

Bolt
.25" x 6.5"



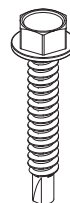
Bolt
.625" x 1.5"



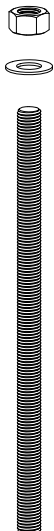
Bolt
.625" x 7.5"



Self Drilling Screw
.25" x 1.5"

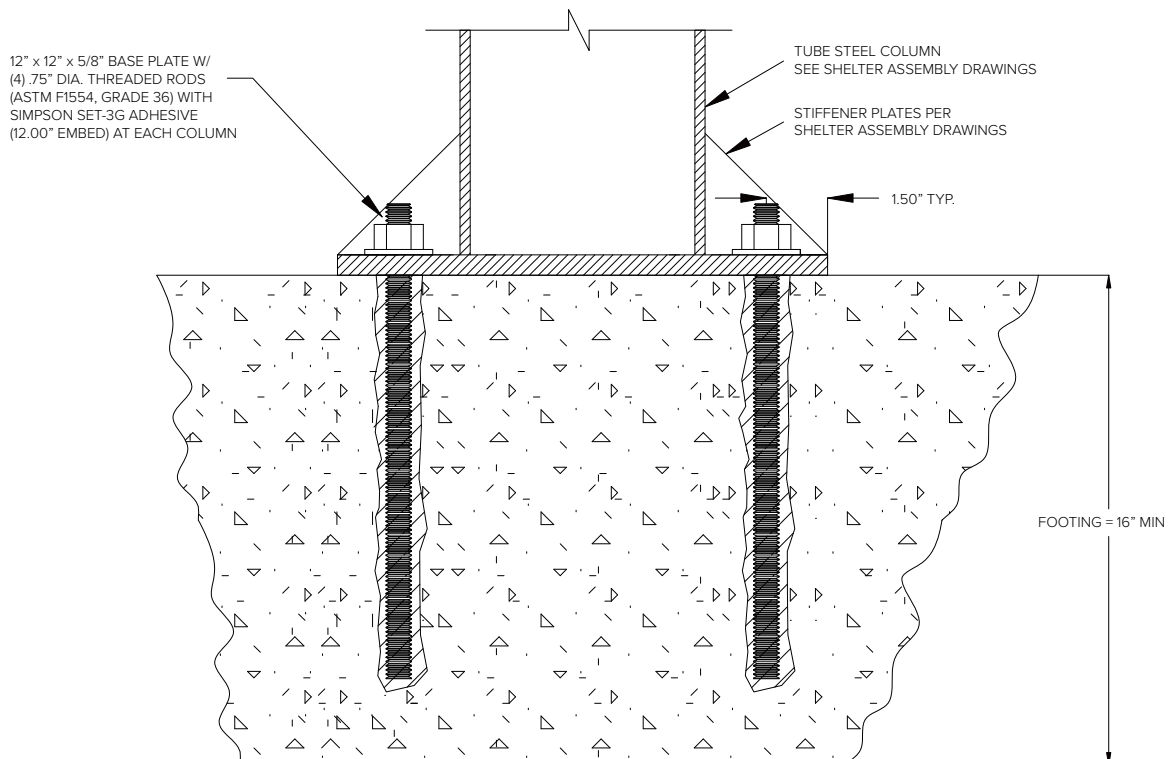
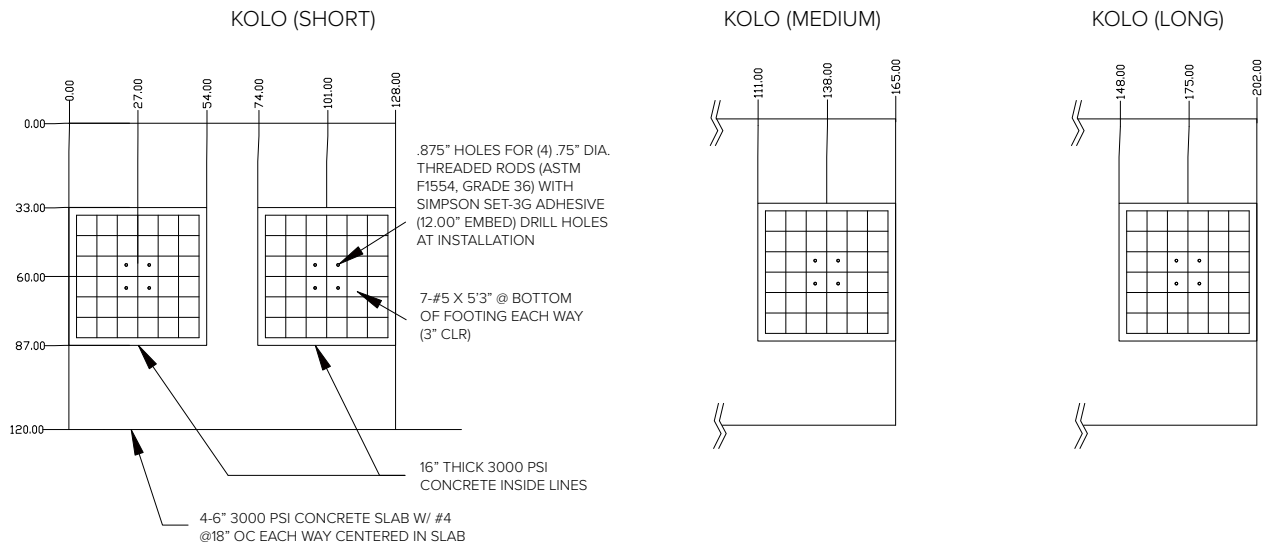


