January 2021

THERMAL BREAK MATERIAL™

therm•block

Submittal

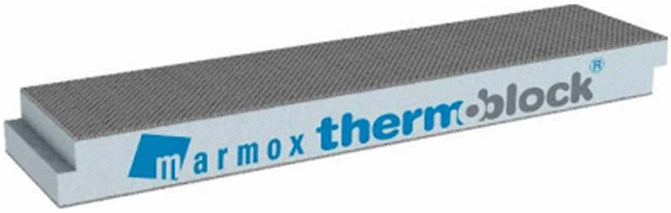
Job Reference	Job Name	Job Location

Submitted To	Submitted By

Date	Phone	Date	Phone

Introduction

Thermoblock® thermal break blocks reduce heat loss at foundation to wall transitions and roof to parapet intersections. They can also be used as a thermal break under door thresholds.



Standard Dimensions

Thermoblock® is available in the following size(s):

Nominal Dimension

TYPE	W	L	D
TBLK -1	4"	23 5/8"	2 ½"
TBLK -2			4"
TBLK -3	5 ½"	23 5/8"	2 ½"
TBLK -4			4"
TBLK -5	8 ½"	23 5/8"	2 ½"
TBLK -6			4"

Features and Benefits

- LBC Red List Free
- Thermal resistance of R 2.2 per inch
- Supports up to 1,300 psi
- Mildew, mold, rot resistant

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The Design Standard...

Thermal Resistance

The R-values detailed below are in accordance with ASTM C518 (Standard Test Method for Steady-State Thermal Transmission Properties by Means of the Heat Flow Meter Apparatus)

Thermal resistence (R-value) varies with thickness

Type	Thermal Resistance (R-value)
TBLK-1	5.5
TBLK-2	8.8
TBLK-3	5.5
TBLK-4	8.8
TBLK-5	5.5
TBLK-6	8.8

Features And Benefits

Foundation and roof perimeters are both locations in the building thermal envelope where heat is lost due to thermal bridging. Thermoblock® reduces energy lost by thermal bridging, providing continuous insulation at the base of a wall, slab edge or roof parapet intersection where insulation is normally interrupted. Thermoblock® has a thermal conductivity 2 times lower than timber and 30 times lower than concrete.

Thermoblock® can be used to support masonry, wood or steel framed walls and parapets. Unlike other closed cell, foam type thermal break materials, Thermoblock® safely transfers load without deflection or long term creep. The top and bottom material surfaces provide for a mortar bond in masonry applications.
The width of the thermoblock should not be narrower than the wall or sill plate it is supporting. The thickness and corresponding R value is chosen based on the transition or interface design and the F factor or U value requirements by energy code and climate zone.

Thermal Performance

The thermal conductivity of a material is a function of its conductance and is an important value in determining the rate at which heat flows through that material. Heat flow is also dependent on area and temperature. To be effective, a thermal break has to have a much, much lower thermal conductivity than the material it is "breaking". Since the conductance of a material is a function of its thickness, both thickness and area are important in heat flow calculations for a thermal break.

Product Data

Compressive strength	D1621	1,500 psi
Thermal Conductivity	ASTM C518	0.46 BTU/in/hr/ft^2/$^\circ$F
Water Absorption	ASTMD2812	0.24%

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