Jugs, Pails, 1/4 Drums & Drums. See page 10 for more information and package part number suffix.

**OEM / Lubriplate H-1 Class Air Compressor Fluid Crossover Recommendations**

Ingersoll-Rand SSR H-1 F	Lubriplate SFGO Ultra 32	Leroi SSL-46	Lubriplate SFGO Ultra 46
Ingersoll-Rand FG Coolant	Lubriplate SFGO Ultra 46	Quincy Quin Syn FG	Lubriplate SFGO Ultra 46
Compair CSX 20	Lubriplate SFGO Ultra 46	Gardner Denver AEON 6000 FG	Lubriplate SFGO Ultra 46
Kaeser Sigma 8000 FG	Lubriplate SFGO Ultra 46	Atlas-Copco GA-FG	Lubriplate SFGO Ultra 32

**Syncool FG:** NSF H-1 Registered, 100% Synthetic, Polyglycolester (PGE) Air Compressor Fluid.

Recommended for use in high performance rotary screw and rotary vane air compressors where high operating temperatures are present. State of the art additives enhance its inherent outstanding performance characteristics. Readily biodegradable. NSF H-1 registered, food machinery grade.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO GRADE	SAE NO.	VISCOSITY cSt @40°C / 100°C	VISCOSITY SUS @100°F / 210°F	VISCOSITY INDEX	FLASH POINT	FIRE POINT	POUR POINT
SYNCOOL FG	L0963-	46	20	41 / 10	-	178	530°F / 277°C	595°F / 313°C	-45°F / -43°C

\*Syncool FG Fluid is available in Jugs, Pails, Drums and Bulk Bins. See page 10 for more information and package part number suffix.

**SSO-FG 100 & SSO-FG 150:** 100% Synthetic Lubricants for Angelus and Zacmi Seamers and Canning Equipment.

These high quality, fully synthetic lubricants are designed for use in Angelus and Zacmi seaming/canning equipment and related applications. Formulated with premium additives, these high performance lubricants provide excellent anti-wear, anti-rust and anti-corrosion protection under extreme conditions encountered in the food processing industry such as water, steam and caustic solution wash downs.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO GRADE	AGMA NO.	SAE GEAR OIL NO.	SAE NO.	VISCOSITY cSt @40°C / 100°C	VISCOSITY SUS @100°F / 210°F	VISCOSITY INDEX	FLASH POINT	FIRE POINT	POUR POINT
SSO-FG 100	L0956-	100	3	85	40	105 / 16	556 / 77	156	515°F / 268°C	560°F / 293°C	-65°F / -51°C
SSO-FG 150	L0957-	150	4	90	50	151 / 20	762 / 97	156	515°F / 268°C	560°F / 293°C	-60°F / -51°C

\*SSO-FG 100 and SSO-FG 150 are available in Drums. See page 10 for more information and package part number suffix.

**PGO-FGL Series:** Polyalkylene Glycol (PAG)-Based, Synthetic Gear Lubricants.

These extreme pressure lubricants are designed for use in helical, bevel helical, planetary and worm type gearboxes operating in the most demanding food manufacturing environments. Formulated with a high performance food grade additive package, these lubricants deliver outstanding protection against micropitting and wear as well as good corrosion protection and thermal stability.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO GRADE	AGMA NO.	SAE GEAR OIL NO.	SAE NO.	VISCOSITY cSt @40°C / 100°C	VISCOSITY SUS @100°F / 210°F	VISCOSITY INDEX	FLASH POINT	FIRE POINT	POUR POINT
PGO-FGL-150	L0810-	150	4	90	40	150 / 25	556 / 77	232	543°F / 284°C	-	-53°F / -47°C
PGO-FGL-220	L0811-	220	5	90	50	227 / 42	762 / 97	242	543°F / 284°C	-	-44°F / -42°C
PGO-FGL-320	L0812-	320	6	140	60	339 / 61	1088 / 128	252	540°F / 282°C	-	-38°F / -39°C
PGO-FGL-460	L0813-	460	7	140	-	477 / 83	2143 / 211	262	543°F / 284°C	-	-33°F / -36°C
PGO-FGL-680	L0815-	680	8	250	-	725 / 122	3289 / 275	272	549°F / 287°C	-	-27°F / -33°C

\*All PGO-FGL Series Fluids are available in Jugs, Pails and Drums. PGO-FGL-460 is also available in Quart Bottles. See page 10 for more information and package part number suffix.

## ■ Synthetic, High-Temperature Oven Chain Lubricants NSF H-1 Registered

### HTCL-FG 220 and HTCL-FG 68: 100% Synthetic, Polyol Ester (POE)-Based, Oven Chain Lubricants.

These 100% synthetic, Polyol Ester (POE)-Based fluids are specifically designed for use on oven chains in food manufacturing operations where incidental food contact is a possibility. Recommended for use on bakery oven chains and other oven chain applications, including; drying oven chains, tender frame chains, heat-treating chains and paint curing oven chains. The combination of an ashless additive system and the synthetic ester base provide protection against wear, rust, oxidation and corrosion. They eliminate carbon build-up on chains and help maintain a clean lubricated surface. HTCL-FG 68 can be fed through micro lube systems, spray systems, mist systems, drip bottle systems and can be hand applied. They do not contain harmful VOC's which pollute the atmosphere. Superior film strength reduces oil consumption and reduces smoke. High auto-ignition temperatures (>700°F / 371°C) reduce the risk of oven fires. Advanced ester chemistry reduces friction, wear and energy costs.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO GRADE	AGMA NO.	SAE GEAR OIL NO.	SAE NO.	VISCOSITY cSt @40°C / 100°C	VISCOSITY INDEX	FLASH POINT	FIRE POINT	POUR POINT
HTCL-FG 220	L0947-	220	5	90	-	224 / 20	-	575°F / 302°C	-	-
HTCL-FG 68	L0946-	68	2	80	-	68 / 11	-	575°F / 302°C	-	-

\*HTCL-FG 220 & HTCL-FG 68 are available in Pails and Drums. See page 10 for more information and package part number suffix.

## ■ Synthetic Food Machinery Grade Greases NSF H-1 Registered

### SYNXTREME FG-Series:

Synthetic, Calcium Sulfonate Complex, Food Machinery Grade Greases.

