

BLADDER DETAILS

Bladder Compounds and Operating Temperatures

| Rubber Compound | Operating Temp Range | General Fluid Compatibility |
|------------------------------|--------------------------------------|--|
| Standard Nitrile (NBR) | -20°F thru 220°F -29°C thru 104°C | Compatible with most standard petroleum based hydraulic oils. |
| Cold Weather Nitrile | -50°F thru 200°F -45°C thru 93°C | Compatible with most standard petroleum based hydraulic oils. |
| Extreme Cold Weather Nitrile | -65°F thru 200°F -54°C thru 93°C | Compatible with most standard petroleum based hydraulic oils. |
| Ethylene Propylene (EPR) | -55°F thru 330°F -48°C thru 166°C | Compatible with most phosphate esters |
| Butyl (IIR) | -45°F thru 200°F -42°C thru 93°C | Compatible with most phosphate esters |
| Fluoroelastomer (FKM) | 0°F thru 350°F -17°C thru 176°C | Compatible with most petroleum based fluids at high temperatures and some special fluids |
| Epichlorohydrin (ECO) | -40°F thru 275°F -40°C thru 135°C | Compatible with most standard petroleum based hydraulic oils. |

** Information is for reference purpose only. Consult factory for fluid compatibility or refer to fluid manufacturers recommendations.*

Bladder Design Criteria

Chemical Compatibility:
ASTM D-471
ISO-1817

Gas Permeability:
ASTM 1434-82 (2003) PROCEDURE V
ISO-2782-1995

Operating Temperature Range:
ASTM D-1053-92a(07)
ISO-812

Mechanical/Physical Properties:
ASTM D-412, D-624
ISO-37, ISO34-2, ISO-4649.

- Tested and qualified for severe applications
- Superior permeation resistance of Nitrogen gas
- Optimized compound mix for improved physical properties
- Excellent resistance to high and low temperatures
- Available in several compounds to suit variety of fluids and operating temperatures
- Excellent shelf life
- Special compounds and sizes available to suite various applications

