

# ELASTOSIL® LR 3011/50 FR A/B



Liquid Silicone Rubber (LSR)

Liquid silicone rubber ELASTOSIL® LR 3011/50 FR A/B is a paste-like, low inflammable two-component compound.

## **Properties**

The excellent flame retardancy is confirmed by achieved UL94-V0 listings at 0.75 mm and 3mm thickness. Good heat resistance, low Compression Set as well as short curing times and non abrasive behaviour in LIM process are further benefits of this material.

#### Specific features

- Flame retardant
- Reduced volatile content

#### Technical data

#### **Properties Uncured**

Property	Condition	Value	Method
Viscosity, dynamic (1 s <sup>-1</sup> )	-	850000 mPa·s	DIN EN ISO 3219
Viscosity, dynamic (10 s <sup>-1</sup> )	-	324000 mPa·s	DIN EN ISO 3219

These figures are only intended as a guide and should not be used in preparing specifications.

#### **Properties Cured**

Cure conditions: 5 min / 165  $^{\circ}\text{C}$  in press, post-cured 4 h / 200  $^{\circ}\text{C}$ 

Property	Condition	Value	Method
Appearance	-	dark-gray / black	-
Hardness Shore A	-	50	DIN ISO 48-4
Density	-	1.13 g/cm <sup>3</sup>	DIN EN ISO 1183-1 A
Tensile strength	-	10.0 N/mm²	ISO 37 type 1
Elongation at break	-	510 %	ISO 37 type 1
Tear strength	-	28 N/mm	ASTM D 624 B
Compression Set <sup>(1)</sup>	22 h   175 °C	13 %	DIN ISO 815-1 type B method A
Volume resistivity	-	2.7 x 10 <sup>15</sup> Ohmcm	IEC 62631-3-1
Dielectric strength (1-mm-sheet)	-	31 kV/mm	IEC 60243-1
LOI	-	31 %	-
Rebound resilience	-	60 %	ISO 4662

 $^{1}\text{post-cured 6 h}\,/\,200~^{\circ}\text{C}$ 

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All the information provided is in accordance with the present state of our knowledge. Nonetheless, we disclaim any warranty or liability whatsoever and reserve the right, at any time, to effect technical alterations. The information provided, as well as the product's fitness for an intended application, should be checked by the buyer in preliminary trials. Contractual terms and conditions always take precedence. This disclaimer of warranty and liability also applies particularly in foreign countries with respect to third parties' rights.

# **Applications**

- Battery
- E-Mobility
- General Automotive Parts

- General Rubber Parts (Railway)
- Molded Parts
- Molded Seals (Automotive)

# **Application details**

This grade is especially designed for economical manufacturing of flame retardant technical articles/parts by Liquid Injection Moulding process.

#### **Processing**

The A and B components are delivered ready to use in 20 kg pail and 200 kg drum kits. With adequate metering equipment, they can be pumped directly from the original containers into the injection molding machine and mixed by a static mixer. The mixing ratio is 1:1. At room temperature, mixtures of A and B components have a pot life of at least three days.

For detailed information refer to our brochure "SOLID AND LIQUID SILICONE RUBBER - MATERIAL AND PROCESSING GUIDELINES".

## Packaging and storage

#### **Packaging**

This product is available in 20 kg pail and 200 kg drum kits.

#### **Storage**

Once opened, containers should always be resealed after use to prevent the platinum catalyst from being poisoned by amines, sulphur or phosphorus compounds. The 'Best use before end' date of each batch is shown on the product label. Storage beyond the date specified on the label does not necessarily mean that the product is no longer usable. In this case however, the properties required for the intended use must be checked for quality assurance reasons.

#### Safety notes

Comprehensive instructions are given in the corresponding Material Safety Data Sheets. They are available on request from WACKER subsidiaries or may be printed via WACKER web site http://www.wacker.com.

#### QR Code ELASTOSIL® LR 3011/50 FR A/B



## For technical, quality or product safety questions, please contact:

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