NSF H-1 registered, high performance, multi-purpose, synthetic, food machinery grade greases. Provides long lasting, anti-wear and extreme pressure protection. Highly resistant to water and caustic solution wash downs. Provides excellent high and low temperature performance. SYNXTREME FG-1/220 and FG-2/220 are formulated with a heavier (ISO 220 Grade) base fluid and are recommended for all types of bearings and other equipment operating under high temperature conditions. **SYNXTREME FG-1/220 and FG-2/220 Contain LUBRI-ARMOUR Anti-Microbial Additive.**



This series is also available in Pails, 1/4 Drums, Drums & Perma Lubricators.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	GREASE TYPE THICKENER	NLGI GRADE	BASE OIL TYPE	BASE OIL VIS. cSt @ 40°C	RECOMMENDED TEMPERATURE RANGE MINIMUM	RECOMMENDED TEMPERATURE RANGE MAXIMUM	ASTM DROP POINT
SYNXTREME FG-0	L0307-	Calcium Sulfonate Complex	0	Synthetic PAO	100	-45°F / -43°C	390°F / 199°C	>600°F / 316°C
SYNXTREME FG-1	L0306-	Calcium Sulfonate Complex	1	Synthetic PAO	100	-45°F / -43°C	440°F / 227°C	>600°F / 316°C
SYNXTREME FG-2	L0305-	Calcium Sulfonate Complex	2	Synthetic PAO	100	-45°F / -43°C	450°F / 232°C	>600°F / 316°C
SYNXTREME FG-1/220	L0311-	Calcium Sulfonate Complex	1	Synthetic PAO	220	-40°F / -40°C	440°F / 227°C	>600°F / 316°C
SYNXTREME FG-2/220	L0309-	Calcium Sulfonate Complex	2	Synthetic PAO	220	-40°F / -40°C	450°F / 232°C	>600°F / 316°C

\*SYNXTREME FG Series Greases are available in Cartridges, Pails, 1/4 Drums, Drums & Perma Lubricators. See pages 10 and 11 for more information and package part number suffix.

### SFL Series: Multi-Purpose Synthetic, Aluminum Complex, Food Machinery Grade Greases.

This series provides an exceptionally wide operating temperature range, high shear stability, excellent water resistance, and load carrying properties. For use in freezers and other cold temperature applications or in areas subject to both cold and elevated temperatures. Available in 4 densities. **Contains LUBRI-ARMOUR Anti-Microbial Additive.**

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	GREASE TYPE THICKENER	NLGI GRADE	BASE OIL TYPE	BASE OIL VIS. cSt @ 40°C	RECOMMENDED TEMPERATURE RANGE MINIMUM	RECOMMENDED TEMPERATURE RANGE MAXIMUM	ASTM DROP POINT
SFL-00	L0195-	Aluminum Complex	00	Synthetic PAO	39	-60°F / -51°C	300°F / 149°C	400°F / 204°C
SFL-0	L0196-	Aluminum Complex	0	Synthetic PAO	39	-60°F / -51°C	325°F / 163°C	425°F / 218°C
SFL-1	L0197-	Aluminum Complex	1	Synthetic PAO	39	-60°F / -51°C	350°F / 177°C	450°F / 232°C
SFL-2	L0198-	Aluminum Complex	2	Synthetic PAO	219	-40°F / -40°C	400°F / 204°C	500°F / 260°C

\*SFL Series Greases are available in Cartridges, Pails, 1/4 Drums, Drums & Perma Lubricators. See pages 10 and 11 for more information and package part number suffix.

### SYN ST High Performance H-1 Special: Food Machinery Grade Silicone Lubricant.

Manufactured with PTFE, this new H-1, N.L.G.I. No. 3, silicone lubricant is compatible with most rubber and other non-silicone elastomers. Recommended for use on O-rings and seals on bottling, dairy, food processing and dispensing equipment, it is highly resistant to hot water, steam and alkaline solutions. This product is not compatible with oxygen (O<sub>2</sub>) and should not be recommended for any application where there is a possibility of this product coming in contact with any form of oxygen (both liquid and gas).

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	GREASE TYPE THICKENER	NLGI GRADE	BASE OIL TYPE	BASE OIL VIS. cSt @ 25°C	RECOMMENDED TEMPERATURE RANGE MINIMUM	RECOMMENDED TEMPERATURE RANGE MAXIMUM	ASTM DROP POINT
SYN-ST H-1 Spec	L0365-	PTFE	3	Silicone	500	-58°F / -50°C	300°F / 149°C	500°F / 260°C

\*SYN ST High Performance H-1 Special is available in Tubes, Cartridges and Pails. See page 10 for more information and package part number suffix.

**FMO-AW Series:** Multi-Purpose, Food Grade USP White Mineral Oils.

These super multi-purpose, anti-wear fortified, USP White mineral oil based lubricants are manufactured in ten ISO grades for a wide variety of applications. NOTE: FMO-350AW is also available in a red and orange color which helps in leak detection. The original FMO Series products without the anti-wear additive system are still available. FMO-1100AW and FMO-2400AW pass 12 stages of the FZG test.

**FMO Series 45 thru 500:** Multi-Purpose, Direct Contact (NSF H1 & 3H Registered) USP White Mineral Oils.

These multi-purpose, pure USP white mineral oils offer the utmost in purity. They comply with FDA regulations 21.CFR 178-3570, 21.CFR 178-3620 and 21.CFR 172-878 and are NSF H-1 & 3H registered for use in applications where there is direct contact with the edible product.

**FP-150 and FP-150L:** Clear, Tacky, Multi-Purpose Oils.

These clear, tacky, adhesive, NSF H-1 Registered oils resist heavy water washdown and steam. For helical gearboxes, chains, linkages, cams, and slides and wherever a dripless, adhesive fluid lubricant is desired.

**Food Grade Cooker Oil:** For Cookers and Sterilizers.

This zinc free, NSF H-1 Registered oil is designed for use in the Manzel Lubricators and Micro-valve systems found on most cookers and sterilizers used in canning operations and other applications involving high temperature and high humidity conditions.

**Seamer Oil FG Series:** Food Grade, USP Mineral Oils For Can Seaming Equipment.

These high performance, USP mineral oil-based, food grade seamer oils are specifically designed to lubricate can seaming machines with once-through oil systems as well as those that utilize oil re-circulating/filtration systems. Recommended for Angelus Seamer Models 61H, 120L, 121L, 140S & 180S.

**STO-FG Oil:** For Bottle Filling Machines.

A non-corrosive, NSF H-1 Registered, food machinery grade oil for lubricating stirrups on bottle filling machines.