Threaded Rod
.75" x 14"



GENERAL STRUCTURAL NOTES:

1. FOOTING CONCRETE STRENGTH = 3000 PSI
 2. REBAR STRENGTH = 60 KSI (ASTM A615, GRADE 60)
 3. THREADED RODS = 36 KSI (ASTM F1554, GRADE 36)
 4. ADHESIVE = SIMPSON SET 3G. NOTE THAT SPECIAL INSPECTION OF BOLT INSTALLATION IS REQUIRED PER IBC 2015.
 5. FOOTING SHALL BE PLACE ON WELL COMPACTED AND FREE DRAINING SOIL.
 6. DESIGN PER IBC 2015, RISK CATEGORY 1
- SNOW: 60 PSF GROUND SNOW
WIND: 105 MPH, EXP. B
SEISMIC: DESIGN CATEGORY A-C




TOOLS NEEDED

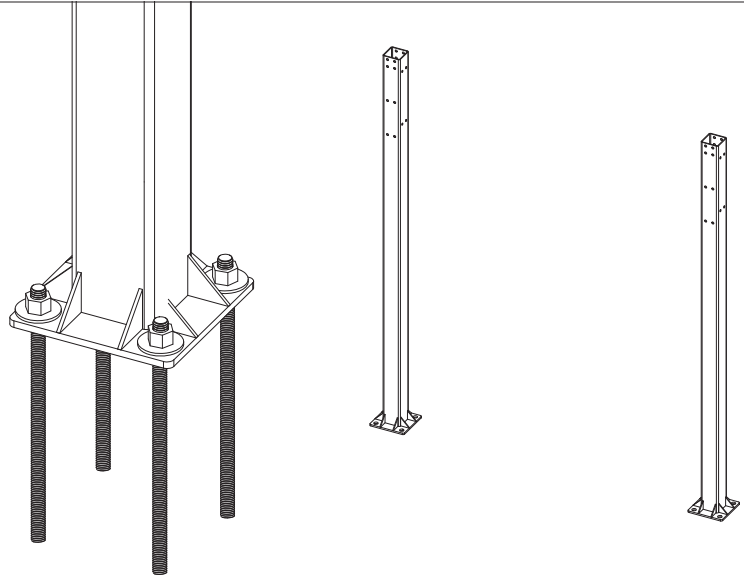
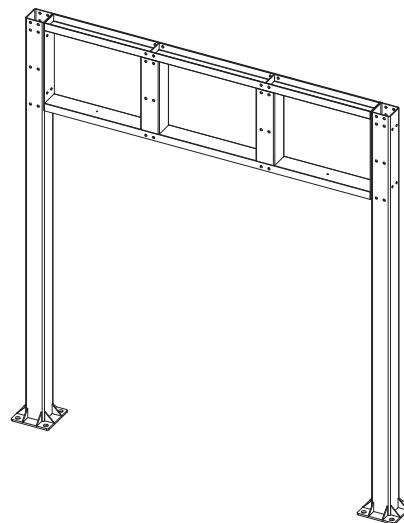
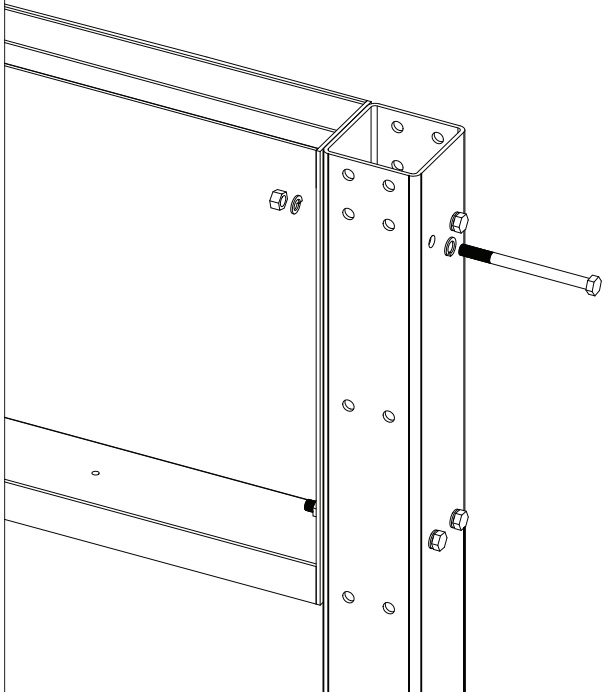
Tape Measure
 Marker or chalk
 Level
 Sledge Hammer
 Rubber Mallet
 Large Hammer Drill
 Standard Drill

3/8" Socket with drill attachment
 7/8" Diameter Masonry Bit
 3/4" Wrench/Socket
 15/16" Wrench/Socket (2)
 11/8" Wrench/Socket
 11/4" Wrench
 Spud Wrench

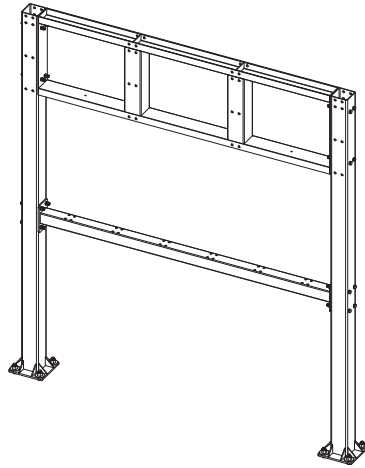
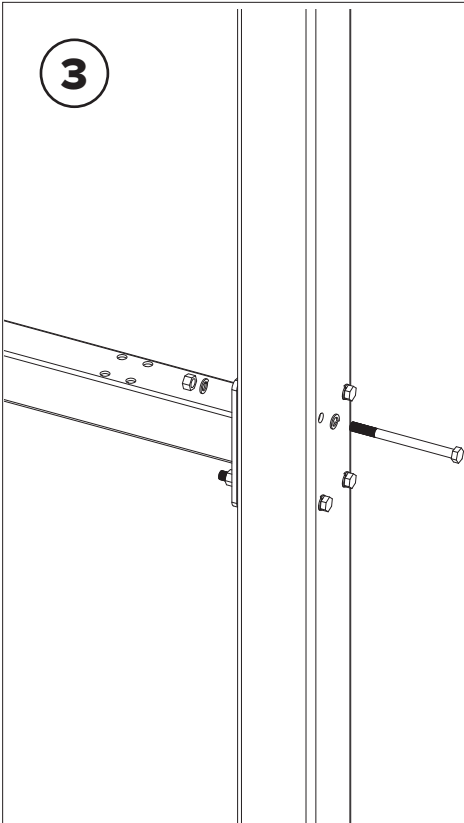
1

