

BENEFITS OF K-FLEX S2S ELASTOMERIC SHEET

K-Flex USA manufactures elastomeric sheet insulation in thicknesses from 1/8 to 2 inches. With the exception of the 1/8 inch thickness, all elastomeric sheet insulation (Insul-Sheet, K-Flex Duct Liner Gray, ECO and HT) is manufactured with an extruded skin on both sides. We refer to this product as Skin-2-Sides or simply S2S.

Elastomeric closed cell foam insulation sheet materials are ideal for insulating ducts, tanks, vessels, etc. because of their excellent physical properties (k-factor, low water vapor permeability, durability, flexibility) and adhesive receptiveness.

In these applications, it is recommended that the elastomeric insulation be fully adhered to the substrate being insulated. The most common method of adhering elastomeric insulation to the substrate is with contact adhesives such as 320, 373, 420, 620, 720-LVOC (flammable, solvent based contact adhesives) or 1120 water based adhesive. For larger projects, spray applied contact adhesives can be used. Refer to technical bulletin TA14 for a listing of approved adhesives. When using S2S products, less adhesive is used and as a result the solvents flash off faster or the water evaporates faster, allowing the sheet to be applied with less waiting time.

Tests have been conducted on the adhesion qualities of the skin versus no skin. In all cases, the failure was limited to the foam (foam tear), the adhesion strength was higher than the material's strength. Typically, peel strengths of 4 – 5 lbs / inch are obtained. This was also found to be true with factory-applied pressure sensitive adhesive (PSA).

By using an S2S product, the contact adhesive is always applied to a skin surface, thus allowing for less adhesive to be used and faster tack times. A skin side is always directed outward for improved aesthetics.

Since the product has a skin on both sides, either side can be considered a “good” side for appearances. When fabricating the product, the installer does not have to be concerned about which side is facing outward. This allows the installer better utilization of the sheet, maximizing yield. In some applications this may result in reducing scrap by as much as 15%. Additionally, if one side is damaged, the other side can be used as the outer surface.

K-Flex S2S sheet and roll products save time and materials.

