

Reduce Friction and Improve Performance for Elastomers with ModyGlide™

Elastomers such as NBR, HNBR, EPDM and silicones are key materials for numerous industries and applications. Elastomeric components are compressible, providing sealing and extending wear life for simple and very complex assemblies. In their service life, elastomeric seals and gaskets are used in static and dynamic conditions, often exposed to harsh temperatures, pressures, and chemicals.

Many elastomeric materials have high friction coefficients. Parts can easily get contaminated with dust, debris or particulates. In dynamic applications, increased frictions cause excessive heat and eventually reduce the useful life of articles, due to increased wear. Increased friction also slows down assembly operations resulting in production line downtime, lost productivity, material replacement and labor costs.

ModyGlide™ improves the surface properties of elastomers to reduce friction and increase durability. ModyGlide™ is a permanent modification to the surfaces of elastomeric articles, leading to a significant decrease in the coefficient of friction.

ModyGlide™ eliminates the need to source expensive, exotic materials.

ModyGlide™ eliminates the need to source expensive, exotic materials as well as the need for internal or external lubricants that can contaminate formulations. ModyGlide™ treated elastomeric parts can be subjected to repeated cleaning and sterilization cycles, retaining their low friction surface, due to the permanency of the treatment. It also improves chemical resistance, reduces swelling and fouling, prevents external contamination from dirt and prolongs service life.

Advantages of ModyGlide™

- Reduces friction coefficients leading to improved wear resistance
- Durable, resists swelling, fouling, and degradation
- Maintains cleaner elastomeric surfaces for hygiene and less contamination
- Uniform treatment on all exposed surfaces
- Permanent treatment that will not flake off, delaminate, or leach
- Eliminating lubricants that can lead to contamination
- Increased chemical resistance
- Cheaper alternative to highly engineered materials
- Does not affect bulk material properties

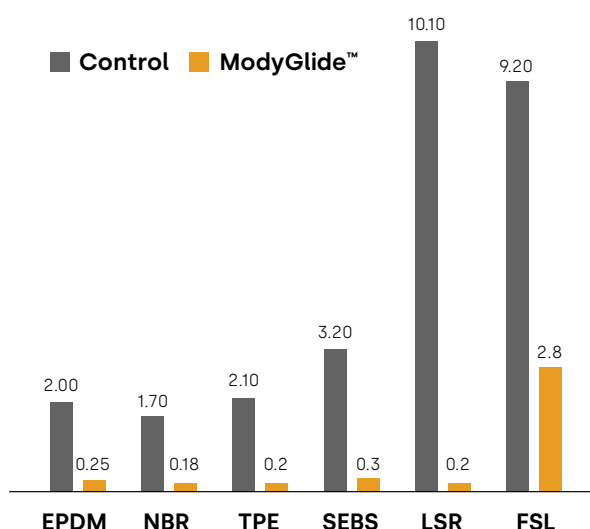


ModyGlide™

Applications

All elastomeric materials regardless of shape or size can be treated with ModyGlide™. It can treat o-rings, gaskets, seals and other elastomeric molded goods are used across many industries for various applications including:

- Transportation – Automotive, aerospace and locomotives
- Consumer goods – Health & beauty, lawn & garden
- Industrial – Electronics manufacturing, construction, oil & gas
- Healthcare – Medical equipment, prefilled syringes, pharmaceutical packaging



Coefficient of friction for various elastomers before and after ModyGlide™. Testing conducted per ASTM D1894-14.

Types of elastomers that can be modified:

- EPDM
- NBR/HNBR
- Butyl rubber
- Nitrile rubber
- TPE/TPV/TPU
- SEBS/SBS/SBR
- Liquid silicon rubber (LSR)
- Fluoroelastomers/fluorosilicones



ModyGlide™ offers peace of mind by selecting a better technology and by committing to making the world a better place in the process.

At Inhance Technologies, our focus is—and will always be—on using technology as a means to achieve a more sustainable future. As a global technology transformation partner specializing in plastics and chemicals, we believe in the science of better: innovating safer, environmentally friendly and more sustainable materials. Our sustainable manufacturing processes produce zero solids waste, zero water waste and zero emissions.

Inhance Technologies is an ISO9001:2015 and RC14001:2015 certified company.

Contact Information

+1.800.929.1743 | modyfy@inhancetechnologies.com | inhancetechnologies.com

ModyGlide™ is a product in the Modyfy™ line of surface technologies.