



**POLYCOAT
PRODUCTS**
A Division of American Polymers Corp.

THEMECOAT® 5#
*Rigid Polyurethane
Foam System
Data Sheet*

THEMECOAT® 5#

TYPICAL PROPERTIES 5# (ISO)

Viscosity, mPa·s @ 25°C:	150-200
Specific Gravity @ 25°C :	1.23
Appearance @ 25°C:	liquid

TYPICAL PROPERTIES 5# (POLYOL BLEND)

Viscosity, mPa·s @ 80°C:	700-1100
Specific Gravity @ 25°C :	1.04
Appearance @ 25°C:	viscous liquid

TYPICAL PHYSICAL PROPERTIES

Density, pcf	ASTM-1638	5
Compressive Strength, psi	ASTM-1621	250
Tensile Strength, psi	ASTM-1623	190
Shear Strength, psi	ASTM C-273	105

PROCESSING CHARACTERISTICS @ 74° F

Ratio, By Volume A/B		50/50
Cream Time	Sec	8-10
Rise Time	Sec	36-42
Demold Time	Min	8-15

DESCRIPTION

Themecoat® 5# polyurethane foam systems are designed for molding and void filling application. Themecoat® 5# can be designed to meet a variety of reactivity requirement without sacrificing product quality and can be formulated to a wide range of densities from 4 to 25 pounds per cubic foot. The unique handling characteristics of the Themecoat® 5# series system provide ease of mixing by hands or machine to produce a uniform product with excellent cell structure. This product does not contain any CFC blowing agent or other Ozone Depleting chemical.

The Themecoat® 5# series systems have been formulated for use in the manufacturing of molded picture frames, furniture parts, structure floats and other design application.

STORAGE AND HANDLING

Containers for both A and B components should be kept tightly closed to prevent moisture contamination. Do not reseal if contamination is suspected. Use of a dry nitrogen blanket for partial drums is recommended. Component B may be stored at ambient temperatures. Storage for Component A should be maintained between 77°F (25°C) and 95°F (35°C). For best results, this product should not be allowed to freeze, although it may be re-heated in a well ventilated oven for a period of time to re-liquefy solid particles.

To avoid product degradation, product temperature during re-heating should not exceed 140°F (60°C). An additional note of caution is that exposure to temperatures over 400°F (204°C) can create excessive pressure potentially causing containers to rupture. Do not breathe aerosol or vapors and avoid contact with skin and eyes. Exposure to vapors of heated MDI can be dangerous. To heat product properly, use well ventilated convection ovens or other methods that distribute heat evenly. Avoid using drum heaters or other heat sources that may cause excessive local heating.

HEALTH AND SAFETY INFORMATION

Appropriate literature has been assembled which provides information concerning the health and safety precautions that must be observed when handling any of the products listed above. Before working with these products, it is your responsibility to read and become familiar with the available information on its hazards, proper use and handling. This is extremely important and cannot be overemphasized. Information is available in several forms, e.g. material safety data sheets and product labels. To obtain this information, contact your Polycoat Products representative.

Please read all information in the general guidelines, product data sheets, guide specifications and material safety data sheets (MSDS) before applying material. Published technical data and instructions are subject to change without notice. Contact your local Polycoat Products representative or visit our website for current technical data and instructions.

LIMITED WARRANTY

Polycoat Products warrants its products to be free of manufacturing defects and that they will meet Polycoat Products current published physical properties. Polycoat Products warrants that its products, when properly installed by a state licensed waterproofing contractor according to Polycoat Products guide specifications and product data sheets over a sound, properly prepared substrate, will not allow water migration for a period of one (1) year. Seller's and manufacturer's sole responsibility shall be to replace that portion of the product of this manufacturer which proves to be defective. There are no other warranties by Polycoat Products of any nature whatsoever expressed or implied, including any warranty of merchantability or fitness for a particular purpose in connection with this product. Polycoat Products shall not be liable for damages of any sort, including remote or consequential damages resulting from any claimed breach of any warranty whether expressed or implied. Polycoat Products shall not be responsible for use of this product in a manner to infringe on any patent held by others. In addition, no warranty or guarantee is being issued with respect to appearance, color, fading, chalking, staining, shrinkage, peeling, normal wear and tear or improper application by the applicator. Damage caused by abuse, neglect and lack of proper maintenance, acts of nature and/or physical movement of the substrate or structural defects are also excluded from the limited warranty. Polycoat Products reserves the right to conduct performance tests on any material claimed to be defective prior to any repairs by owner, general contractor, or applicator.

DISCLAIMER

All guidelines, recommendations, statements, and technical data contained herein are based on information and tests we believe to be reliable and correct, but accuracy and completeness of said tests are not guaranteed and are not to be construed as a warranty, either expressed or implied. It is the users responsibility to satisfy himself, by his own information and test, to determine suitability of the product for his own intended use, application and job situation and user assumes all risk and liability resulting from his use of the product. We do not suggest or guarantee that any hazard listed herein are the only ones which may exist. Neither seller nor manufacturer shall be liable to the buyer or any third person for any injury, loss or damage directly or indirectly resulting from use of, or inability to use, the product. Recommendations or statements, whether in writing or oral, other than those contained herein shall not be binding upon the manufacturer, unless in writing and signed by a corporate officer of the manufacturer. Technical and application information is provided for the purpose of establishing a general profile of the material and proper application procedures. Test performance results were obtained in a controlled environment and Polycoat Products makes no claim that these tests or any other tests, accurately represent all environments.