



DELTA®

SAFING MINERAL WOOL

Fire Endurance - Incombustible

DELTA® SAFING BOARD is a minimum 4 pound per cubic foot (64 kg./m³) density insulation manufactured from high temperature mineral fiber bonded together with a fire retardant binder. Its primary use is for fire containment located between the concrete floor slab edge and exterior walls in high-rise building construction. DELTA® SAFING Mineral Wool BOARD can be used as a "poke-through" fire barrier for part of a hourly-rated assembly in cracks, crevices, openings, and around penetrations.

Application

Floor slab edge installations require DELTA® SAFING BOARD to be properly supported. Stair-step shaped galvanized clips, 1 inch (25 mm) wide, or other type support brackets should be applied on a minimum of 24" (61 cm) centers. Penetrations and other types of openings in hourly rated assemblies will require additional types of support plus a fire-hose stream shield {i.e. silicone sealant} in addition to the safing insulation. Consult sealant manufacturers for specification pertaining to applicable penetrations. In ALL applications, the mineral wool must be installed in a compressed configuration to insure no gaps or cracks.

Fire Containment Test

Floor slab edge ... SAFING Application Rating = 3 Hours
Test Report No.(s): VT #100-040, VT #100-073-1, -2, and -3
Using the ASTM E 119 time/temperature curve, a 4"(102 mm) and 6"(154 mm) thick barrier of DELTA® SAFING BOARD protected so well that after three hours, cotton waste placed on the cold side did not ignite although the hot side reached 1900° F.(1038° C.).

No passage of flames or gases took place during any part of the tests which was concluded after a little over three hours with no deterioration of DELTA® SAFING's fire stopping ability.

Physical Properties: All values in () are metric conversions.

Density: weight per cubic foot (meter) .. Minimum 4 lbs./ft³ (64 kg./m³)
Thermal Conductivity: [ASTM C 177] @75°F.(24°C) mean temp. Btu in./h ft² °F.(W/m K) ... **k** = 0.238 (0.034)
Thermal Resistance: [ASTM C 177] @75°F.(24°C) mean temp. **R** = 4.17 per inch
Moisture Adsorption, Vapor [ASTM C 1104]Less than 1%
Water *wicking* resistant* and Non-hygroscopic.*
Corrosion to steel, aluminum, copper, [ASTM C665]..... None
Does not promote growth of fungi or bacteria and is mildew resistant.
Surface Burning Characteristics: [ASTM E 84]
Flame Spread Index = 0
Smoke Developed Index = 0
"Incombustible" [Underwriters Laboratories® tested per ASTM E 136]

Standard Size:

4 inch (102mm) thick x 24"(61cm) x 48"(122cm) and 24 ft²(2.23 m²) per polyethylene heat shrink package. Other thickness(s) 2" through 5" are available by special order.
NOTE: Lesser product thickness may be used providing the installed thickness of insulation measured between the **cold** side of wall and the **fire** side of the wall is a minimum 4"(102mm) when a 3 hour rating is desired. Heavier densities of DELTA® BOARD will provide equal or better fire stopping performance when installed along with the *safing* specifications.

Specification Compliance:

U.S. Federal Specification HH-I-521F, Type I
U.S. Federal Specification HH-I-558B and C
ASTM C 665-91 and ASTM C 612-93