Product Data



Synthetic Refrigeration Compressor Lubricant

Description

The lubricants in this range are formulated from blended alkylated benzene synthetic base stocks, and incorporate additives that give extended oil life and machine cleanliness when used in refrigerator compressors, particularly where ammonia is the refrigerant. The oxidation stability is superior to that of mineral oils when used in air compressors.

Application

The Enersyn LPS lubricants possess physical and chemical properties that are highly suited to modern refrigeration equipment. They are recommended for the reciprocating and rotary screw compressors employed in industrial refrigeration systems. These grades are superior to conventional mineral oil refrigerator lubricants where evaporation temperatures are low (from -60 °C down to -100 °C) and where the refrigerants are of the critical fluorocarbon type (R13, R22 and R502). They are also the preferred lubricants for ammonia compressors. Because the Enersyn LPS grades have low carbon forming tendencies, they are suitable for air compressors operating with high discharge air temperatures, thereby reducing the risk of fires and explosions.

Advantages

- Excellent chemical stability : resist reaction with refrigerants.
- High thermal stability, for long life.
- Low floc point : withstand low evaporation temperatures without wax precipitation. Exceptionally low moisture content : high dielectric strength.
- Completely miscible with mineral oils, in any proportion.

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Typical Characteristics

Test	Method	Unit	EPS		
			46	68	100
Density at 15 °C	ISO3675/ASTM D1298	kg/m³	864	866	867
Flash Point (PMC)	ISO2719/ASTM D93	°C	149	161	179
Kinematic Viscosity @ 40 °C @ 100 °C	ISO3104 / ASTM D445	mm²/s	45.5 5.52	67.3 6.75	96.3 8.06
Viscosity Index	ISO2909 / ASTM D2270		25	19	13
Pour Point	ISO3016 / ASTM D97	°C	-36	-27	-27
Appearance			Light-coloured fluids		
Neutralisation Value	ASTM D664	mgKOH/g	0.04	0.04	0.04
Floc Point (Freon 12)		°C	-80	-80	-80
Ramsbottom Carbon Residue	ISO4262/ASTM D524	%wt	0.09	0.09	0.09

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