

# **RT-25255 Series Spray Foam Insulation**

For Professional Use Only

## **PRODUCT INFORMATION**

Roof-Tek® RT-25255 is a two-component, closed-cell polyurethane spray foam insulation system using an EPA approved, zero ozone depleting blowing agent. It is supplied in a nominal 2.5 lbs/ft3 in-place density. Low viscosity and 1:1 by volume ratio provide for easy processing.

## USES

RT-25255 is used for the thermal insulation and air sealing of building roofs, tanks, vessels and pipes, and below grade. RT-25255 is used in coated foam (SPF) roofing systems. When installed following the application guidelines the spray foam adheres tenaciously to substrates, and provides superior energy economy, durability and reduces air infiltration.

Flame Spread: Class 1 40 ASTM E84

Polyurethane foam systems should not be left exposed in interior applications and must be protected by a minimum 15-minute thermal barrier.

## SHIPPING INFORMATION

Packaging: Polyurethane components are sold by the pound

	Container Size	Class	
Part A	551 lb net: 55-gal. Drum	60	
Part B	500 lb net: 55-gal. Drum	60	

### **DOT Shipping Information:**

Part A: Plastic material O/T Expanded Part B: Plastic material O/T Expanded

## **HMIS® RATING:**

Part A: Health 2\*, Flammability 1, Reactivity O, Protection X Part B: Health 1, Flammability 1, Reactivity O, Protection X O= Minimal 1=Slight 2=Moderate 3=Serious 4=Severe (\*) Indicates potential for chronic health effects.

### CURED FOAMS TYPICAL PHYSICAL PROPERTIES:

(DATA DERIVED FROM LABORATORY SAMPLES)

PROPERTY:	RESULTS	ASTM TEST METHOD
Density	2.5 pcf	D-1622
R Value	6.4	C-518
Closed cell content	>90%	D-6226
Dimensional stability (% Volume Change)	0.5% max.	D-2126
Moisture Absorption	0.9%	C-2842
Tensile Strength	55-65 psi	D-1623 Type C
<b>Compressive Strength</b>	42-50 psi	D-1621

These physical property results are typical for this material as applied under controlled conditions. The foam and resulting physical properties can vary with changes in the application parameters; that is, temperatures, thickness, processing equipment, chamber sizes, etc. As a result these published properties are useful for evaluation guidelines. Physical property specifications should be determined from actual production processed material.

## **REACTIVITY PROFILES:**

The following reactivity guidelines have been developed to assist in ordering the proper speed for a range of ambient temperatures.

	SUMMER (S) 100	REGULAR (R) 80	MID-RANGE (M) 50
Ambient Temp. Range	85 - 110°F	65 - 90ºF	50 - 75°F
Reactivity (Rise Time)	7-9 Sec.	5-7 Sec.	3-5 Sec.

LIQUID COMPONENTS	COMPONENT A	COMPONENT B	TEST METHOD
Viscosity, cps @ 74°F	200-300	900 +/- 100	ASTM D-2196
Specific Gravity @ 74°F	1.24	1.17	ASTM D-1638
Color	Dark Brown	Light Brown	Visual
Weight Per Gallon	10.33 lb	9.5 lb	From Specific Gravity





## Application Procedures

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**GENERAL INSTRUCTIONS:** Before the containers are opened, all safety instructions should be read and understood by all personnel who will come into contact with the materials. If the safety instructions are lost or otherwise not available, contact Accella Roofing Solutions for a replacement.

A Safety Data Sheet (SDS) is sent with the original shipment and available upon request. All personnel who come in contact with the product should read and understand the MSDS.

**PROTECTIVE EQUIPMENT:** The "A" component is a polymeric isocyanate and may be sensitizing, particularly from the standpoint of VAPOR INHALATION. The best form of protection against sensitizing vapors in the workplace is a FRESH AIR SUPPLY. Several manufacturers, including 3M Company and MSA make full-face fresh air masks. For minimum protection, organic vapor canister style respirators shall be worn. To prevent contact with the product, wear fabric coveralls and fabric gloves, full-face mask and OSHA approved protective goggles.