**PM 500 White Oil:** Contains Emulsifying Agents.

This oil contains emulsifying agents that wet the lubricated surfaces and provide an oily film. Used very successfully on pear machines.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO VIS. GRADE	AGMA NO.	SAE GEAR OIL NO.	SAE NO.	VISCOSITY cSt @40°C / 100°C	VISCOSITY SUS @100°F / 210°F	VISCOSITY INDEX	FLASH POINT	FIRE POINT	POUR POINT
<b>FMO-85 AW</b>	L0880-	22	-	-	5W	21 / 4	102 / 40	107	345°F / 174°C	365°F / 185°C	-30°F / -34°C
<b>FMO-150 AW</b>	L0879-	32	-	-	10W	31 / 5	146 / 44	107	400°F / 204°C	450°F / 232°C	-20°F / -29°C
<b>FMO-200 AW</b>	L0881-	46	1	75	10	47 / 7	196 / 48	103	455°F / 235°C	490°F / 254°C	-15°F / -26°C
<b>FMO-350 AW</b>	L0882-	68	2	80	20	65 / 9	347 / 55	102	480°F / 249°C	515°F / 268°C	-10°F / -23°C
<b>FMO-500 AW</b>	L0883-	100	3	80	30	95 / 11	545 / 70	101	500°F / 260°C	555°F / 291°C	5°F / -15°C
<b>FMO-900 AW</b>	L0884-	150	4	90	40	164 / 16	856 / 83	102	475°F / 246°C	530°F / 277°C	5°F / -15°C
<b>FMO-1100 AW</b>	L0886-	220	5	90	50	207 / 18	1126 / 97	99	455°F / 235°C	510°F / 266°C	10°F / -12°C
<b>FMO-1700 AW</b>	L0887-	320	6	140	60	301 / 23	1730 / 12	96	440°F / 227°C	490°F / 254°C	10°F / -12°C
<b>FMO-2400 AW</b>	L0885-	460	7	140	70	429 / 30	2350 / 142	98	445°F / 229°C	490°F / 254°C	15°F / -10°C
<b>FMO-3800 AW</b>	L0888-	680	8	250	-	700 / 41	3864 / 198	98	425°F / 218°C	475°F / 246°C	20°F / -7°C
*FMO-AW Series Oils are available in Bottles, Jugs, Pails, 1/4 Drums, Drums & Perma Lubricators. See pages 10 and 11 for more information and package part number suffix.											
<b>FMO-45</b>	L0737-	5	-	-	-	4 / -	40 / -	-	265°F / 129°C	-	30°F / -1°C
<b>FMO-85</b>	L0740-	15-22	-	-	5W	19 / 4	100 / 40	122	335°F / 168°C	370°F / 188°C	-45°F / -43°C
<b>FMO-200</b>	L0739-	46	1	75	10	41 / 6	200 / 47	105	433°F / 223°C	405°F / 207°C	-25°F / -32°C
<b>FMO-350</b>	L0741-	68	2	80	20	68 / 8	347 / 55	104	435°F / 224°C	490°F / 254°C	-10°F / -23°C
<b>FMO-500</b>	L0742-	100	3	80	30	109 / 12	545 / 70	101	510°F / 266°C	555°F / 290°C	0°F / -18°C
*FMO Series Oils are available in Bottles, Jugs, Pails, 1/4 Drums, Drums & Perma Lubricators. See pages 10 and 11 for more information and package part number suffix.											
<b>FP-150</b>	L0735-	460	7	140	70	367 / 25	1950 / 127	93	395°F / 202°C	455°F / 235°C	0°F / -18°C
<b>FP-150L</b>	L0736-	100	3	80	30	103 / 12	510 / 67	108	410°F / 210°C	450°F / 232°C	-5°F / -21°C
*FP-150 and FP-150L are available in Jugs, Pails, 1/4 Drums & Drums. See page 10 for more information and package part number suffix.											
<b>FG Cooker Oil</b>	L0701-	150	4	90	40	155 / 16	795 / 82	104	475°F / 246°C	525°F / 274°C	5°F / -15°C
*FG Cooker Oil is available in Drums. See page 10 for more information and package part number suffix.											
<b>Seamer Oil FG-100</b>	L0908-	100	3	80	30	109 / 12	-	102	495°F / 257°C	545°F / 285°C	0°F / -18°C
<b>Seamer Oil FG-150</b>	L0909-	150	4	90	40	151 / 14	-	99	450°F / 232°C	540°F / 282°C	0°F / -18°C
*Seamer Oil FG-100 and Seamer Oil FG-150 is available in Drums. See page 10 for more information and package part number suffix.											
<b>STO-FG</b>	L0863-	68	2	80	20	67 / 13	340 / 70	105	425°F / 218°C	485°F / 252°C	-15°F / -26°C
*STO-FG is available in Pails & Drums. See page 10 for more information and package part number suffix.											
<b>PM-500</b>	L0192-	100	3	80	30	101 / 11	560 / 64	86	420°F / 216°C	485°F / 252°C	-5°F / -21°C
*PM-500 is available in Pails, 1/4 Drums & Drums. See page 10 for more information and package part number suffix.											



## ■ USP White, Food Grade, Pan Divider Oils NSF H-1 & 3H Registered

### Pan Divider Oil and PDO Light: Food Grade, USP White Mineral Oils For Pan Divider Applications.

These oils meet and exceed FDA regulation 21 CFR 172.878 for direct contact with food. Recommended for pan divider oil applications.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO GRADE	SAE NO.	VISCOSITY cSt @40°C	VISCOSITY SUS @100°F / 210°F	VISCOSITY INDEX	FLASH POINT	FIRE POINT	POUR POINT
Pan Divider Oil	L0747-	15	5W	15.6	85 / 38	-	375°F / 190°C	-	10°F / -12°C
PDO Light	L0853-	7	-	6.7 - 10.5	-	83	350°F / 177°C	-	-

\*Pan Divider Oil and PDO Light is available in Pails & Drums. See page 10 for more information and package part number suffix.

## ■ USP Mineral Oil-Based, Food Machinery Grade Greases NSF H-1 Registered

### FGL Series:

High Performance, Multi-Purpose, Aluminum Complex, Food Grade Greases.

Designed to meet the demands of food and beverage industry plant engineers who want NSF H-1 Registered greases to totally replace H-2 greases. Fortified with anti-wear, anti-rust and anti-corrosion additives which combine to yield excellent shear stability, load carrying capability and resistance to water and caustic wash down. Available in four NLGI densities for a variety of applications. FGL-CC is for centralized/automatic lubrication systems on high speed can closing equipment. **Contains LUBRI-ARMOUR Anti-Microbial Additive.**



This series is also available in Cans, Pails, 1/4 Drums, Drums & Perma Lubricators.

### FML Series: Multi-Purpose, Anhydrous Calcium, Food Grade Greases.

These very popular, white, multi-purpose greases have been leaders in the food processing industry for years. Available in 3 NLGI grades for a wide variety of applications. NSF H-1 Registered.

