Elastomers

Buna
Color: Black

Temperature Min: -40°F
Temperature Max: 250°F

Buna (aka NBR, Nitrile) is the *standard* in hydraulic and pneumatic sealing elastomers. Its oil resistant nature makes it the top choice of materials being used with petroleum based hydraulic fluids. Nitrile has a good abrasion resistance, high tensile strength and resistance to compression set.

Viton®
Color: Brown & Black

Temperature Min: -15°F
Temperature Max: 400°F

Viton (aka Fluorocarbon) seals are widely used in applications dealing with extreme temperature and/or extreme chemicals. Its compatibility to nearly all chemicals (exception - Skydrol, certain esters and ethers) make it a popular elastomer in chemical processing, paper and pulp mills, and various other chemical applications.

Silicone
Color: Red

Temperature Min: -65°F
Temperature Max: 450°F

Silicone compounds are generally not recommended for dynamic sealing applications due to poor tensile strength and abrasion resistance. Silicone does exhibit excellent resistance to extreme temperature and is an acceptable FDA material. Typical use for silicone is in dry heat applications and food processing applications.

EPR
Color: Black

Temperature Min: -65°F
Temperature Max: 300°F

EPR (aka EPDM, Ethylene Propylene) is used in applications that deal with ester based fluids, acids, weak alkalies, and automotive brake fluid. EPR is also an acceptable FDA material.

Neoprene
Color: Black

Temperature Min: -65°F
Temperature Max: 300°F

Neoprene is resistant to ammonia, freon, oxygen, ozone and many other fluids. An excellent material for use in pump and refrigeration applications.

Teflon®
Color: White

Temperature Min: -200°F
Temperature Max: 500°F

Teflon (aka PTFE, TFE) can be used in applications with extreme temperatures, extreme pressures and extreme chemicals. Since Teflon has a tendency to cold flow and has no memory, it is often filled with other materials (glass, bronze, and nickel) before it is used to make piston seals, rod seals and wipers.

Polyurethane
Color: Varies

Temperature Min: -50°F
Temperature Max: 200°F

Polyurethane (aka Hythane, Garthane) makes an excellent choice for hydraulic systems due to its good temperature range and high abrasion resistance. Urethanes are highly resistant to petroleum oils, hydrocarbon fuels, oxygen, ozone and weathering.

Polymyte
Color: Orange

Temperature Min: -65°F
Temperature Max: 275°F

Polymyte is an elastoplastic material with exceptionally high tear strength. Its high durometer makes it suitable for applications where extrusion is a problem. Polymyte can be used with petroleum based fluids, water based fluids, phosphate ester fluids, some chlorinated fluids and many solvents.