Place Uprights based on footing diagram and drill (4) 7/8" diameter holes in concrete 12" deep for each Upright. Arrange special inspection of anchor holes and anchor/epoxy installation per IBC 2012. Consult Simpson Set 3G epoxy instructions for further detail.

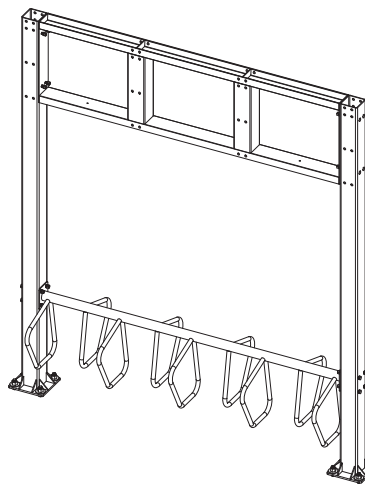
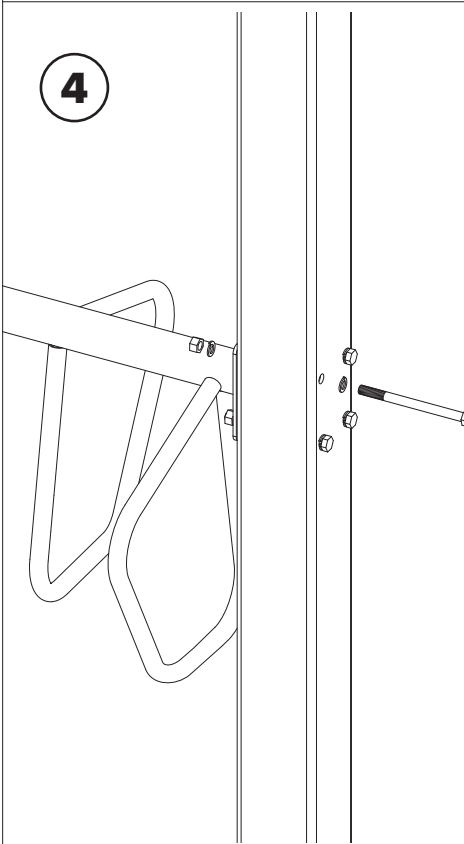
After inspection a sufficient epoxy cure time, the Uprights may be placed over the threaded rod and secured with washers and nuts finger-tight.


2


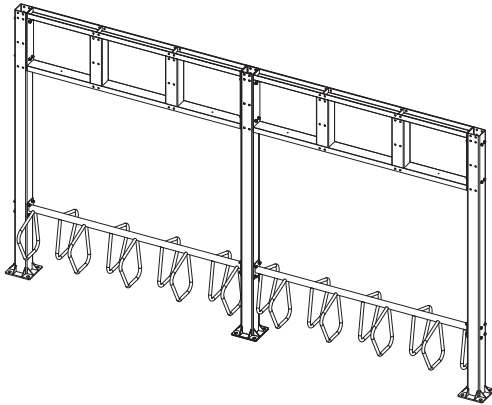
Lift the Center in place and fasten finger-tight with (8) 5/8" x 7.5" bolts, lock washers and nuts.