### PURE TAC and PURE TAC LIGHT: Tacky, Adhesive, Aluminum Complex, Food Grade Greases.

These tacky, adhesive, highly water resistant, NSF H-1 Registered greases are designed for applications subjected to chemically treated water, heat and steam. For all types of medium to slow speed bearings, open gears and hydrostatic cooker chains. **Contains LUBRI-ARMOUR Anti-Microbial Additive.**

### CLEARPLEX Series: Clear, Multi-Purpose, Aluminum Complex, Food Grade Greases.

These Aluminum Complex thickened, NSF H-1 Registered greases are engineered for use in plain and anti-friction bearings in the food processing and beverage processing industry. CLEARPLEX-1 is excellent for the lubrication systems of high speed can seaming and closing equipment. Contains non-zinc oxide anti-wear additive. CLEARPLEX Series greases. **Contains LUBRI-ARMOUR Anti-Microbial Additive.**

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	GREASE TYPE THICKENER	NLGI GRADE	BASE OIL TYPE	BASE OIL VIS. cSt @ 40°C	RECOMMENDED TEMPERATURE RANGE MINIMUM	RECOMMENDED TEMPERATURE RANGE MAXIMUM	ASTM DROP POINT
FGL-00	L0226-	Aluminum Complex	00	USP White Mineral Oil	120	-0°F / -18°C	300°F / 149°C	410°F / 210°C
FGL-CC	L0229-	Aluminum Complex	0/00	USP White Mineral Oil	120	-10°F / -23°C	350°F / 177°C	450°F / 232°C
FGL-0	L0230-	Aluminum Complex	0	USP White Mineral Oil	120	-0°F / -18°C	335°F / 168°C	435°F / 224°C
FGL-1	L0231-	Aluminum Complex	1	USP White Mineral Oil	120	-0°F / -18°C	360°F / 182°C	460°F / 238°C
FGL-2	L0232-	Aluminum Complex	2	USP White Mineral Oil	160	10°F / -12°C	400°F / 204°C	515°F / 268°C
*FGL Series greases are available in Cans, Cartridges, Pails, 1/4 Drums, Drums & Perma Lubricators. See pages 10 and 11 for more information and package part number suffix.								
FML-0	L0143-	Anhydrous Calcium	0	USP White Mineral Oil	144	10°F / -12°C	190°F / 88°C	280°F / 138°C
FML-1	L0144-	Anhydrous Calcium	1	USP White Mineral Oil	144	10°F / -12°C	200°F / 93°C	285°F / 141°C
FML-2	L0145-	Anhydrous Calcium	2	USP White Mineral Oil	144	10°F / -12°C	200°F / 93°C	285°F / 141°C
*FML Series greases are available in Cans, Cartridges, Pails, 1/4 Drums, Drums & Perma Lubricators. See pages 10 and 11 for more information and package part number suffix.								
PURE TAC	L0236-	Aluminum Complex	2	USP White Mineral Oil	1187	20°F / -7°C	400°F / 204°C	520°F / 271°C
PURE TAC LT.	L0235-	Aluminum Complex	1.5	USP White Mineral Oil	600	10°F / -12°C	388°F / 198°C	446°F / 230°C
*PURE TAC & PURE TAC LIGHT are available in Cartridges, Pails, 1/4 Drums & Drums. PURE TAC is available in Perma Lubricators. See pages 10 and 11 for more information and package part number suffix.								
CLEARPLEX-1	L0350-	Aluminum Complex	1	USP White Mineral Oil	100	0°F / -18°C	360°F / 182°C	465°F / 240°C
CLEARPLEX-2	L0351-	Aluminum Complex	2	USP White Mineral Oil	150	10°F / -12°C	400°F / 204°C	450°F / 232°C

\*CLEARPLEX Series Greases are available in Cartridges, Pails, 1/4 Drums, Drums & Perma Lubricators. See pages 10 and 11 for more information and package part number suffix.

## ■ Food Machinery Grade Spray Lubricants NSF H-1 Registered

**FGL-1 Spray:** Class H-1 lubricant in handy, easy to use 11 OZ. / 312 g. spray can. Quick and clean applications. Fortified with anti-wear, anti-rust, and anti-corrosion additives. **Contains LUBRI-ARMOUR Anti-Microbial Additive.** Part No. L0231-063.

**FMO-350-AW Spray:** A multi-purpose, Anti-wear fortified, food machinery oil, in easy to apply spray can. For use where a Class H-1 oil is required. Part No. L0882-063.

**Super FML-2 Spray:** A Class H-1 white lubricant in handy, easy to use spray can. For use in food processing operations where a Class H-1 lubricant is required. Part No. L0145-063.

**SFGO Ultra-7 Spray:** A multi-purpose, synthetic, chain and penetrating fluid spray lubricant, for use on bottling, dairy and food processing machinery. For chains, slides, tools and general lubrication. Part No. L0912-063.

**Food Grade Silicone Lubricant:** A multi-purpose, silicone lubricant for use on bottling, dairy and food processing machinery. For slides, chains, O-rings, rubber seals and general lubrication. Part No. L0723-063.

**FMO-85-AW Spray:** A multi-purpose Class H-1 oil. Packed in 14 OZ. / 414 ml non-aerosol pump spray bottle. Part No. L0880-067.



## ■ Refrigeration Compressor Fluid NSF H-1 Registered

**RCO-68FG:** NSF H-1 Food Grade, Polyalphaolefin (PAO)-Based, 100% Synthetic, Refrigeration Compressor Fluid.

Formulated for use in refrigeration compressor systems where a NSF H-1 Registered, food machinery grade lubricant is required. It is recommended for CFC (chlorofluorocarbon) and HCFC (hydrochlorofluorocarbon) refrigerants such as R-717, R-11, R-12, R-13, R-113, R-114, R-115, R-22, R-123, R-141b, R-500, R-501 and R-502 or where ammonia is used as the coolant. It is not recommended for use with HFC (hydrofluorocarbon) refrigerants such as HFC-134a. High performance formulation provides extended service life while minimizing the formation of harmful varnish and sludge deposits.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO VIS. GRADE	AGMA NO.	SAE GEAR OIL NO.	SAE NO.	VISCOSITY cSt @40°C / 100°C	VISCOSITY SUS @100°F / 210°F	VISCOSITY INDEX	FLASH POINT	FIRE POINT	POUR POINT
<b>RCO-68 FG</b>	L0818-	68	2	80	30	62 / 10	325 / 59	142	495°F / 257°C	545°F / 285°C	-60°F / -51°C

\*RCO-68 FG Fluid is available in Pails & Drums. See page 10 for more information and package part number suffix.

