

#12 Purlin Fastener

Product Description:

The #12 Purlin fastener is designed to secure membrane to structural steel purlins in a metal roof retrofit application. It is used in conjunction with the IB 3" isoweld® plate and 2-3/8" barbed seam plates.

Sizes:

3-3/4" - 6-3/4"

*Special order (See table)

Packaging:

The fasteners are pre-packaged in a plastic bucket. See table for quantity and weights. Includes one #3 square bit.

Features:

- Shank diameter is smaller than that of the drill point and the outside thread diameter
- 24 threads per inch provides greater pull-out values
- Steel thickness: 18 ga (.045" nominal) through 1/4" (.250")
- E-coat
- 3.375" thread length (measured from tip of drill point to end of threads)

Application:

The #12 Purlin fastener must penetrate through the steel purlins a minimum of 1". Using a screw gun, drive the fastener until a slight depression is seen around the plate, or with very rigid insulation boards, watch for the plate to dimple. Note: Care must be taken not to overdrive the fastener and fracture the skin of the insulation.

Approvals:

- Factory Mutual (F.M.)
- Miami-Dade County (MD)
- Florida Building Code (FBC)



Fastener Length	Insulation Thickness	Packaging	Weight
* 3-3/4"	Up to 2-3/4"	1000	33 lbs.
* 4-3/4"	1-1/4" to 3-3/4"	1000	41 lbs.
* 5-3/4"	2-1/4" to 4-3/4"	1000	48 lbs.
* 6-3/4"	3-1/4" to 5-3/4"	500	28 lbs.

Fastener Properties:

Head: #3 square, pancake head
 Head Height: .110"
 Head Diameter: .445"
 Thread Major Diameter: .207"
 Shank Diameter: .179" nom

Strength (lbs ult.):

Tensile: 2300
 Torsional: 100 in-lbs min

Pull-out (lbs avg.):

18 ga (.045): 375
 16 ga (.060): 599
 14 ga (.075): 869
 12 ga (.104): 1477
 3/16" (.188): 2300*
 1/4" (.250): 2300*

* Denotes tensile failure of fastener (fastener failed in tensile before pulling out of substrate)