Innovative Chemistry for Lubricants

Technical Data Sheet

FUNCTIONAL V-736

INDUSTRIAL ETHYLENE-PROPYLENE OLIGOMER (EPO) – 600 cSt

APPLICATION:

FUNCTIONAL V-736 is a pure liquid viscosity modifier and synthetic base stock with high thickening efficiency, excellent shear stability, and low temperature fluidity for high performance at lower cost per treat. **FUNCTIONAL V-736** is effective in high VI hydraulic fluids, industrial gear oils, automotive gear oils (75W), and grease.

COMPOSITION:

FUNCTIONAL V-736 is a liquid, low molecular weight ethylene-propylene copolymer with no diluent.

Typical Properties	
Appearance, Visual	Clear to Slight Haze
	Slight Yellow to Yellow
Color, ASTM D1500	1.0
Kinematic Viscosity, ASTM D445	550 cSt @ 100°C
	9,000 cSt @ 40°C
Viscosity Index, ASTM D2270	235
Density (lb/gal), ASTM D1475	7.1 lb/gal
Density (g/mL) @ 20°C/68°F	0.85 g/mL
Flash Point, ASTM D92 COC	280°C (536°F)
Thickening Efficiency, 10wt% in ISO 32 Group I	10.8 cSt @ 100°C
Shear Stability Index (PSSI), ASTM D6278	0 SSI
20hr KRL Shear Stability, CEC L-45-A-99	4.5 SSI

TREATMENT LEVEL:

Treatment levels of 2 – 30% are typical in industrial lubricants and greases. **FUNCTIONAL V-736** can be used as either a VI improver or a shear stable base stock depending on the need. **FUNCTIONAL V-736** is compatible in most petroleum oils, synthetic oils, PAO, and esters.

Full synthetic formulas using EPO viscosity modifiers may require 5-10wt% ester for solubility.

HANDLING:

Dissolving is best accomplished with continuous agitation at temperatures of 104-140°F (40-60°C). **FUNCTIONAL V-736** may be preheated in a hot room or tank at up to 176°F (80°C) to aid in pumping but long term storage should remain below 140°F (60°C).

FUNCTIONAL V-736 is a non-hazardous material; see the current Safety Data Sheet.

This Technical Data Sheet and the Safety Data Sheet contain information believed to be accurate and reliable. No warranty is made, however, to information beyond the control of FUNCTIONAL PRODUCTS INC. The engineering and management personnel of the user are responsible for determining the suitability of this or any product for any specific application, and this information is offered to them for that purpose. Version: 2023.06.27