## ■ Flushing and Cleansing Fluid / Oil NSF H-1 Registered

**SynFlush FG:** 100% Synthetic, NSF H-1 Registered Food Machinery Grade, Cleaning and Flushing Fluid.

A unique, modern technology product designed to clean various pieces of equipment where a switch from an H-2 to an NSF H-1 Registered product is required. Costly downtime can be avoided as it cleans internally without unit tear down. It is compatible with Synthetic Polyalphaolefin, Polyolesters, Di-esters, Polyalkylene Glycols (PAGs) as well as mineral based fluids; therefore it may be used when switching from many types of fluids without leaving behind incompatible residue. NSF H-1 Registered.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO VIS. GRADE	AGMA NO.	SAE GEAR OIL NO.	SAE NO.	VIS. cSt @40°C / 100°C	VIS. SUS @100°F / 210°F	VIS. INDEX	FLASH POINT	FIRE POINT	POUR POINT
<b>SynFlush FG</b>	L0961-	-	-	-	-	5.3 / 2	-	221	495°F / 257°C	365°F / 185°C	-5°F / -21°C

\*SynFlush FG is available in Quart Bottles, Pails & Drums. See page 10 for more information and package part number suffix.

**Pure Flush:** Flushing and Cleansing Oil.

This lubricating, flushing and cleansing oil is to be used along with the existing lubricant to clean equipment without dismantling. It can be used to clean and flush bearings, gear cases, hydraulic systems, centralized lubricating systems, air lines, chains and air tools. It is fully compatible with petroleum based lubricants and most petroleum compatible synthetics.

LUBRIPLATE PRODUCT	*PRODUCT PART NO.	ISO VIS. GRADE	AGMA NO.	SAE GEAR OIL NO.	SAE NO.	VIS. cSt @40°C / 100°C	VIS. SUS @100°F / 210°F	VIS. INDEX	FLASH POINT	FIRE POINT	POUR POINT
<b>Pure Flush</b>	L0816-	-	-	-	-	7 / 2	50 / 32	-	210°F / 99°C	220°F / 104°C	-35°F / -37°C

\*Pure Flush is available in Bottles, Jugs, Pails, 1/4 Drums & Drums. See page 10 for more information and package part number suffix.



# Application & Interchange Recommendations

APPLICATIONS	LUBRIPLATE H-1 PRODUCT*	APPLICATIONS	LUBRIPLATE H-1 PRODUCT*
<ul style="list-style-type: none"> <li>GENERAL GREASING - NORMAL TEMPS</li> <li>HIGH TEMPERATURES</li> <li>LOW TEMPERATURES</li> <li>GENERAL OILING</li> <li>CENTRALIZED GREASING SYSTEMS</li> <li>SLIDES, CAMS, EXPOSED GEARS</li> <li>CHAINS, CONVEYORS, WIRE ROPE</li> <li>MEDIUM TEMPERATURES</li> <li>HIGH TEMPERATURES</li> <li>ENCLOSED GEAR CASES</li> <li>HELICAL GEARS</li> <li>WORM GEARS</li> <li>HOT BRAKE BEARINGS</li> <li>AIR COMPRESSORS RECIPROCATING</li> <li>AIR COMPRESSORS ROTARY SCREW</li> <li>REFRIGERATION COMPRESSORS</li> <li>AIR LINE SYSTEMS</li> <li>HYDRAULIC SYSTEMS - NORMAL TEMPS</li> <li>LOW TEMPERATURES</li> <li>HIGH SPEED BEARINGS</li> <li>GREASE</li> <li>OIL</li> <li>CHEMICAL &amp; CONDENSATE PUMPS</li> <li>GREASE</li> <li>OIL</li> <li>VACUUM PUMPS</li> </ul>	<p><b>SYNXTREME FG-2*</b> or <b>FGL-2*</b></p> <p><b>SYNXTREME FG-2*</b> or <b>FGL-2*</b></p> <p><b>SYNXTREME FG-1*</b> or <b>SFL-1*</b></p> <p><b>SFGO ULTRA-68*</b> or <b>FMO-350AW*</b></p> <p><b>FGL-0*</b> or <b>FGL-00*</b></p> <p><b>PURE TAC*</b></p> <p><b>SFGO ULTRA-7*</b> or <b>FP-150L*</b></p> <p><b>PGO-FGL-220*</b></p> <p><b>SFGO ULTRA-220*</b> or <b>FMO-1100AW*</b></p> <p><b>SFGO ULTRA-460*</b> or <b>FMO-2400AW*</b></p> <p><b>SYNXTREME FG-2*</b> or <b>PURE TAC*</b></p> <p><b>SFGO ULTRA-68*</b> or <b>SFGO ULTRA 100*</b></p> <p><b>SFGO ULTRA-32*</b> or <b>SFGO ULTRA 46*</b></p> <p><b>RCO-68*</b></p> <p><b>FMO-85AW*</b> or <b>FMO-150AW*</b></p> <p><b>SFGO ULTRA-68*</b> or <b>FMO-350AW*</b></p> <p><b>SFGO ULTRA-7*</b> or <b>FMO-85AW*</b></p> <p><b>SFL-1*</b> or <b>FGL-1*</b></p> <p><b>SFGO ULTRA-32*</b> or <b>FMO-150AW*</b></p> <p><b>SYNXTREME FG-2*</b> or <b>FGL-2*</b></p> <p><b>SFGO ULTRA-68*</b> or <b>FMO-350AW*</b></p> <p><b>SFGO ULTRA-68*</b> or <b>SFGO ULTRA 100*</b></p>	<ul style="list-style-type: none"> <li>DRAFT &amp; VENTILATING FANS</li> <li>GREASE</li> <li>OIL</li> <li>STIRRUPS - BOTTLE FILLERS</li> <li>PEACH PITTERS - CHAIN DRIVES</li> <li>SEAMING ROLLS, SPINDLES, CHUCKS</li> <li>COOKERS - CARRIER BEARINGS</li> <li>COOKER VALVE LUBRICATION (MANZEL LUBRICATORS)</li> <li>CAN SEAMING &amp; CLOSING MACHINES (AUTOMATIC LUBRICATORS)</li> <li>SIGHT FEED OILERS</li> <li>ELECTRIC MOTOR BEARINGS</li> <li>STEAM VALVES &amp; PEELERS</li> <li>SCRUBBERS</li> <li>GREASE FITTINGS</li> <li>CHAIN DRIVES</li> <li>FORKLIFTS</li> <li>WHEEL BEARINGS</li> <li>HYDRAULIC OIL</li> <li>CHAIN LIFTS</li> <li>RUST PREVENTATIVE, LAYING UP</li> <li>CLEANSING &amp; FLUSHING FLUID / OIL</li> <li>PAN DIVIDER OIL</li> <li>LUBRIPLATE WHITE OILS</li> </ul>	<p><b>SYNXTREME FG-2*</b> or <b>FGL-2*</b></p> <p><b>SFGO ULTRA-68*</b> or <b>FMO-350AW*</b></p> <p><b>STO-FG*</b></p> <p><b>FP-150L*</b> or <b>FP-150*</b></p> <p><b>SYNXTREME FG-1*</b> or <b>FGL-1*</b></p> <p><b>SYNXTREME FG-2*</b> or <b>PURE TAC*</b></p> <p><b>FOOD GRADE COOKER OIL*</b></p> <p><b>SSO-FG-100*</b>, <b>SSO-FG-150*</b> or <b>SFGO ULTRA-100*</b></p> <p><b>SEAMER OIL FG-100*</b> or <b>SEAMER OIL FG-150*</b></p> <p><b>PM-500*</b> or <b>FP-150L*</b></p> <p><b>SYNXTREME FG-1*</b> or <b>FGL-1*</b></p> <p>Consult LUBRIPLATE Tech Service 1-800-347-5343</p> <p><b>SYNXTREME FG-2*</b> or <b>FGL-2*</b></p> <p><b>FP-150L*</b> or <b>FP-150*</b></p> <p><b>SYNXTREME FG-2*</b> or <b>PURE TAC*</b></p> <p><b>SFGO ULTRA-68*</b> or <b>FMO-350AW*</b></p> <p><b>FP-150L*</b></p> <p><b>SFGO ULTRA-7*</b> or <b>FMO-350AW*</b></p> <p><b>SYNFLUSH FG*</b> or <b>PURE FLUSH*</b></p> <p><b>PAN DIVIDER OIL*</b></p> <p><b>FMO SERIES*</b></p>

