



Technical Data Sheet

MP-55300

MP-55300 is a high-performance two-part structural methacrylate adhesive designed for bonding a wide range of materials, from plastics and metals to composite assemblies. It delivers exceptional strength and stiffness making it ideal for metal bonding. MP-55300 provides outstanding resistance to extreme conditions - withstanding temperature fluctuations, thermal cycling, and harsh chemicals. Its advanced formulation ensures long-lasting reliability without the need for any surface preparation to meet the needs of most applications.

Technology / Base	Methyl Methacrylate (MMA)	
Type of Product	Structural Adhesive	
Components	Two component	
Curing	Room Temperature Cure	
Appearance / Color	Off White or Amber	
Consistency	Viscous Liquid	

Features and Benefits

- No Surface Preparation Required
- Excellent Adhesion Properties
- Excellent Strength to Metals, E-Coat, Thermoplastics, Thermosets, and Engineering Plastics
- High Impact Resistance
- Suitable for Easy Manual and Pneumatic Dispensing
- Excellent Thermal Performance
- 100% Reactive
- Room Temperature Cure
- 1:1 meter-mix product for ease of application

Technical Data			
Rheology		Condition/Method	
Viscosity - Resin	60,000 - 80,000 cPs	Brookfield RV7, 20 RPM, 25°C	
Viscosity - Activator	60,000 - 110,000 cPs	Brookfield RV7, 20 RPM, 25°C	
Thixotropic Index	5	Brookfield RV7, 20/2 RPM, 25°C	
Density			
Mixed Density	0.98 g/cc		
Mix Ratio			
Volume Mix Ratio	1:1		
Weight Mix Ratio	1:1		
Uncured Material Characteristics			
Flash Point	51°F		
Open Time	3 - 6 Minutes		
Fixture Time	9 - 13 Minutes		
Cure Time	24 hr	25°C	
Cured Mechanical Properties			
Gap Fill Dimension	0.125 inch		
Hardness	75 Shore D	ASTM D2240	
Tensile Strength	3625 to 5075 psi (25 to 35 MPa)	ASTM D638	
Over Lap Shear Strength (Average)			
Carbon Steel	3100 psi	ASTM D1002, 25°C 50% RH	
Aluminum	3000 psi	ASTM D1002, 25°C 50% RH	
Cured Thermal Properties			
Thermal Service Range	-65°F to 250°F		



Technical Data Sheet



Recommended For

METALS

- Aluminum
- Steel
- Stainless
- · E-Coated Metal

THERMOSETS

- Fiberglass
- Phenolic
- Gel Coat
- Epoxy
- RIM Urethane
- Polyurethane
- · Liquid Molding Resin

THERMOPLASTICS

- Acrylic
- ABS
- Polycarbonate
- Nylon/PA
- PPO
- Vinyl
- PVC
- Styrene
- Peek
- PBT Blends
- PET Blends

Handling and Clean-Up

Clean up is best before the adhesive has cured. Cleaners containing NMP (N-methyl pyrolidone) or Citrus terpene provide the best results. On cured adhesive repeat use may be required.

Storage and Shelf Life

Product should be stored in a cool dry place out of direct sunlight. The shelf life of MP-55300 is one year from date of manufacture. Shelf life is based on the products being stored properly at temperatures between 55°F and 75°F. Exposure to temperatures above 75°F will reduce the shelf life. This product should NEVER BE FROZEN.

General Instructions

The product is best used at temperatures between 65°F and 80°F. Temperatures below 65°F will slow the cure speed of the material and viscosities will be higher. Temperatures above 80°F will cause the material to cure faster and viscosities will be lower. For consistent dispensing maintain temperature in the above mentioned range.

For optimum bond strength and to insure maximum performance in the finished assembly mate parts together within the specified work time of the adhesive. Make sure the bond joint has uniform coverage and that a sufficient amount of adhesive is in the bond area. It is important to have the adhesive applied, parts aligned and positioned, within the established work times for the product. To ensure maximum performance in the finished assembly parts should remain undisturbed until the fixture time is reached.

Typical Packaging

MP-55300 is conveniently packaged in 50 mL, 400 mL, pail, and drum kits. Special packaging is available upon request.

Specifications and Approvals

UL Certified: Sign Accessories - Component (UYMR2) File number E350958

Safety and Disposal

For safe handling information on this product, consult the Safety Data Sheet (SDS)

H.B. Fuller Company 9411 Corsair Road Frankfort, IL 60423 Tel: +1.800.552.0306

Date Modified: 3/31/2025

Connecting what matters.TM

www.hbfuller.com

IMPORTANT: Information, specifications, procedures and recommendations provided ("information") are based on our experience, and we believe this information to be accurate. No representation, guarantee or warranty is made as to the accuracy or completeness of the information or that use of the product will avoid losses or damages or give desired results. It is purchaser's sole responsibility to test and determine the suitability of any product for the intended use. Tests should be repeated if materials or conditions change in any way. No employee, distributor or agent has any right to change these facts and offer a guarantee of performance.

 $\ensuremath{\mathbb{R}}$ and $\ensuremath{^{\mathrm{IM}}}$ are trademarks of H.B. Fuller Company or one of its affiliated entities.



H.B. Fuller www.hbfuller.com

©H.B. Fuller Company, 2021