

ELASTOSIL[®] M 4644 A/B

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Room Temperature Curing Silicone Rubber (RTV-2)

Pourable, addition-curing, two-component silicone rubber that vulcanizes at room temperature.

Main application: Vacuum casting for rapid prototyping.



Properties

- good flow
- fast and non-shrink cure at room temperature which can be accelerated considerably by the application of heat
- medium Shore A hardness (approx. 40)
- good transparency of the cured rubber
- high tear strength
- outstanding resistance to casting resins, particularly polyurethanes and epoxies, for very long service life of the molds
- slightly oil-bleeding

Specific features

- Addition Curing
- Excellent mechanical properties
- Flowable
- Highly transparent
- No chemical shrinkage
- Resistance against PU
- Slightly oil bleeding
- Two-component

Technical data

Properties Uncured

Property	Condition	A	B	Method
Color	-	translucent	colorless	-
Density	23 °C	1.08 g/cm ³	0.97 g/cm ³	DIN EN ISO 2811-1
Viscosity, dynamic after stirring	23 °C	70000 mPa·s	500 mPa·s	ISO 3219

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

Properties Catalyzed A+B

Property	Condition	Value	Method
Viscosity, dynamic	23 °C	50000 mPa·s	ISO 3219
Mix ratio ⁽¹⁾	-	10 : 1	A : B
Pot Life up to 150,000 mPas	-	90	DIN EN ISO 2555
Curing time tack free	23 °C	12 h	-

⁽¹⁾(pbw)

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Properties Cured

Vulcanizate after 24 h at 23 °C

Property	Condition	Value	Method
Color	-	translucent	-
Density in water	23 °C	1.07 g/cm ³	ISO 2781
Tear strength	-	> 25 N/mm	ASTM D 624 B
Hardness Shore A	-	40	ISO 868
Tensile strength	-	5.5 N/mm ²	ISO 37
Elongation at break	-	400 %	ISO 37
Linear shrinkage	-	≤ 0.1 %	-

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Applications

- Prototype Molding

Application details

High-performance silicone mold-making compound which is particularly suitable for reproducing models with undercuts in polyurethane or epoxy resins.

Main field of application: Vacuum casting for rapid prototyping.

Processing

Detailed instructions for preparation and use are given in the brochure "Room Temperature Vulcanizing (RTV) Silicones - Material and Processing Guidelines".

Important note:

The platinum catalyst is in **component A**.

Caution:

A and B components may only be used together if they have the same batch number.

Packaging and storage

Storage

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 www.wacker.com.

QR Code ELASTOSIL® M 4644 A/B



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

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