**Synthetic Based Product**

**USP Mineral Oil Based Product**

\*NSF H-1 Registered (Food Machinery Grade)

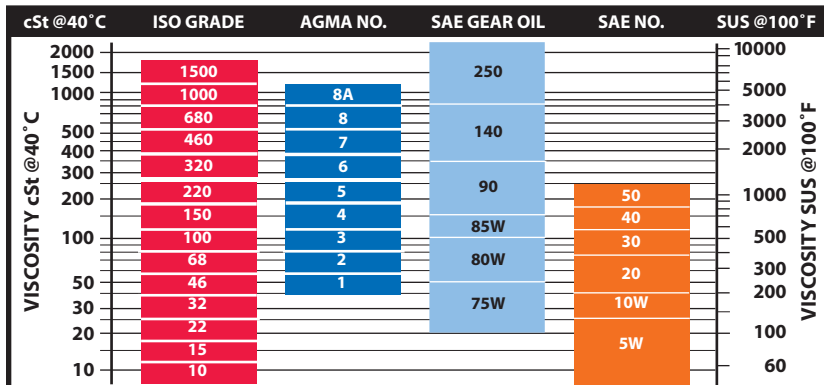
## Lubriplate H-1 Class Synthetic Fluid Interchange Recommendations

EXXON / MOBIL	ISO GRADE	LUBRIPLATE H-1	EXXON / MOBIL	ISO GRADE	LUBRIPLATE H-1
SHC 524	32	SFGO ULTRA 32*	SHC CIBUS 32	32	SFGO ULTRA 32*
SHC 525	46	SFGO ULTRA 46*	SHC CIBUS 46	46	SFGO ULTRA 46*
SHC 526	68	SFGO ULTRA 68*	SHC CIBUS 68	68	SFGO ULTRA 68*
SHC 624	32	SFGO ULTRA 32*	SHC CIBUS 150	150	SFGO ULTRA 150*
SHC 626	68	SFGO ULTRA 68*	SHC CIBUS 220	220	SFGO ULTRA 220*
SHC 627	100	SFGO ULTRA 100*	SHC CIBUS 320	320	SFGO ULTRA 320*
SHC 629	150	SFGO ULTRA 150*	SHC CIBUS 460	460	SFGO ULTRA 460*
SHC 630	220	SFGO ULTRA 220*	MOBILGEAR SHC 150	150	SFGO ULTRA 150*
SHC 632	320	SFGO ULTRA 320*	MOBILGEAR SHC 220	220	SFGO ULTRA 220*
SHC 634	460	SFGO ULTRA 460*	MOBILGEAR SHC 320	320	SFGO ULTRA 320*
SHC 636	680	SFGO ULTRA 680*	MOBILGEAR SHC 460	460	SFGO ULTRA 460*
SHC 639	1000	SFGO ULTRA 1000*	MOBILGEAR SHC 680	680	SFGO ULTRA 680*

KLUBER	ISO GRADE	LUBRIPLATE H-1	KLUBER	ISO GRADE	LUBRIPLATE H-1	KLUBER	ISO GRADE	LUBRIPLATE H-1
KLUBEROIL 4UH1-100	100	SFGO ULTRA 100*	KLUBERSYNTH UH-1 6-150	150	PGO FGL-150*	KLUBERSYNTH GH 6-150	150	PGO-FGL-150*
KLUBEROIL 4UH1-150	150	SFGO ULTRA 150*	KLUBERSYNTH UH-1 6-220	220	PGO FGL-220*	KLUBERSYNTH GH 6-220	220	PGO-FGL-220*
KLUBEROIL 4UH1-220	220	SFGO ULTRA 220*	KLUBERSYNTH UH-1 6-320	320	PGO FGL-320*	KLUBERSYNTH GH 6-320	320	PGO-FGL-320*
KLUBEROIL 4UH1-320	320	SFGO ULTRA 320*	KLUBERSYNTH UH-1 6-460	460	PGO FGL-460*	KLUBERSYNTH GH 6-460	460	PGO-FGL-460*
KLUBEROIL 4UH1-460	460	SFGO ULTRA 460*	KLUBERSYNTH UH-1 6-680	680	PGO FGL-680*	KLUBERSYNTH GH 6-680	680	PGO-FGL-680*
KLUBEROIL 4UH1-680	680	SFGO ULTRA 680*						

Before changing to Lubriplate PGO and PGO-FGL fluids, the sump must be drained.

