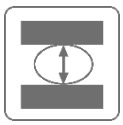
M SEALS **NBR-B75**

75a Soft Nitrile Butadiene Rubber

MATERIAL DATA SHEET (Version 6.0 – 05.2022)



Compression Set Resistance

Elastic Behaviour

Description

M Seals material NBR-B75 is a soft 75a Shore hardness Nitrile Butadiene Rubber which is commonly referred to as NBR or BUNA-N. This material provides excellent elasticity and compression-set characteristics, making it an excellent choice for low-pressure hydraulic and pneumatic seals or energising elements for composite type seals.

Good physical characteristics and resistance to the most common hydraulic industry fluids such as Mineral Oils, HFA, HFB and HFC make NBR-B75 a suitable seal material in many industrial applications.

Physical Properties

Property	Test method	Unit	Typical value
Colour			Black
Density	ISO 1183	g/cm^3	1.22
Hardness	ISO 868	Shore A	73 (+/-5)
Tensile Strength	DIN 53504	MPa	14
Elongation at break	DIN 53504	%	238
Tear strength	DIN 53515	KN/m	4.4
Rebound resilience	DIN 53512	%	31
Compression set (24 Hours @ 70°C, 25%)	ISO 815	%	<5.9
Compression set (24 Hours @ 100°C, 25%)	ISO 815	%	<9.9
Minimum service temperature		°C	-30
Maximum service temperature		°C	+100

Main Characteristics

- Excellent elastic behaviour
- Excellent compression set characteristics
- Excellent fluid resistance
- Good rebound behaivour

Typical Products

- Low pressure hydraulic seals
- Energising rings for composite seals
- Pneumatic seals
- Static Seals & O-Rings

Typical Applications

Due to its excellent elasticity and rebound behaviour, NBR-B75 Nitrile elastomer can be used in a wide range of applications such as seals for low pressure hydraulic and pneumatic systems and/or applications where compression set of the sealing material may be a problem.

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