



DESCRIPTION

Premium Spray Products' **PREMISEAL™ 280** system is a two component, one-to-one by volume spray applied rigid polyurethane foam. It is a technically advanced spray roofing system intended for use by qualified contractors trained in the processing and application of SPF. It provides a self adhering, seamless, high insulation value material. PREMISEAL™ 280 utilizes an EPA approved, zero ozone-depleting, blowing agent. It is designed for use as a roofing system in commercial, industrial and institutional construction applications, and is compatible with most common construction materials.

ADVANTAGES

- Superior Insulation Performance
- Good Dimensional Stability
- Excellent Cure and Overlap Adhesion
- Broad Range of Application Conditions
- High Yields
- Ease of Application
- High closed cell content
- Zero ODP

For proper use of this Premium Spray Products roofing system or any polyurethane foam, please refer to the PSP application information and any of the following codes or guidelines:

- API Bulletin AX-205 "Working with MDI and Polymeric MDI: What You Should Know"
- API Bulletin AX-236 "Six Steps for Fire Safety During Construction"
- API Bulletin AX-151 "Guidelines for the Responsible Disposal of Waste and Containers from Polyurethane Processing"
- International Building Code, (IBC), Section 2603

TYPICAL PHYSICAL PROPERTIES

Liquid Resin as Supplied

	A	B
Specific Gravity @ 70°F	1.24	1.16
Viscosity (Brookfield) cps	250	950

As Cured

Core density ASTM D-1622	2.8 pcf
Compressive Strength ASTM 1621	55 psi
Tensile Strength ASTM D-1623 Type C	71psi
R-value at 1 inch ASTM C-518	6.4
Closed Cell Content ASTM D-6226	> 93%
Dimensional Stability ASTM D-2126	<1%
Flammability ASTM E-84 at 2 inches	Flame Spread <75

NOTE: The above values are average values obtained from laboratory experiments and should serve only as guidelines. Free rise core density should not be confused with overall density. Overall densities are always higher than free rise core densities and take into account skin formation, thickness of application, environmental conditions, etc.

Technical Data Sheet

PREMISEAL™ 280

APPLICATION INFORMATION

STORAGE AND USE OF CHEMICALS

Cold chemicals can cause poor mixing, pump cavitations, or other process problems due to higher viscosity at lower temperatures. Storage temperatures should be 65-85°F for several days before use, and should not exceed 90°F. Do not store in direct sunlight. Keep drums tightly closed when not in use and under dry air or nitrogen pressure of 2-3 psi after they have been opened. Shelf life is six months from date of manufacture when stored in original unopened containers at 50-85°F.

SAFE HANDLING OF LIQUID COMPONENTS

When removing bungs from containers use caution, contents may be under pressure. Loosen the small bung first and let any built up gas escape before completely removing. B-component will froth at elevated temperatures. Avoid prolonged breathing of vapors. In case of chemical contact with eyes, flush with water for at least 15 minutes and get medical attention. For further information refer to "MDI-Based Polyurethane Foam Systems: Guidelines for Safe Handling and Disposal" publication AX-119 published by the Alliance For The Polyurethanes Industry, Arlington, VA.

EQUIPMENT AND COMPONENT RATIOS

Polyurethane foam systems should be processed through commercially available spray equipment designed for that purpose. PREMISEAL™ 280 B-side (white drum) is connected to the resin pump and the PREMISEAL™ 280 A-side (black or red drum) is connected to the isocyanate pump. The proportioning pump ratio is 1 to 1 by volume. The pre-heater and hose temperature should be set at 125-135°F and able to maintain +/- 5°F.

APPLICATION GUIDELINES

PREMISEAL™ 280 is suitable for application to most construction materials including wood, masonry, concrete, and metal. All surfaces to be sprayed with foam should be clean, dry, and free of dew or frost. All metal to which the foam is to be applied must be free of oil, grease, etc. Two inches should be the maximum thickness of each layer. Allow ten minutes between each pass to allow for cooling. Multiple layers can be applied to reach the desired thickness and R-value.

Substrate temperature at the time of PREMISEAL™ application, should be between 45-120°F, the warmer the substrate, the better the adhesion. When substrates to be sprayed are cooler than 60°F, a half inch pass should be applied with the second pass following as soon as the original pass is no longer tacky to the touch. For service temperatures in the range of 120-180°F, the substrate should be 120°F or above at the time of spraying.

As with all Spray Polyurethane Foam systems, improper application techniques should be avoided. Examples of improper techniques include, but are not limited to, excessive thickness of SPF, off ratio material and spraying into or under rising foam. Potential results of improperly installed SPF include: dangerously high reaction temperatures that may result in fire and offensive odors that may or may not dissipate. Improperly installed foam must be removed and replaced with properly installed SPF.

SPF insulation is combustible. High intensity heat sources such as welding or cutting torches must not be used in close proximity to any polyurethane foam.

FINISHED FOAM PROTECTION

The finished surface of the sprayed polyurethane foam should be protected from the adverse effects of sunlight ultra-violet rays which can cause dusting and discoloration. Protective coatings designed for use with polyurethane foams are available from Premium Spray Products.

HEALTH & SAFETY

Due to the reactive nature of these components, vapors and liquid aerosols present during application and for a short period thereafter must be considered – and appropriate protective measures taken – to minimize potential risks from over-exposure through inhalation, skin, or eye contact. These protective measures include: adequate ventilation, safety training for installers and other workers, use of appropriate personal protective equipment, and a medical surveillance program.

CODE COMPLIANCE

Building codes require the installation of an approved thermal barrier between the foam insulation and the occupied space such as ½ inch gypsum board or other tested and approved material when the foam covers a large area of the building interior. Refer to specific building codes for details. Contact Premium Spray Products for specific alternate approvals for PREMISEAL™ 280.

The information herein is to assist customers in determining whether our products are suitable for their applications. Customer assumes full responsibility for quality control, testing, and determination of suitability of product for its intended use or application. Premium Spray Products warrants only that the material shall meet its specifications; this warranty is in lieu of all other written, expressed or implied warranties and Premium Spray Products expressly disclaims any warranty of merchantability, fitness for a particular purpose, or freedom from patent infringement. Accordingly, buyer assumes all risks whatsoever as to the use of the material. Buyer's exclusive remedy as to any breach of warranty, negligence or other claim shall be limited to the purchase price of the material. Failure to adhere to any recommended procedures shall relieve Premium Spray Products of all liability with respect to the material or the use thereof.