**STORAGE/SHELF LIFE:** Components "A" and "B" should be stored in their original, unopened containers at temperatures between 65°F and 85°F. This recommended temperature range is to reduce the potential pressure build-up that may be generated by the blowing agent used in this system. Shelf life of unopened, sealed containers is approximately six (6) months under those storage conditions.

**EQUIPMENT:** Use Graco or other recommended proportioning equipment. Mixing and ratio by volume is 50 parts A to 50 parts B (1:1.) Equipment shall be of the heated, airless type, capable of maintaining  $125^{\circ}$ F to  $130^{\circ}$ F and a minimum spray pressure / working pressure of 1000 psi at the spray gun. Optimum spraying temperature will vary with type of equipment used, substrate, ambient temperature, and humidity. Material MUST be supplied to the proportioner at a minimum temperature of 65°F.

**CAUTION:** RT-25255 should only be applied in 1" to 1.5 passes. This application procedure is in compliance with the SPFA foam application guidelines. The maximum application thickness is 1.5" inches per pass. Any greater thickness, than 1.5 inches may lose physical properties and /or discolor or scorch.

RT-25255 is to be applied surfaces between  $45^{\circ}$ F to  $120^{\circ}$ F. Substrate minimum temp. is  $50^{\circ}$ F, any application below this temp may result in loss of adhesion to the substrate and other changes to the physical properties or yield.

**WARNING:** Polyurethane foam may present a fire risk in certain applications if exposed to fire or excessive heat, e.g. welding and cutting torches. The use of exposed polyurethane in interior applications, such as walls or ceilings, presents an unreasonable fire risk, unless the foam is protected by an approved 15 (fifteen)-minute thermal barrier or an ignition barrier, consult appropriate local codes.

#### HEALTH AND SAFETY:

VAPOR INHALATION problems are characterized by coughing, shortness of breath or tightness of the chest. Anyone exhibiting these symptoms shall be immediately removed from the workplace and administered oxygen or fresh air. If the condition is prolonged or extreme, *Summon "Emergency Trained" Medical Attention Immediately.* 

SKIN CONTACT with liquid components can result in a rash or other irritation. Wash the affected area with water. Wipe residual liquid with a clean soft cloth followed by washing with soap and water. If a rash or other irritation develops, *see A Physician*.

EYE CONTACT with liquid or sprayed components can result in corneal burns or abrasions. Upon exposure, eyes should be flushed with water for an extensive period. *Summon "Emergency Trained" Medical Attention Immediately.* 

**WARNING:** Polyurethane products manufactured or produced from these chemicals may present a serious fire hazard if improperly used or allowed to remain exposed or unprotected. The character and magnitude of any such hazard will depend on a broad range of factors that are controlled or influenced by the manufacturer, applicator or the production process. Each person, firm, or corporation engaged in the manufacture, production, application, installation or use of any polyurethane materials should carefully determine whether there is a potential fire hazard associated with such specified usage, and utilize all appropriate precautionary and safety measures as outlined in Local, State and Federal regulations governing the manufacture of products or the construction and/or renovation of commercial or residential properties.

To the best or our knowledge, all technical data contained herein is true and accurate as of the date of the issuance and subject to change without prior notice. User must contact Accella Roofing Solutions (ARS) to verify correctness before specifying or ordering. We guarantee our product to conform to the quality control standards established by ARS. We assume no responsibility for coverage, performance or injuries resulting from use. Liability if any, is limited to replacement of the product. NO OTHER WARRANTY OR GUARANTEE OF ANY KIND IS MADE BY ARS EXPRESSED OR IMPLIED, STATUTORY, BY OPERATION OF LAW, OR OTHERWISE, INCLUDING MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

