Kinetic 40 Years

SOLAR RACKING AND MOUNTING

The common sense solution

KINETIC SOLAR AWNING INSTALLATION GUIDE

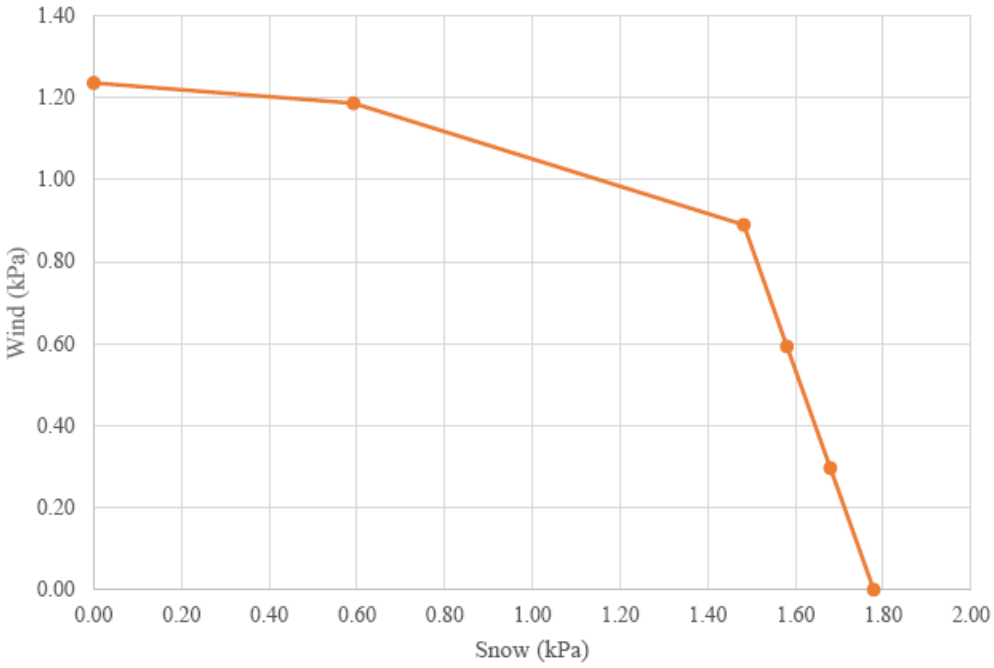
Kinetic Solar Racking & Mounting

1. Awning Installation Instructions

1.1. Install Steel Awning Brackets to the Wall

a) Determine desired location of the Awning Brackets and mark each position
   a. The chart below shows the maximum allowable wind and snow for a 48” space between brackets (Centre to centre) and a 19” cantilever on the ends
   b. The table below shows the maximum allowable wind and snow load as well as the recommended spacing

b) Using fasteners of choice, attach the awning brackets to the wall in marked locations



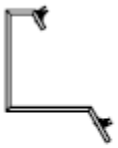
1 - Allowable Base Wind and Snow Loads at 48" Spacing

Load Scenario	Description	Max. Spacing	Max. Cantilever
1	snow load of 2.5 kPa and wind load of 1.0 kPa	30 in. (762 mm)	12 in. (304.8 mm)
2	snow and wind load of 2.4 kPa	22 in. (558.8 mm)	10 in. (254 mm)

1.2. Install Rails Using L-Brackets

a) Use the 2” L-Brackets to mount the rails to the top of the constructed support at the spacing recommended by the module manufacturer. There are two holes in the bottom of the awning bracket, one corresponding to an average 60 cell module and one for a 72 cell

72 Cell Solar Module Configuration



60 Cell Solar Module Configuration

b) Use the supplied L-Bracket hardware to secure them in place. Install the bolt and flat washer on the upper side of the L-Bracket and the flat washer, lock washer and hex nut on the underside.
c) Once the rails have been set, fully torque the L-Brackets to 12 ft-lbs
d) Attach the rails as per the standard K-Rack installation procedure. If you are unfamiliar with this procedure please contact your distributor for a copy of the installation instructions

1.3. Mount Solar Modules

a) Position module on the rails (make sure to hold modules securely until properly fastened)
b) Ensure the first module is square before continuing, as this will affect the squareness of the array.
c) Insert the K-Nut of the End-Clamp assembly into the top channel of the rail. Insert K-Nut of the Mid-Clamp assembly into the top channel of the rail.
d) Slide clamps into place against edge of panel
e) Tighten clamps to hold module in place (do not fully torque)
f) Repeat steps 1-4 as required for remaining modules
g) torque clamps to 12-18 ft-lbs (16.3 – 24. 4 N-m)