## Oil Viscosity Classification Comparisons



## NLGI Grease Classifications

NLGI NUMBER	DESCRIPTION	WORKED PENETRATION
000	SEMI-FLUID	445 - 475
00	SEMI-FLUID	400 - 430
0	VERY-SOFT	355 - 385
1	SOFT	310 - 340
2	MEDIUM SOFT	265 - 295
3	MEDIUM	220 - 250
4	HARD	175 - 205
5-6	VERY HARD	85 - 160

## ■ Packaging Containers

The chart below indicates Lubriplate's packaging availability and the corresponding Package Part Number Suffix.

**How To Generate Part Numbers** - Add the desired Package Part Number Suffix, shown here, to the end of the Product Part Number. Product Part Numbers for each product can be found on the product specification charts found on the previous pages.

**Not all products are available in every package size.**

See package availability for each product at the bottom of the product specification charts.

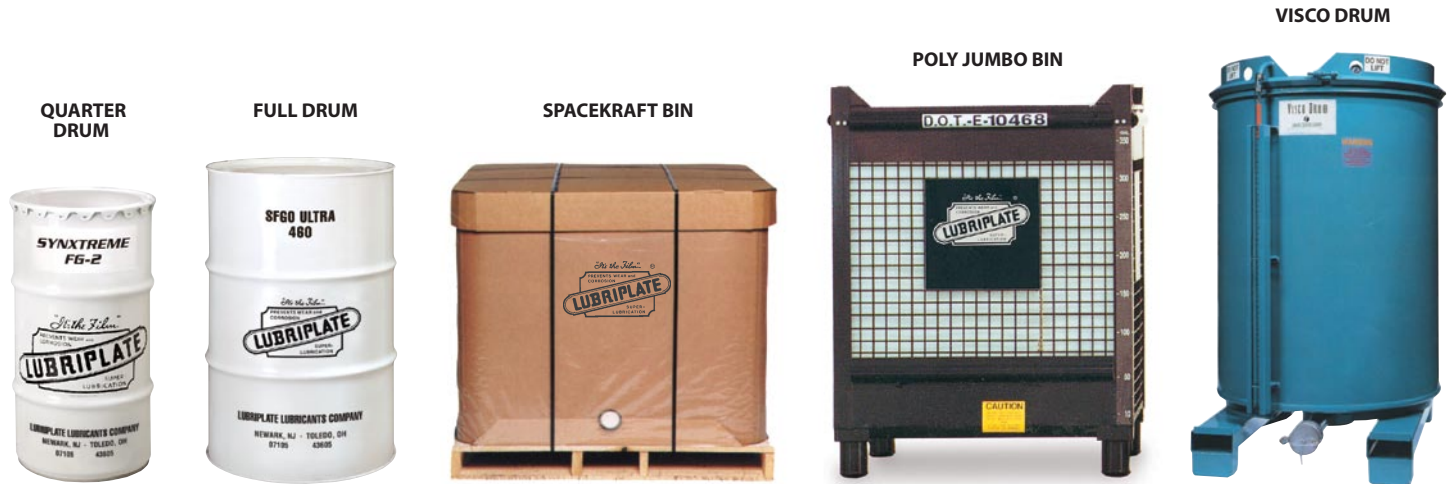
**Large Bulk Container Bins** - Contact your Lubriplate representative or call 800-733-4755 for information and product availability.



PRODUCT / PACKAGE AVG. NET WT. / CONTENTS PACKAGE PART NO. SUFFIX	TUBES 10 OZ / 284 g	SPRAY CANS NET WT. VARIES BY PRODUCT	CARTRIDGES 14.5 OZ / 411 g	SM. CANS 14 OZ / 397 g	CANS / 6 CTN 6 LB / 2.72 kg	BOTTLES 1 QUART / 946 ml 2 LB / .907 kg	JUGS 1 GAL / 3.79 L 7 LB / 3.18 kg	PAIL 35 LB / 15.9 kg 5 GAL / 18.9 L
H-1 FOOD GRADE FLUIDS & OILS	-	-063	-	-	-	-054	-057	-060
*H-1 FOOD GRADE GREASES	-092	-063	-098	-001	-006	-	-	-035

Package Specifications								
Case Quantity	36	12	40	24	6	12	4	-
Aprox. Dimensions / Inches	13 x 12.5 x 11.5	11 x 8.5 x 8	19.5 x 11.5 x 10.5	14 x 10.5 x 8	20 x 13.5 x 7.5	13 x 9.5 x 9	14.5 x 10 x 10.5	12 x 15
Avg. Gross Shipping Weight	-	12 lbs / 5.4 kg	-	-	-	26 lbs / 11.8 kg	26 lbs / 11.8 kg	40 lbs / 18.1 kg
*Avg. Gross Shipping Weight	29 lbs / 13.2 kg	12 lbs / 5.4 kg	44 lbs / 20 kg	29 lbs / 13.2 kg	43 lbs / 19.5 kg	27 lbs / 12.3 kg	34 lbs / 15.4 kg	38 lbs / 17.2 kg

\*Items Sold By Weight. Other Items Sold by Volume.



PRODUCT / PACKAGE AVG. NET WT. / CONTENTS PACKAGE PART NO. SUFFIX	QTR DRUM 120 LB / 54 kg 16 GAL / 60.5 L	FULL DRUMS 420 LB / 191 kg 55 GAL / 208 L	SPACEKRAFT BIN 2450 LB / 1111 kg 330 GAL / 1249 L	POLY JUMBO BIN 1810 LB / 821 kg 250 GAL / 946 L	POLY JUMBO BIN 2520 LB / 1143 kg 350 GAL / 1325 L	POLY JUMBO 3980 LB / 1805 kg 550 GAL / 2082 L	VISCO DRUM 2800 LB / 1270 kg 379 GAL / 1435 L	VISCO DRUM 3800 LB / 1724 kg 500 GAL / 1893 L
H-1 FOOD GRADE FLUIDS & OILS	-061	-062	-070	-059	-059	-059	-	-
*H-1 FOOD GRADE GREASES	-039	-040	-042	-041	-041	-041	-041	-041

Package Specifications								
Aprox. Dimensions / Inches	15 x 27	23.5 x 35	48 x 48 x 51	42 x 48 x 50	42 x 48 x 63.5	42 x 48 x 86	45.5 x 53.5 x 76.5	45.5 x 53.5 x 88
Avg. Gross Shipping Weight	134 lbs / 60.8 kg	445 lbs / 202 kg	2600 lbs / 1179 kg	2400 lbs / 1089 kg	3200 lbs / 1452 kg	4800 lbs / 2177 kg	3800 lbs / 1724 kg	4900 lbs / 2223 kg
*Avg. Gross Shipping Weight	134 lbs / 60.8 kg	465 lbs / 211 kg	2600 lbs / 1179 kg	2400 lbs / 1089 kg	3200 lbs / 1452 kg	4800 lbs / 2177 kg	3800 lbs / 1724 kg	4900 lbs / 2223 kg

## ■ Perma Automatic Lubricators

### Select Lubriplate H-1 Food Grade Lubricants are now available pre-filled in Perma Automatic Lubricators...

Perma automatic lubricators provide clean, safe, reliable and consistent machinery lubrication around the clock. They are fully programmable and deliver the right amount of lubricant consistently, day after day, week after week. A wide range of types and sizes are available to meet your exact needs. All come pre-filled, ready to install. They save time and labor costs.

