

Breox[®] 75 W 18000

Chemical composition

Diol started random propylene oxide/ethylene oxide copolymer

Properties

Physical form

Colorless to slightly yellow liquid

Physical data

Characteristic	Unit	Breox 75 W 18000
Viscosity (ASTM D445) at 40 °C	mm ² /s	18000
at 100 °C		2540
Viscosity index (ASTM D2270)		414
Water content (ASTM E203)	%	<0.25
Density, 20 °C (ASTM D1298)	g/cm ³	1.095
Flash point coc (ASTM D92)	°C	245
Pour point (ASTM D97)	°C	6
Ash content (ASTM D482)	%	<0.1
Refractive index, 20 °C		1.466
Vapor pressure, 20 °C	mmHg	<0.001
Specific heat capacity	kJ/kg	1.95
Equilibrium water content at 65 % relative humidity, 21 – 28 °C		4–6

Quality control

The above-listed data represent average values at the time of going to press of this Technical Information. They are intended as a guide to facilitate handling and cannot be regarded as specified data. Specified product data are issued as a separate product specification.

Applications

Breox 75 W 18000 is a high performance water soluble polyalkylene glycol lubricant basefluid with a viscosity of 18000 mm²/s at 40 °C.

Breox 75 W 18000 shows high thermal and high shear stability.

The high viscosity and low volatility of Breox 75 W 18000 makes it very suitable for high temperature lubrication.

Breox 75 W 18000 finds extensive application in quenchants, metalworking fluids and water based hydraulic fluids formulations, demonstrating excellent shear stability and providing good lubricity to the finished fluids.

Breox 75 W 18000 is soluble in water at temperatures below 75 °C.

Additional information**Derived products**

For ease of handling, Breox 75 W 18000 is also available as water solutions.

Breox TB 150 is an aqueous solution of Breox 75 W 18000 containing 30 % water.

Breox TB 195 is an aqueous solution of Breox 75 W 18000 containing 40 % water.

Regulatory status

REACH	TSCA	DSL	ENCS (JP)	KECI (KR)	IECSC	PICCS (PH)	AICS	NZIOC
yes	yes	yes	yes	yes	yes	yes	yes	yes

Storage**Storage stability**

- Breox 75 W 18000 should be kept tightly sealed in a dry place in its tightly sealed original packaging. Storerooms must not be overheated.
- Breox 75 W 18000 is hygroscopic with the result of absorbing moisture very quickly. Care needs to be taken to exclude moisture. Drums must be resealed each time they are opened.
- Breox 75 W 18000 must be blanketed with nitrogen if stored in heated tanks (at 50–60 °C) to prevent from coming into contact with air. Constant, gentle stirring helps to prevent discoloration as a result of prolonged contact with electrical elements or external heating coils.

Shelf life

Provided it is stored properly and the drums are kept tightly sealed, Breox 75 W 18000 has a shelf life of five years in its original packaging.

Safety

When using this product, the information and advice given in our **Safety Data Sheet** should be observed. Due attention should also be given to the **precautions** necessary for handling chemicals.

Note

Breox® is a registered trademark of BP p.l.c., used under licence

The data contained in this publication are based on our current knowledge and experience. In view of the many factors that may affect processing and application of our product, these data do not relieve processors from carrying out their own investigations and tests; neither do these data imply any guarantee of certain properties, nor the suitability of the product for a specific purpose. Any descriptions, drawings, photographs, data, proportions, weights etc. given herein may change without prior information and do not constitute the agreed contractual quality of the product. It is the responsibility of the recipient of our products to ensure that any proprietary rights and existing laws and legislation are observed.

July 2012