



ASTROBOARD



ASTROBOARD Insulation System consists of a “nominal” layer of 2.2lb density Polystyrene foam, sandwiched between a highly reflective film surface on one side, and a white polyethylene UV protected film on the other side. It is ideal for retro-fitting existing metal building, ceilings and walls as well as for insulating in new construction. It can be applied in conjunction with other insulating materials to improve thermal performance to meet building codes, or as a stand alone installation for both thermal and condensation protection.

Adding ASTROBOARD to your building improves the insulation value of the building envelope and can significantly increase its energy efficiency. All ASTROBOARD products are classified as Class 1/Class A in accordance with the UL 723 & NFPA-286 fire test standard; UV inhibitors help provide a durable and lasting finish.

Sizes Available:

- ASTROBOARD 24"x60"
- ASTROBOARD 48"x96"
- ASTROBOARD 48" X 50' FAN FOLD @ 2'
- ASTROBOARD F-Trim 120"
- ASTROBOARD H-Trim 122"

ASTROBOARD End Panel H-Trim 122"

Features:

- Class 1/Class A fire rating per UL 723 & NFPA 286
- 95% Reflectivity for optimal thermal performance
- Radiant and vapor barrier all-in-one
- Neat, UV resistant, washable finish

PHYSICAL PROPERTIES	TEST	REFLECTIVE / POLYSTYRENE FOAM / WHITE POLY
Nominal Thickness	--	1/4" 3/8" for Fan Fold
Foam Density	--	22pcf
Fire Rating -- Surface Burn	UL 723	CLASS 1 / CLASS A
R-Value (calculated)	4" Average Air Space	R-8.79 (HEAT FLOW DOWN) R-4.62 (HEATFLOW HORIZONTAL) R-4.25 (HEAT FLOW UP)
Emissivity	ASTM C-1371	0.05
Reflectivity	ASTM E-903	0.95



INSTALLING AstroBoard IN PRE-ENGINEERED METAL BUILDINGS

STEP 1: Be sure that all surfaces are clean of debris and dust as proper adherence is integral to the efficiency of the IE AstroBoard Insulation System.

STEP 2: Begin adhering the F-Trim (RPT-F-120) to the vertical face of the purlin, adhering a 1/16" bead of Bull Seal (1-41-12-001) to the large back flange of the F-Trim. Attach to purlin at height that gives least resistance of any existing obstructions in the cavity, i.e. angle iron, junction boxes, screws, conduit, etc. Butt each piece of F-Trim to each adjacent piece to keep it as seamless as possible and to ensure a proper seal. *(F-Trim can also be attached with metal screws)*

STEP 3: Once all F-Trim is adhered to the full perimeter of each purlin or girt cavity let set for a minimum of 4 hours, but **recommend a 24 hour period** before installing board and H-Trim (RPT-H-122).

STEP 4: After allowing proper curing time for the F-Trim begin the installation of the Panels (RPB-24-060) and H-Trim. Take measurements from side to side in current purlin cavity. In cavities of greater distance than 36" add 1/4" to the measurement to the length of both the Panel and H-Trim. (ex. Cavity is 50" wide, cut Panel H-Trim to 50 1/4")

For the gable ends, cut Panel and H-Trim to exact length i.e. cavity is 50" Panel and H-Trim should both be cut to 50"

STEP 5: Before inserting a Panel and H-Trim into the channel of the F-Trim apply a 1/16" bead of Bull Seal into the channel of the F-Trim. This will chemically bond the Panel and H-Trim to the F-Trim.

STEP 6: When inserting Panels, except for gable end pieces, introduce an arching effect to the Panel. The arch needs to be deflected upward towards the exterior of the building. Creating the arch will give the system more structural integrity and improves the aesthetics of the finished installation.

STEP 7: Insert first gable end piece into all 3 pieces of F-Trim for a 'snug' fit.

STEP 8: Begin inserting and connecting adjacent boards until the final gable end piece.

STEP 9: Use the End Panel H-Trim (RPT-HE-122) to install the final gable end. When inserting last piece of board allow at least 1/8" but no more than 1/4" of space between gable board and adjacent board. This allows sliding the End Panel H-Trim into place. Once the End Panel H-Trim is in place; place a 1/16" bead of Bull Seal to the End Panel H-Trim to adhere it to final gable board.

SPECIAL CONSIDERATIONS: Areas where F-Trim is to be adhered must be free from dirt, dust, oil, or grease.

INSTALLING AstroBoard IN POST FRAME BUILDINGS

Installing the IE AstroBoard system in buildings with wood trusses and purlins can be accomplished by following the same steps for pre-engineered building instructions. Additionally it can be installed by affixing the Panel to the underside of the purlins with staples 3/4" long crown, cap nail or screws with washers. H-Trim should be used to connect Panels or Seams could be covered with a white tape to provide a finished appearance. Edges at the trusses can be finished with white quarter round.

NOTES: Existing pre-engineered metal buildings typically have utilities hanging from the ceiling or attached to the walls. The IE AstroBoard system makes it possible to leave most if not all of the existing items in place, reducing the down time of the facility and equipment. The system can be customized to fit most any situation regardless of obstructions in place. The IE AstroBoard system is an excellent option for post frame construction as well as pre-engineered metal buildings.

AstroBoard is an excellent choice to cover pre existing insulation to add thermal value to the building, cover degrading material or to enhance the appearance.

CAUTION: AstroBoard is intended for use in completely enclosed buildings and should never be used in open wall structures. If doors will be left open for prolonged times, special consideration should be given to the mounting of the Panels. Wind currents could cause the Panels to flex and loosen from the mounting and fall away.

HELPFUL TIPS: Call for specific onsite questions.

Make sure the systems perimeter is properly sealed. Improper sealing can result in moisture build up and inefficient insulating values of the system.

IE reserves the rights to make changes to components of system at any point in time.

Contact Innovative Energy Inc for most up to date components.