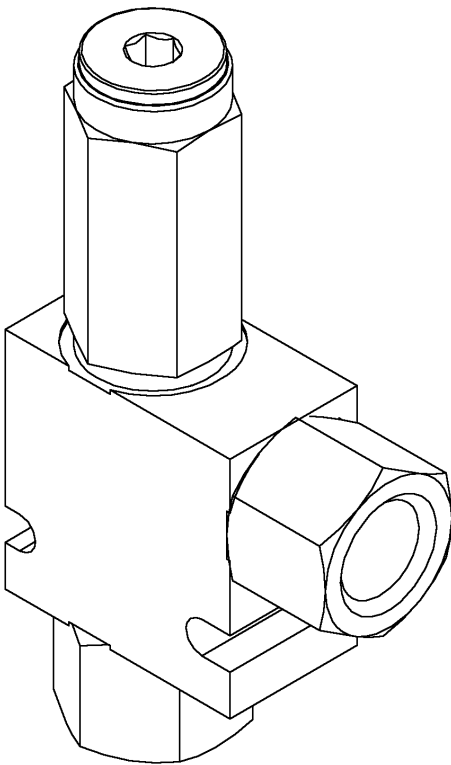


Pressure relief valves

Models 275197, 282876, 282902 and 282957



Date of issue	October 2012
Form number	404470
Section	K5
Page	21B

Description

Direct acting poppet relief valve. These valves will open when the cracking pressure is reached and allow oil to flow through it until the pressure drops to about 80% of the cracking pressure. It is intended to prevent damage to oil dispensing systems caused by over pressurization caused by misadjustment of regulators, pressure control valves, thermal expansion, or other means.

The inlet, or pressure port of the valve is connected into the piping or hoses connected to the pump outlet. The valve outlet, or return to tank port is connected to the oil system reservoir or oil tank. If the pressure rises above the preset cracking pressure of the valve, the valve will open and oil will flow from the pressurized oil dispensing system to the reservoir until the pressure is dissipated to about 80% of the cracking pressure.

The pressure (inlet) and return to tank (outlet) ports of the valve manifold are machined with SAE-8 female o-ring ports (3/4-16 UNF thread). Adapters are included to convert one or both ports to 1/2 NPT female threads.

Installation

The relief valve must be properly selected based on the operating pressure of the oil system. The pressure rating should be slightly higher than the highest expected operating pressure of the oil system. Select a relief valve to protect the system component with the lowest pressure rating. If too low a relief pressure is selected, the relief valve may open pre-maturely causing poor system performance. Too high a relief pressure could cause system damage.

The relief valve may be installed anywhere in the pressurized side of the oil system, (piping, hoses, and fittings connected to the pump outlet). It is usually more convenient to place the relief valve close to the pump so that the return to tank port can be easily connected to the oil system reservoir. In order to protect the system properly, there must not be any check valves between the relief valve and the system being protected, other than the pump's outlet check.

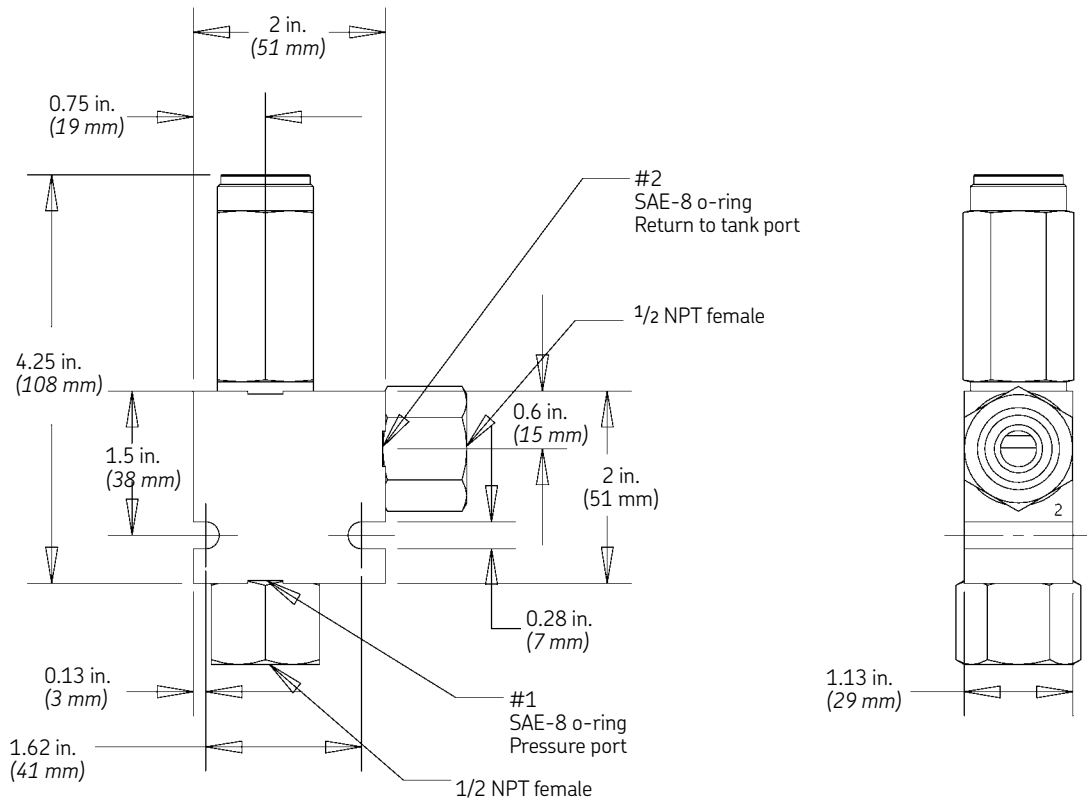
In a typical installation the relief valve can be connected to a tee placed between the pump outlet and the piping system or hoses, with valve pressure port (inlet) connected to the tee. The return to tank port is routed back to the oil tank or reservoir.

