Shell Clavus Oil G

Refrigerator Compressor Lubricant



Shell Clavus Oils G are high quality, hydrotreated naphthenic mineral oils without additives. Specific selection of the base oils and advanced refining techniques give a range of products specially suited for the efficient lubrication of refrigeration compressors.

Applications

Refrigerator compressors

Shell Clavus G is designed for the lubrication of compressors using halogenated hydrocarbons as the refrigerant (R12, R22). It is also suitable for use with hydrocarbon refrigerants (e.g. R600a). For all refrigeration and air-conditioning applications: domestic, commercial and industrial systems with high, moderate or low evaporation temperatures.

• Ammonia as refrigerant

Clavus G should not be used in ammonia systems with low evaporation temperatures when it cannot be guaranteed that the refrigerant system is airtight.

Advice on applications not covered in this leaflet may be obtained from your Shell representative.

Performance Features and Advantages

• High quality base oils

Clavus G oils are high quality, hydrotreated naphthenic mineral oils without additives.

• Excellent stability

The specific selection of base oils and advanced refining techniques ensure excellent chemical

stability in contact with refrigerants and very good thermal stability.

Very good low temperature properties
Good lubricating properties and very good low temperature fluidity

Specification and Approvals

Shell Clavus G meets the requirements of DIN 51503 KC, KAA and KE.

Health and Safety

Guidance on Health and Safety are available on the appropriate Material Safety Data Sheet which can be obtained from your Shell representative.

Protect the environment

Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Typical Physical Characteristics

Clavus G					
Viscosity grade		ISO 3448	32	46	68
Refrigerator oil group		DIN 51503	KAA , KC , KE		
Kinmatic viscosity		ASTM D445			
at 40°C	mm²/s		32	46	68
at 100°C	mm²/s		4.6	5.6	6.9
Density at 15°C	kg/m³	ASTM D1298	896	902	906
Flash point (COC)	°C	DIN ISO 2592	195	210	220
Pourpoint	°C	DIN ISO 3016	-48	-42	-39
Fluidity in U-tube	°C	DIN 51568	-35	-29	-25
Floc point R 12	°C	DIN 51351	<-50	<-50	<-50
Neutralisation number		DIN 51558-3			
water-soluble acids	mg KOH/g		neutral		
water-soluble acids	mg KOH/g		<0,04		
Saponification number	mg KOH/g	DIN 51559-2	<0,08		
Insoluble in R 12 at -30°C	M-%	DIN 51590-1	<0,02		
Stability with refrigerants		DIN 51593			
R 12	h		>96		
R 22	h		>96		

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.