

silvercote.com

For total thermal protection on every job use SolarGuard Reflective Insulation alone or with fiberglass.

- · Behind fiberglass batts in walls
- · Under roof trusses or roof deck
- · Below radiant floors
- · In crawl spaces
- · On basement walls
- · Behind recessed lights
- · Overhead doors
- · Outer sheds
- · Metal buildings
- · Post frame building

### Available sizes

#### SolarGuard White/Foil & RFSK/Foil:

- 48" x 102' 48" x 125'
- 72" x 102' 72" x 125'

#### SolarGuard Foil/Foil:

• 48" x 125' • 72" x 125'



SolarGuard Reflective Insulation greatly increases comfort in residential and commercial applications by reducing radiant heat gain. The barriers consist of a highly reflective material that reflects radiant heat rather than absorbing it. SolarGuard is effective used alone or in conjunction with fiberglass batts for optimal thermal performance.

#### Blocks all three modes of heat loss/gain!

Provides total thermal protection. Radiant energy causes up to 93% of heat transfer. Only one insulation blocks radiant energy plus heat conduction and convection: SolarGuard Reflective Insulation.



#### Foil/Foil

Increases home comfort in between conditioned and unconditioned spaces.



#### White/Foil

May be used as a condensation blanket in well ventilated buildings.



## RFSK/Foil

Helps reduce heat gain.

## How is SolarGuard made?

SolarGuard Reflective Insulation is made of a  $\frac{1}{4}$ " encapsulated fiberglass core that is bonded to two exterior layers. The first layer is perforated 99% pure aluminum and the second layer can be either:

- Aluminum
- · Reinforced aluminum scrim kraft
- · White scrim-reinforced facing

We perforate SolarGuard laminated material for one purpose, permeance. The foil/foil product is used primarily in retrofit or new residential construction where there may be an existing vapor retarder. SolarGuard's perforated material eliminates a double vapor barrier when installed behind existing insulation.



# **Testing**

**Fire Properties:** All SolarGuard E84 test (for surface burning characteristics of building materials) results reported herein were achieved with the material, by its own structural quality (or the manner in which it is tested and intended for use) was capable of supporting itself in position during the test period.

SolarGuard Residential	- Foil/Foil	
Physical Properties	. Test Method	Values
Water Vapor		
Transmission (perm)	.E96	.1.35
Emittance	.ASTMC 1371-04	.0.044
Fungi Growth	.ASTMC 1338-14	.No Growth
Flame Spread	.E84	15
Smoke Developed	.E84	5
Corner Burn Test	. NFPA 286	.Pass
Pliablity	.ASTMC 1224	.Pass
Delamination	.ASTMC 1224	.Pass
Temperature/Humidity		
Resistance	.ASTMC 1258	.Pass
Thermal Performance*	.ASTM C1363/C976	.Heat Flow
		Down R-11.6
		Heat Flow
		Up R-8.3
		Heat Flow
		Horizontal R-9.0
SolarGuard Commercia	I - White/Foil	

SolarGuard Commerci	al - White/Foil		
Physical PropertiesTest MethodValues Water Vapor Transmission			
(perm)	E96		
Fungi Growth	ASTMC 1338-14	No Growth	
Flame Spread	E84	25	
Smoke Developed	E84	40	
Pliablity	ASTMC 1224	Pass	
Delamination	ASTMC 1224	Pass	
Temperature/Humidity			
Resistance	ASTMC 1258	Pass	
Thermal Performance*	ASTM C1363/C976.	Heat Flow	
		Down R-10.3	
		Heat Flow	
		Up R-7.6	
		Heat Flow	
		Horizontal R-8.7	

(\*) System R-Values per ASTM C976/C1363, Air to Air with a 30 degree Fahrenheit temperature differential. These tests were conducted using a Calibrated Hot Box apparatus. The reflective insulation tested was .25" thick fiber glass insulation with foil facing on one side and a white scrim-reinforced facing on the other side. The test sample was installed in the middle of a 2 x 4 wood stud cavity, the wood framing was 16" o.c. with 3/4" thick plywood on each side. All R-Values are in hr-sq. ft.-degree F/BTU.