Specifications

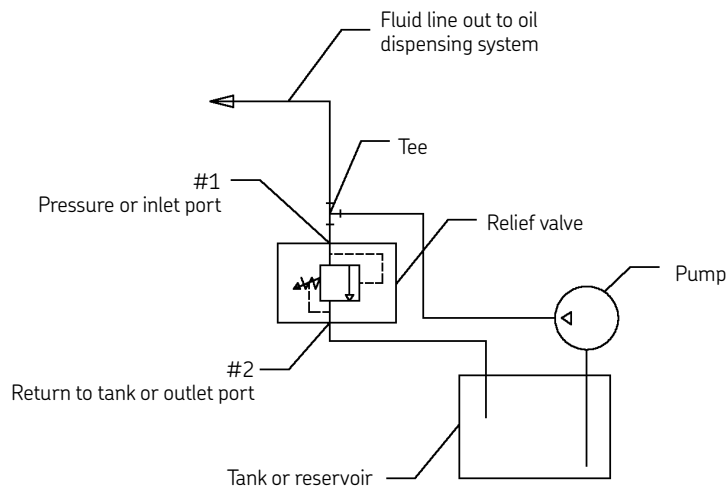
Maximum operating pressure	3600 psi (248 bar)
Temperature	-40 to 248 °F (-40 to 120 °C)
Fluids	Mineral based or synthetic oils at viscosities of 7.4 to 420 cSt (50 to 2000 ssu)
Reseat pressure	80% (approx.) of cracking pressure.
Inlet & Outlet	SAE-8 o-ring ports with 1/2 NPT female adapters (supplied).

Cracking pressure

Model	Cracking pressure
282902	150 PSI (10 bar)
275197	500 PSI (34 bar)
282876	1000 PSI (69 bar)
282957	1500 PSI (103 bar)



Valve connection schematic



Note: Lincoln does not have service parts available for these valves.

This page left intentionally blank

Lincoln industrial standard warranty

Standard limited warranty

Lincoln warrants the equipment manufactured and supplied by Lincoln to be free from defects in material and workmanship for a period of one (1) year following the date of purchase, excluding there from any special, extended, or limited warranty published by Lincoln. If equipment is determined to be defective during this warranty period, it will be repaired or replaced, within Lincoln's sole discretion, without charge.

This warranty is conditioned upon the determination of a Lincoln authorized representative that the equipment is defective. To obtain repair or replacement, you must ship the equipment, transportation charges prepaid, with proof of purchase to a Lincoln Authorized Warranty and Service Center within the warranty period.

This warranty is extended to the original retail purchaser only. This warranty does not apply to equipment damaged from accident, overload, abuse, misuse, negligence, faulty installation or abrasive or corrosive material, equipment that has been altered, or equipment repaired by anyone not authorized by Lincoln. This warranty applies only to equipment installed, operated and maintained in strict accordance with the written specifications and recommendations provided by Lincoln or its authorized field personnel.

