

QUIK-SHIELD 104

No Mix Open-Cell Foam

QUIK-SHIELD® 104 is an open-cell spray foam insulation that does not require mixing. It is ideal for high-performance and air barrier insulation applications in residential (IRC) and commercial (IBC) construction. QUIK-SHIELD® 104 is odor-free and does not shrink, providing a consistent seamless application without the need of an ignition barrier.

TYPICAL PHYSICAL PROPERTIES

Properties achieved in a lab environment at 77°F. Field conditions may cause variation in properties.

	PROCEDURE	VALUES
Air Leakage at 3.5 (L/s/m² @ 75 Pa)	E-2178	<0.02
Closed-Cell, content (%)	D-2856	<90
Core Density (nominal, lb/ft³)	D-1622	0.44
Dimensional Stability (% max total change)	D-2126	<15
Tensile Strength (psi)	D-1623	min 3

RELATIVE INSULATION VALUES (aged)

R-value at 1"	3.9
R-value per inch at ≥ 3.5"	3.7

THERMAL BARRIER

DC 315 (wet mils) NFPA 286 18

HANDLING PROPERTIES at 77°F (25°C)

	A-SIDE (ISO)	B-SIDE (RESIN)
Specific Gravity	1.23	1.15
Viscosity, cps	250±50	250±50

RECOMMENDED STORAGE AND SHELF LIFE

- Storage temperatures 50-90°F (10-32°C) See back for preconditioning of material.
- 6 month shelf life from date of manufacture (unopened containers).
- Keep container tightly sealed.
- Store out of direct sunlight, in a cool dry place, avoid freezing.

PRODUCT INFORMATION

Blowing Agent	100% Water Blown	
LEED	QUIK-SHIELD* 104 has a minimum of 20.1% total renewable/recycle content, 2.2% pre-consumer recycled, 2.9% post-consumer recycled, and 15.0% rapidly renewable.	
Product Color	White to off-white (UV exposure will cause discoloration. Discoloration by itself is not a sign of product damage.)	
Product Packaging	275 Gallon Tote and 55 Gallon Drum	
Water Absorption	Water can be forced into any open-cell foam under pressure. Water will drain with gravity allowing wet foam to fully dry and restore all chemical and physical properties of the insulation.	

APPROVALS / COMPLIANCE

QUIK-SHIELD* 104 has been tested by a third party laboratory (QAI Laboratories) and evaluated by DrJ Engineering.

DrJ Certification - TER No. 1803-01

IBC, IRC, IECC: 2009, 2012, 2015, 2018

Class 1— ASTM E-84

 ${\sf IRC/IBC\ End\text{-}Use\ Configuration\ for\ Unvented\ Attics\ per\ TER\ 1803.01-Ignition\ barrier\ not\ required.}$





PREPARATION OF SUBSTRATES

Providing the proper substrate is the responsibility of the owner, the owner's appointed representative, the contractor, and/or inspector. The following are manufacturer's recommendations. However, other preparation techniques may be required given unique/specialized application circumstances. Contact **SWD Technical Support at 888-380-2022** for additional questions.

It is recommended to remove dust, dirt, oil, paint, and alternative polymers from all surfaces prior to applying SWD products.

See SWD specifications or SPFA guidelines for further details on substrate prep.

See SWD specifications	s of SFFA guidelines for further details off substrate prep.
Wood	 Ensure wood is relatively dry and protect surfaces from contamination. For moisture content exceeding 19%, contact SWD Technical Support. Water or oil present may cause poor adhesion or excessive foaming. Fill large voids with appropriate backer rods or appropriate fillers. If additional information is required, contact SWD Technical Support.
Steel & Other Metals	 It is the responsibility of the contractor/end user to determine proper adhesion and suitability through field testing. Blasting and/or priming is not always required. If additional information is required, contact SWD Technical Support.
Concrete	 If applying foam to concrete, the concrete surface should be structurally sound, clean, and curing for 28 days. Fill large voids with appropriate backer rods or appropriate fillers. Blasting and/or priming is not always required. It is the responsibility of the contractor/end user to determine proper adhesion and suitability. If additional information is required, contact SWD Technical Support.
Previously Applied Foam or Other Polymers	 As practical, remove previously applied foam and other polymer products. Application of product over existing materials should be performed only after adhesion/compatibility is verified by the contractor and accepted by the building owner or owner's appointed representative.
Wiring and Pluming	 QUIK-SHIELD* 104 is fully compatible with CPVC piping systems (Paschal Engineering Study for the SPFA). QUIK-SHIELD* 104 is compatible with typical electrical wiring coverings. (NEMA Bulletin 95)
PROCESSING	
Preconditioning	It is recommended to precondition material to 70-80°F prior to application. Material may thicken at lower temperatures which can cavitate pumps.
Mixing	 Mixing of B-Side (resin) is not required. Mixing of A-Side (iso) is not required.
Pressure Settings	 4. Product should be sprayed with a high pressure plural-component proportioner capable of a minimum of 1000 psi dynamic pressure. 5. Static pressure is typically set between 1100-1400psi. 6. Dynamic pressure typically operates at a minimum of 1000psi.
Temperature Settings	7. Primary heaters and hose heaters are typically set between 110-140°F (43-60°C). Higher temperatures are utilized in winter months, lower temperatures are utilized in summer months.

Proper application temperature setting is the responsibility of the end user. Equipment temperature varies and can be dependent on equipment, hose length, elevation, ambient temperature, substrate temperature, humidity, and other factors. If additional information is required, refer to QS104 Processing Packet found on swdurethane.com and the SWD mobile app, or contact

SWD Technical Support at 888-380-2022.

APPLICATION

- 1. Clean surfaces according to "Preparation of Substrates" section.
- 2. If priming, follow manufacturer recommendations. Ensure primer is adequately cured prior to application.
- 3. It is the contractor's responsibility to determine if ambient and substrate temperatures are conducive for spraying foam.
- 4. Flush an adequate amount of material through the lines/gun prior to spraying desired surface when changing between systems. Flush amount will be dependent on prior system used. If additional information is required, contact an SWD representative for more details.
- $5. \ \ Before \ application, test \ material \ to \ ensure \ that \ material \ sprays, \ cures, \ and \ hardens \ properly.$
- 6. Inspect applied material intermittently to ensure no problems exist. If problems are detected, discontinue application and inspect all substrates, equipment, gun, and liquid material for problem source(s).

CLEANING AND MAINTENANCE

- 1. Spray equipment must be maintained in proper operating condition. Failure to adequately maintain spray equipment may result in poor product performance. Refer to your equipment manufacturer's maintenance procedures for more details.
- 2. Contact SWD for long-term equipment storage recommendations.



The information herein is believed to be reliable; however, unknown risks may be present. SWD Urethane makes no warranty, expressed or implied, concerning this product's merchantability or fitness for any particular use. The product will meet the written liquid component specifications as indicated on the technical data sheet published at the time of the purchase. The entirety of SWD Urethane's responsibility is limited only to the cost of the SWD material. The foregoing constitutes SWD Urethane's sole obligation with respect to damages, whether direct, incidental or consequential, resulting from the use or performance of the product.

Safety is the responsibility of the owner, the owner's appointed representative, the contractor, and/or inspector. Become familiar with local, state, and federal regulations regarding chemical health, safety, and handling. For more information consult the product SDS, contact the SPFA (www.sprayfoam.org) or the ACC (www.spraypolyurethane.org).