3

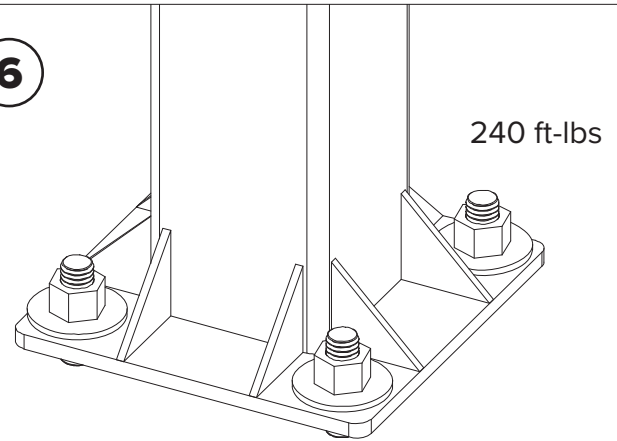
If building a Kolo shelter with Dero Decker racks, lift the Dero Decker Beam in place and fasten with (8) 5/8" x 7.5" bolts, lock washers and nuts.

4

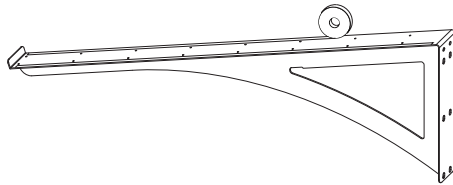
If building a Kolo shelter with Dero Decker racks, lift the Dero Decker Beam in place and fasten with (8) 5/8" x 7.5" bolts, lock washers and nuts.

5


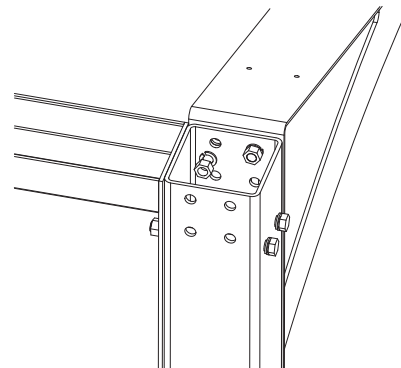
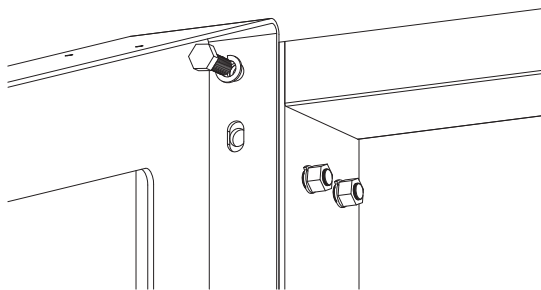
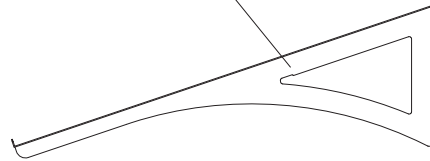
If building a modular system of Kolo shelters, continue to place and fasten Uprights, Center Weldments, and Dero Decker Beams/Campus Racks.