This warranty is exclusive and is in lieu of any other warranties, express or implied, including, but not limited to, the warranty of merchantability or warranty of fitness for a particular purpose. Warranty on items sold by Lincoln, but not manufactured by Lincoln are subject to the warranty consideration, if any, of their manufacturer (such as hoses, hydraulic and electric motors, electrical controllers, etc.) Assistance in making such warranty claims can be offered as required.

In no event shall Lincoln be liable for incidental or consequential damages. Lincoln's liability for any claim for loss or damages arising out of the sale, resale or use of any Lincoln equipment shall in no event exceed the purchase price. Some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, therefore the above limitation or exclusion may not apply to you.

This warranty gives you specific legal rights. You may also have other rights that vary by jurisdiction.

Customers not located in the Western Hemisphere or East Asia: Please contact Lincoln GmbH and Co. Kg, Walldorf, Germany, for your warranty rights.

Special limited warranties

Special limited 2 year warranty SL-V series, single injectors–85772, 85782, and replacement injectors–85771, 85781

Lincoln warrants the SL-V Injector series to be free from defects in material and workmanship for two (2) years following the date of purchase. If an injector model (single or replacement) is determined to be defective by Lincoln, in its sole discretion, during this warranty period, it will be repaired or replaced, at Lincoln's discretion, without charge.

Special limited 5 year warranty series 20, 25, 40 bare pumps, pmv bare pumps, heavy duty and 94000 series bare reels

Lincoln warrants series 20, 25, 40 bare pumps, PMV bare pumps, heavy duty (82206), mini bench (81133, 81323), and all 94000 LFR series (single arm and dual arm) bare reels to be free from defects in material and workmanship for five (5) years following the date of purchase. If equipment is determined by Lincoln, in its sole discretion, to be defective during the first year of the warranty period, it will be repaired or replaced at Lincoln's discretion, without charge. In years two (2) and three (3), the warranty on this equipment is limited to repair with Lincoln paying parts and labor only. In years four (4) and five (5), the warranty on this equipment is limited to repair with Lincoln paying for parts only.

Special limited 5 year warranty– limited oil meters, limited fluid control valves, aod (air-operated diaphragm pumps)

Lincoln warrants the 712 series control valves, 912 series lube meters, electronic lube meters (980, 981, 982 series), our universal inline digital meters (812/813 series), and our AOD pump offering to be free from defects in material and workmanship for five (5) years following the date of purchase. If either is determined to be defective by Lincoln, in its sole discretion, during the warranty period, they will be repaired or replaced, at Lincoln's discretion, without charge.

Special DEF (diesel exhaust fluid) limited warranty

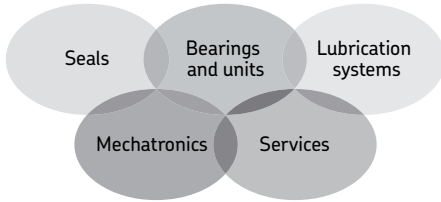
DEF products are warranted to be free from defects in material and workmanship for a period of one (1) year following the date of purchase. The following exceptions to the standard warranty period are in effect:

- **85700-30/85700-50 DEF hose reels (bare reel only),** 277251/277252 AC DEF pumps, and 277256 and 277257 DEF meters are warranted for two (2) years from date of purchase.
- **85623 DEF AOD (air operated diaphragm) pumps** are covered under the standard five (5) year AOD pump warranty.

If either is determined to be defective by Lincoln, in its sole discretion, during the warranty period, they will be repaired or replaced, at Lincoln's discretion, without charge.

Lincoln Industrial contact information

To find Lincoln Industrial's nearest service center call one of the following number; customer service 01-314-679-4200 or you may also use our website www.lincolnindustrial.com



The Power of Knowledge Engineering

Drawing on five areas of competence and application-specific expertise amassed over more than 100 years, SKF brings innovative solutions to OEMs and production facilities in every major industry worldwide. These five competence areas include bearings and units, seals, lubrication systems, mechatronics (combining mechanics and electronics into intelligent systems), and a wide range of services, from 3-D computer modelling to advanced condition monitoring and reliability and asset management systems. A global presence provides SKF customers uniform quality standards and worldwide product availability.

© SKF is a registered trademark of the SKF Group.

© Lincoln is a registered trademark of Lincoln Industrial Corp.

© SKF Group 2012

The contents of this publication are the copyright of the publisher and may not be reproduced (even extracts) unless prior written permission is granted. Every care has been taken to ensure the accuracy of the information contained in this publication but no liability can be accepted for any loss or damage whether direct, indirect or consequential arising out of the use of the information contained herein.

SKF PUB LS/11 13282 EN · October 2012 · Form 404470

Printed in USA.

