

TECHNICAL DATA SHEET

TCC-5000A/5090B

POLYURETHANE CASTING SYSTEM 90 SHORE A HARDNESS

DESCRIPTION

TCC-5000A/5090B is a two-component urethane casting system designed to give a 90 Shore A hardness material with exceptional toughness. This casting system offers outstanding performance properties including high strength, low shrinkage and easy processing. Ultimate properties are reached after 7 days at room temperature or by being cured for 16-20 hours at room temperature, then post cured for a minimum of 6 hours at 160°F (71°C)

APPLICATIONS

- *Long Lasting Flexible Molds*
- *Industrial Wheels*
- *Belts / Pulleys / Casters*
- *Nesting Fixtures*
- *Static Welding Fixtures*
- *Metal Forming Pads*
- *Sound Dampening Pads*

PHYSICAL PROPERTIES

Handling Properties @ 77°F (25°C)		
	Units	Mixed System
Mix Ratio (parts by weight)		100A/60B
Mixed Color	Visual	Amber
Mixed Viscosity	Cps	2,500
Pot Life (150 gram mass)	Minutes	15-20

Typical Physical Properties @ 77°F (25°C)		
	Units	Test Results
Specific Gravity - (cured)	g/cc	1.09
Hardness Build - (150 gram mass)	Shore A	85 – 87
24 Hours		90 – 93
48 Hours		90 – 94
72 Hours		
Tensile Strength	psi (MPa)	3,000 (21)
Elongation	%	300
Linear Shrinkage	in/in	<0.001
Tear Strength - Split	pli	140
Tear Strength - Die "C" graves	pli	400

MIXING PROCEDURE

Use an accurate gram scale to properly weigh and proportion A/B components into a straight sided metal or plastic container for mixing. Paper or wax lined mixing containers can contain moisture and contaminate material. Next, use a metal or plastic mixing spatula to gently but thoroughly blend resin and hardener together. Once the urethane appears to be well mixed, pour into a second container and continue to mix for another two to three minutes. This procedure eliminates the possibility of any unmixed material being poured into the final cast. Vacuum degass mixture before casting to produce an air free part.

HANDLING PRECAUTIONS

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

- Ensure good ventilation.
- Wear gloves, glasses and protective clothes.

For further information, please consult the Safety Data Sheets.

STORAGE CONDITIONS

- This product has a shelf life of 24 months for the resin and hardener as indicated by the expiration date on the container when stored in original unopened containers. Store closed containers at 65°F-85°F (18°C-29°). Partially used containers must be flushed with dry nitrogen and resealed. Materials are sensitive to moisture contamination.

PACKAGING

Packaging information on request, please contact your local sales representative or find your local contact on www.sikaadvancedresins.us

LEGAL NOTICE

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