

AEROFLEX Breathe-EZ™ EPDM Duct Insulation FAQ's

Q: Is AEROFLEX Breathe-EZ truly fiber-free?

A: Yes, duct liner is categorized by AIA MasterSpec® as “fibrous-glass”, “fibrous-glass-free”, and “flexible elastomeric”. Breathe-EZ is flexible elastomeric and fiber-free; it contains no fibers and is non-particulating per ASTM C1071 and UL181.

Q: Can Breathe-EZ be fabricated on a coil line?

A: No, Breathe-EZ consists of a closed-cell structure and is not conformable with coil lines. However, Breathe-EZ cuts beautifully with water jet machinery and sharp non-serrated insulation knives.

Q: Is Breathe-EZ suitable for lining round spiral ducts?

A: Breathe-EZ is closed-cell and not conformable. It is limited to duct diameters 12” and up; duct lengths must be short enough so center can be accessed for spray adhesive and pinning; suggested duct sizes: Breathe-EZ @ 1” thick = 12” diameter, 1-1/2” thick = 14” diameter, 2” thick = 16” diameter. The feasibility of installing Breathe-EZ in round spiral ducts must be determined by the duct fabricator.

Q: Can water-based adhesives, used for fibrous-glass and fibrous-glass-free duct liners, be used to install Breathe-EZ?

A: No, contact adhesives engineered by major HVAC adhesive manufacturers for closed-cell elastomeric insulation are recommended. Water-based adhesives take an exceptionally long time to dry due to two nearly impervious substrates – closed-cell insulation and sheet metal.

Q: Can standard 1” welded insulation fasteners (pins) be installed with Breathe-EZ 1” thick?

A: No, 1-1/8” pins are recommended and are commercially available. To meet R-4.2, Breathe-EZ 1” may be up to 1-1/8” thick. Standard 1” pins create too much insulation compression (loss of R-value), can tear the skin, and exceed SMACNA’s Duct Construction specification of 1/8” maximum pin compression for all duct liner types. For 1-1/2” and 2” thick, 1-1/2” and 2” pins are acceptable.

Q: What type of pin washers are recommended?

A: Dished, sloped, or cupped washers are recommended to prevent tearing of the skin.

Q: Are pins with heat-activated adhesive recommended?

A: Yes, the adhesive seals the hole in the insulation created during the pinning process. Although not required, pin adhesives can provide an extra level of protection by preventing water vapor from permeating beneath the liner.

Q: Why are your roll lengths only available in 10’ increments (1” @ 50’, 1-1/2” @ 40’, 2” @ 20’)?

A: Water jet tables are 10-feet long. Breathe-EZ helps duct fabricators maximize material yields and reduce fabrication time.