**Only select products are available in Perma Lubricators. Check the bottom of chart for lubricant availability.**

**Part Numbers -** Add the desired Perma Package Part Number Suffix listed on the chart to the end of the desired Lubriplate Product Part Number.



PERMA MODEL	VOLUME SIZE	OUTPUT RATE	PRESSURE BUILD-UP	FEATURES / DETAILS	PERMA PACKAGE PART NO. SUFFIX
CLASSIC	120 cc	1 Month (Activator Screw)	65 PSI	Metal Housing	-101
CLASSIC	120 cc	3 Month (Activator Screw)	65 PSI	Metal Housing	-103
CLASSIC	120 cc	6 Month (Activator Screw)	65 PSI	Metal Housing	-106
CLASSIC	120 cc	12 Month (Activator Screw)	65 PSI	Metal Housing	-112
FUTURA	120 cc	1 Month (Activator Screw)	65 PSI	Transparent Plastic Housing	-201
FUTURA	120 cc	3 Month (Activator Screw)	65 PSI	Transparent Plastic Housing	-203
FUTURA	120 cc	6 Month (Activator Screw)	65 PSI	Transparent Plastic Housing	-206
FUTURA	120 cc	12 Month (Activator Screw)	65 PSI	Transparent Plastic Housing	-212
FLEX	30 cc	1 to 12 Mo. Programmable (Dial Select)	73 PSI	Transparent Plastic Housing - Control Dial on Top	-229
FLEX	60 cc	1 to 12 Mo. Programmable (Dial Select)	73 PSI	Transparent Plastic Housing - Control Dial on Top	-230
FLEX	125 cc	1 to 12 Mo. Programmable (Dial Select)	73 PSI	Transparent Plastic Housing - Control Dial on Top	-231
NOVA	130 cc	Programmable Electronic (Push Button)	90 PSI	LCD Display, Integrated Temperature Compensation	-130
NOVA LC REFILL KIT	130 cc	-	-	Refill Kit - Includes Pre-Filled NOVA LC Unit	-131
STAR VARIO G2	60 cc	1, 3, 6, 12 Mo. Programmable	75 PSI	LCD Display, Push Button Settings, Battery Operated	-460
STAR VARIO G2	120 cc	1, 3, 6, 12 Mo. Programmable	75 PSI	LCD Display, Push Button Settings, Battery Operated	-412
STAR VARIO G2	250 cc	1, 3, 6, 12 Mo. Programmable	75 PSI	LCD Display, Push Button Settings, Battery Operated	-425
STAR CONTROL	60 cc	Based on 100 Machine Hours	75 PSI	PLC Controlled / 12-30 Volts DC	-560
STAR CONTROL	120 cc	Based on 100 Machine Hours	75 PSI	PLC Controlled / 12-30 Volts DC	-512
STAR CONTROL	250 cc	Based on 100 Machine Hours	75 PSI	PLC Controlled / 12-30 Volts DC	-525
STAR LC REFILL KIT	60 cc	-	-	Refill Kit - Includes Pre-Filled LC Unit - Battery Pack	-660
STAR LC REFILL KIT	120 cc	-	-	Refill Kit - Includes Pre-Filled LC Unit - Battery Pack	-612
STAR LC REFILL KIT	250 cc	-	-	Refill Kit - Includes Pre-Filled LC Unit - Battery Pack	-625
PRO	250 cc	1 Day to 24 Mo. Programmable	360 PSI	Battery Operated	-725
PRO	500 cc	1 Day to 24 Mo. Programmable	360 PSI	Battery Operated	-750
PRO MP-6	250 cc	1 Day to 24 Mo. Programmable	360 PSI	Battery Operated, 1-6 Lubrication Points	-726
PRO MP-6	500 cc	1 Day to 24 Mo. Programmable	360 PSI	Battery Operated, 1-6 Lubrication Points	-756
PRO C	250 cc	Based on 100 Machine Hours	360 PSI	PLC Controlled / 12-30 Volts DC	-825
PRO C	500 cc	Based on 100 Machine Hours	360 PSI	PLC Controlled / 12-30 Volts DC	-850
PRO C MP-6	250 cc	Based on 100 Machine Hours	360 PSI	PLC Controlled / 12-30 Volts DC, 1-6 Lubrication Points	-826
PRO C MP-6	500 cc	Based on 100 Machine Hours	360 PSI	PLC Controlled / 12-30 Volts DC, 1-6 Lubrication Points	-856
PRO LV REFILL KIT	250 cc	-	-	Refill Kit - Includes Pre-Filled LV Unit - Battery Pack	-925
PRO LV REFILL KIT	500 cc	-	-	Refill Kit - Includes Pre-Filled LV Unit - Battery Pack	-950

#### LUBRIPLATE H-1 PRODUCTS AVAILABLE IN PERMA LUBRICATORS

FOOD GRADE GREASES NSF H-1	CLEARPLEX-2 Pt.No.L0351-, FGL-0 Pt.No.L0230-, FGL-1 Pt.No.L0231-, FGL-2 Pt.No.L0232-, FML-1 Pt.No.L0144-, FML-2 Pt.No.L0145-, PURE TAC Pt.No.L0236-
SYNTHETIC FG GREASES NSF H-1	SFL-00 Pt.No.L0195-, SFL-0 Pt.No.L0196-, SFL-1 Pt.No.L0197-, SYNXTREME FG-0 Pt.No.L0307-, SYNXTREME FG-1 Pt.No.L0306-, SYNXTREME FG-2 Pt.No.L0305-
FOOD GRADE OILS** NSF H-1	FMO-85-AW Pt.No.L0880-, FMO-200-AW Pt.No.L0881-, FMO-350-AW Pt.No.L0882-
SYNTHETIC FG FLUIDS** NSF H-1	SFGO ULTRA 32 Pt.No.L0915-, SFGO ULTRA 220 Pt.No.L0985-, SYN-H1-220 Pt.No.L0779-

\*\*Lubriplate Oils and Fluids are not available in Perma PRO Series Lubricators.



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