

SC 155 NA

Preliminary Technical Data Sheet

EPOXY MODELING PASTE

Master Models – Plugs – Direct to Mold

Density 34.1 lbs/ft³, (0.55 g/cc, 4.5 lbs/gal)



BUILDING TRUST



DESCRIPTION

Extrudable epoxy paste for models, tools, and plug production by extrusion process.

PROPERTIES

- Very good surface aspect.
- Low density
- Low hardness

PHYSICAL PROPERTIES

	Test Method	Test Result	Test Result	Test Result
Composition		RESIN	HARDENER	MIXED
Mix ratio by weight		100	100	100/100
Mix ratio by volume at 77° (25°C)(nominal)		1	1	1/1
Aspect		Viscous paste	Viscous paste	Viscous paste
Color		Grey	White	Grey
Viscosity at 77°F (25°C) (Pa·s) (.09 Hz)	IN-7.5-057	650	700	600
Density at 77°F (25°C) (Lbs/gal)	ASTM D792	4.3	4.3	4.5
Specific gravity at 77°F (25°C) (g/cm ³)	ASTM D792	.52	.52	.55

MECHANICAL AND THERMAL PROPERTIES at 74°F (23°C)

	Test Method	Units	Test Result
			24 hr at 74°F + 16 hr at 104°F
Hardness	ASTM D2240	Shore D	51
Glass transition temperature (Tg) TMA	ASTM E1545	°F/(°C)	140/(60)
Coefficient of thermal expansion TMA	ASTM E1545	10 ⁻⁶ .F-1/(10 ⁻⁶ .C-1)	49/(88)
Tensile strength	ASTM D638	Psi/(MPa)	1,100/(7.6)
Tensile modulus		Psi/(MPa)	48,000/(331)
Elongation		%	4.2
Flexural strength	ASTM D790	Psi/(MPa)	1,625/(11)
Flexural modulus		Psi/(MPa)	66,000/(455)
Compressive strength	ASTM D695	Psi/(MPa)	1,360/(9.4)
Compressive modulus		Psi/(MPa)	45,000/(310)

Page 1/1- July 19th, 2018 US Rev 01

SikaAxson US
+1 248 588 2270
axsonmh@axson.com
sikaaxson.us

CHINA
+86 21 58 68 30 37
marketing.china@axson.com

FRANCE
+33 1 34 40 34 60
axson@axson.com

INDIA
+91 20 25 56 07 10-11
info.india@axson.com

ITALY
+39 02 96 70 23 36
axson@axson.it

JAPAN
+81 5 64 26 25 91
sales.japan@axson.com

MEXICO
+52 55 52 64 49 22
marketing@axson.com.mx

SLOVAKIA
+42 1 76 42 25 26
axson.sk@axson.com

SPAIN
+34 9 32 25 16 20
spain@axson.com

U.K.
+44 16 38 66 00 62
sales.uk@axson.com

SIKA GERMANY –
SikaAxson
+49 7125 940 492
tooling@de.sika.com
www.sikaaxson.de

SC 155 NA

Preliminary Technical Data Sheet

EPOXY MODELING PASTE

Master Models – Plugs – Direct to Mold

Density 34.1 lbs/ft³, (0.55 g/cc, 4.5 lbs/gal)



BUILDING TRUST



During extrusion, the dispensing nozzle must be maintained perpendicular to the surface on which the product is applied. Ensure overlap of ribbon.

CAUTION: Exotherm mostly depends on the type of machine and on the working parameters such as:

- Room temperature.
- Insulating property of frame.
- The mixture temperature (depending on the type of mixer: static or dynamic) and the speed of mixing and output.
- Applied thickness.

EXOTHERMIC PEAK AND HARDENING TIME *

Thickness In. (mm)	Product temperature °F (°C)	Exothermic peak (minutes)	Exothermic peak °F (°C)	Workability (hours)
.984 (25)	74 (23)	160	158 (70)	16-18

*Room temperature: 72 – 77°F (22 – 25°C); polystyrene support.

PROCESSING CONDITIONS

On vertical support, it is recommended to apply a thin coat of product with a spatula; this will help to reinforce the bonding on the support.

For ceiling application, we recommend a maximum thickness of 1.18 in. (30 mm).

An elevated temperature cure of 16 hours at 104°F (40°C) after initial room temperature cure is highly recommended to allow the paste to develop its full properties for demanding applications.

HANDLING PRECAUTIONS

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

- ensure good ventilation,
- wear gloves, safety glasses and protective clothes.

For additional information, please consult the Safety Data Sheet (SDS).

STORAGE CONDITIONS

Use within 12 months of the manufacturing date. Expiration date indicated on the packaging.

DISCLAIMER

The information contained in this technical data sheet results from research and tests conducted in our laboratories under precise conditions. Seller cannot anticipate all conditions under which seller's products, or the products of other manufacturers in combination with seller's products, may be used. It is the responsibility of the user to determine the suitability of the SikaAxson's products, under their own conditions, before commencing with the proposed application. In no event shall SikaAxson US be liable for any direct, indirect, punitive, incidental, special, and/or consequential damages, to property or life, whatsoever arising out of or connected with the use or misuse of our products.