



## NBR 90-compound WNBR 5003 - Technical Data Sheet

### 1. Introduction

NBR 90-compound WNBR 5003 is a Nitrile compound with medium percentage of Acrylonitrile. Standard compound with good compression set values for contact with hydraulic fluids.

### 2. Product Description

Chemical Composition : Acrylonitrile / Butadiene Rubber  
Physical form : O-Rings / Mouldings  
Colour : Black  
Odour : None  
Storage stability \* :  $\pm 7$  years

### 3. Physical Properties

Test Method	Norm	Test Values
Hardness	ISO 48 Method M	90 $\pm$ 5 IRHD
Tensile Strength at break	ISO 37	min 16 MPa
Elongation at break	ISO 37	min 150%
Specific Weight	ISO 2781	1,25
Compression Set	ISO 815	
25% compression - 22h/100°C	ISO 815	max 13%
on slab		max 25%
on O-Ring (3,53 mm)		
Heat Ageing 70h/100°C	ISO 188	
Hardness Change		max +4°

### 4. Chemical Resistance

Alkali : very good  
Air : excellent  
Alcohol : very good  
Fats : excellent  
Mineral oils : excellent  
Silicone oils : excellent  
Vegetable oils : excellent  
Inorganic acids : excellent  
Ketones : unsatisfactory  
Ethers : unsatisfactory  
Organic acids : fair  
Inorganic acids : excellent

### 5. Temperature Resistance

- -30° to +120°C
- TR10 (low temp. resistance): -22°C

### 6. Advantages

- Good compression-set
- Stock item for ca 2000 dimensions
- Standard O-Ring compound
- Good balance price/lifetime