55105 Lube Point Monitor

Oval Gear Mechanism

General

The 55105 Lube Point Monitor is an accurate oval gear mechanism that incorporates two magnets into one of the nylon oval gears. The body incorporates a reed switch which senses the magnet passing. Lubricant entering the 55105 causes the gears to rotate. Each pulse equates to an approximate displacement of 0.040 cu. in. (.65cc). The monitoring of the 55105 can be achieved via any PLC. The feedback from the 55105 will assure that lubricant has reached the inlet of critical lubrication points.

Lube Point Monitor (Part #55105)

Application

The 55105 Lube Point Monitor is designed for mounting at or near the lubrication point inlet. It can be used with any type of grease or oil system (Dual Line / Progressive / PDI). Due to the nature of the internals, correct filtration is required to keep contaminants out of the monitor body. (i.e. inline grease strainer).

Lube Point Monitor shown with bearing. (Bearing not included)

Technical Data

Flow		0-2500cc/min.
Maximum Pressure		10153 psi (700 bar)
Accuracy		±3% (determined at +20°)
Vibrations		20 *g* (10-20000 Hz)
Life Time		10^9 pulses
Temperature		-4°F to 158°F (-20°C to 70°C)
Connections		1/8NPT or 1/8BSPP
Material		Aluminum or Stainless
Weight		0.186 kg
Lubrications		ISO VG 32 Oil to NLGI Grade 2 Grease
IP Enclosure Rating		IP-67
Connection		4-pole M12 x 1 (male)
Switch Rating	Maximum Voltage	0-24 VDC
	Maximum Current	0.20 amp*

*** CAUTION!**
Destruction or damage of reed contact!
Take notice of the max. contact loads!

The max. contact loads (switching voltage, switching current and switching capacity) refer to pure ohmic loads and may not be exceeded under any circumstances.

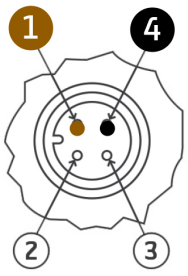
High voltage and current peaks can occur, particularly when switching inductive or capacitive loads (e.g. relay coil, capacitors). Even if the overload is brief, this can destroy (welding the contacts) or damage (reduced lifespan) the reed contact.
- Only use protection methods which are appropriate and checked.

Protection method when electrical connection of reed contacts:

The following protective circuits are basically possible: current limiting resistors, RC circuits, Freewheeling diodes, suspression diodes, varistors or a combination of these.

Wiring

PIN#	Description	Wire Colour
1	Common	Brown
4	Signal	Black



How to Order

Name		Material	Part #
Lube Point Monitor	1/8-NPT	Anodized Aluminum	55105
	1/8-BSPP	Anodized Aluminum	55105-B
	1/8-NPT	Stainless Steel 316	55105-SS

When ordering, specify by name and part number, e.g. Lube Point Monitor, Part #55105.

Accessories

Description		Part #
Rebuild Kit		55381
Cable	Straight, 10 meters long	76928-2863
	90°, 10 meters long	76928-2833
Note: Cables supplied separately.		

Note:

Rebuild kit 55381 includes the following:

- *+ 2pcs Gear Wheels*
- *+ 2pcs Magnets*
- *+ 1pc O-ring*
- *+ 4pcs Cover Screws*

Dimensional Schematics