

DESCRIPTION

Achievement of soft negatives by casting process and soft skin moulds dedicated to detailed shapes with undercuts; prototyping applications or small-scale serial production for Art & Deco parts.

PROPERTIES

- Vulcanized by polycondensation
- High tear strength
- Available in slow and fast versions
- High value for elongation at break
- Temperature resistance
- Thixotropic additive (ESSIL 126 THIXO)

PHYSICAL & MECHANICAL PROPERTIES				
	ESSIL 125	ESSIL 124	ESSIL 125	ESSIL 126
Composition	RESIN	CATALYST		THIXOTROPIC ADDITIVE
		FAST	SLOW	
Mix ration by weight	100	5	5	0,25 – 0,75
Colour	white	colourless	colourless	colourless
Density	1.2	1	1	
Viscosity (BROOKFIELD LVT) at 25 °C (mPa.s)	45.000	30	30	2.300

MIXED	RESIN	ESSIL 125	
	CATALYST	ESSIL 124	ESSIL 125
Colour	-	white	white
Aspect	-	liquid	liquid
Pot life at 25 °C on 500 g (min)	Gel Timer TECAM	40	80
Demoulding time at 23 °C (h)	-	12	24
Hardness Shore A ⁽¹⁾	ISO 868 : 2003	25	24
Tensile strength ⁽¹⁾ (MPa)	ISO 37 : 2004	2,9	2,7
Elongation at break ⁽¹⁾ (%)	ISO 37 : 2004	550	500
Tear strength ⁽¹⁾ (kN/m) (Unnotched angular specimens)	ISO 34 : 2004	19	17

⁽¹⁾ Hardening conditions : 7 days at room temperature



ESSIL 125 RESINE

ESSIL 124 – 125 CATALYSTS

ESSIL 126 THIXO

SILICONE ELASTOMER
POLYCONDENSATION

PROCESSING CONDITIONS

Mix the resin individually before use, then mix thoroughly with the catalyst according to the indicated ratio on the basis of 5 g catalyst of 100 g resin and avoid incorporating air. Demoulding time is about 16 hours. To obtain a bubble-free product, degas after mixing. Only an absolute pressure of 30 to 60 mm mercury is enough. Do not maintain vacuum for longer than 5 minutes in order to avoid catalyst vaporization. Use a container allowing 500 % expansion in volume. The optimum mechanical properties are obtained after 7 days.

It is possible to mix slow and fast catalysts in order to obtain intermediate reactivities, always while remaining in ratio 100 from resin and 5 of catalyst. Ex : with a mixture of ESSIL 124 CATALYST 2,5 gr + ESSIL 125 CATALYST 2,5 gr with 100 gr of ESSIL 125 RESIN, a pot life 120 minutes is obtained.

THIXOTROPY

By adding additive ESSIL 126 THIXO to mixture ESSIL 125 RESIN + slow or fast CATALYST, it is possible to obtain a thixotropic silicone applicable with a brush or a spatula on vertical surfaces.

Add from 0,25 to 0,75 gr into the RESIN mixture 100 gr + CATALYST 5 gr. Be careful, additive ESSIL 126 THIXO reduces the working time of silicone, to use a mixture catalyst ESSIL preferably 124 + ESSIL 125.

REMARKS

It is not advisable to heat ESSIL 125 to accelerate its hardening. Do not exceed the indicated time and ratio in order to avoid vulcanization of the product.

HANDLING PRECAUTIONS

Normal health and safety precautions should be observed when handling these products :

- Ensure good ventilation
 - Wear gloves, safety glasses and waterproof clothes
- For further information, please consult the product safety data sheet

STORAGE CONDITIONS

Shelf life of ESSIL 125 Resin is 24 months and 12 months for ESSIL 124, ESSIL 125 and ESSIL 126 THIXO catalysts in a dry place and in their original unopened containers at a temperature between 15 and 25 °C.

PACKAGING

RESINE ESSIL 125	CATALYSEUR ESSIL 124 & 125	ESSIL 126 THIXO
5 kg 20 kg 200 kg	0,250 kg 20 kg	1,0 kg

GUARANTEE

The information contained in this technical data sheet result from research and tests conducted in our Laboratories under precise conditions. It is the responsibility of the user to determine the suitability of AXSON products, under their own conditions before commencing with the proposed application. AXSON guarantee the conformity of their products with their specifications but cannot guarantee the compatibility of a product with any particular application. AXSON disclaim all responsibility for damage from any incident which results from the use of these products. The responsibility of AXSON is strictly limited to reimbursement or replacement of products which do not comply with the published specifications.