6


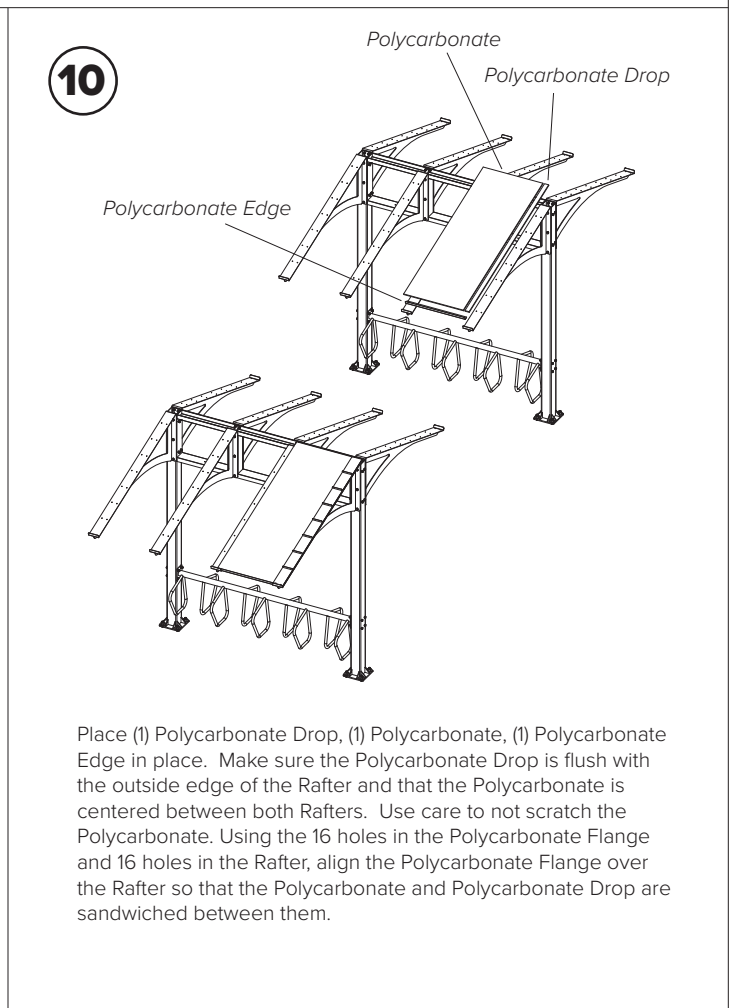
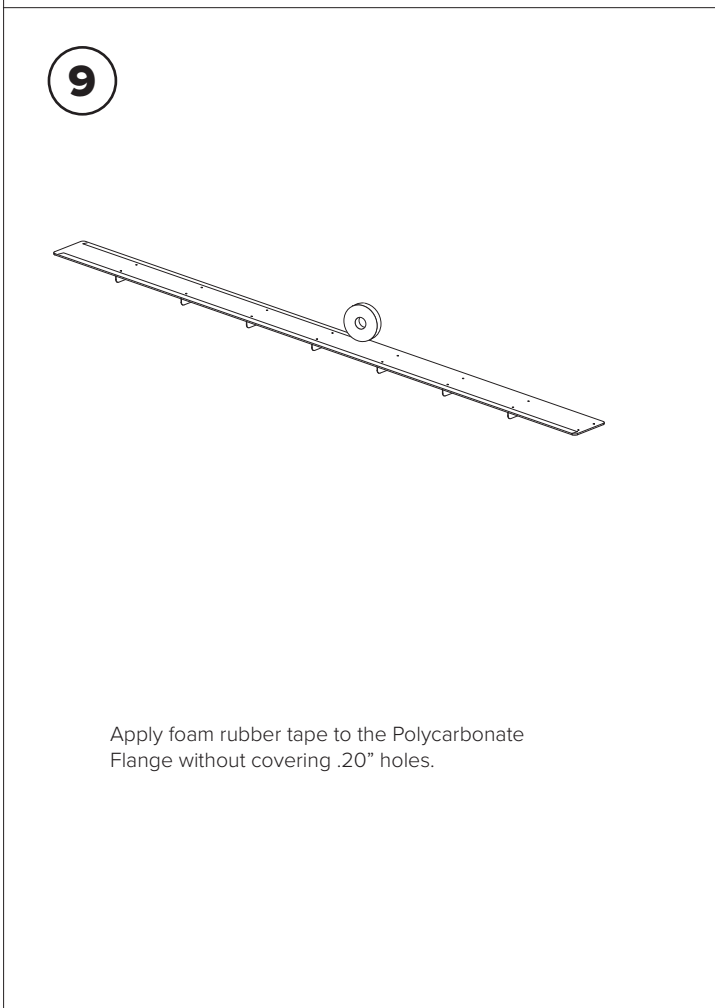
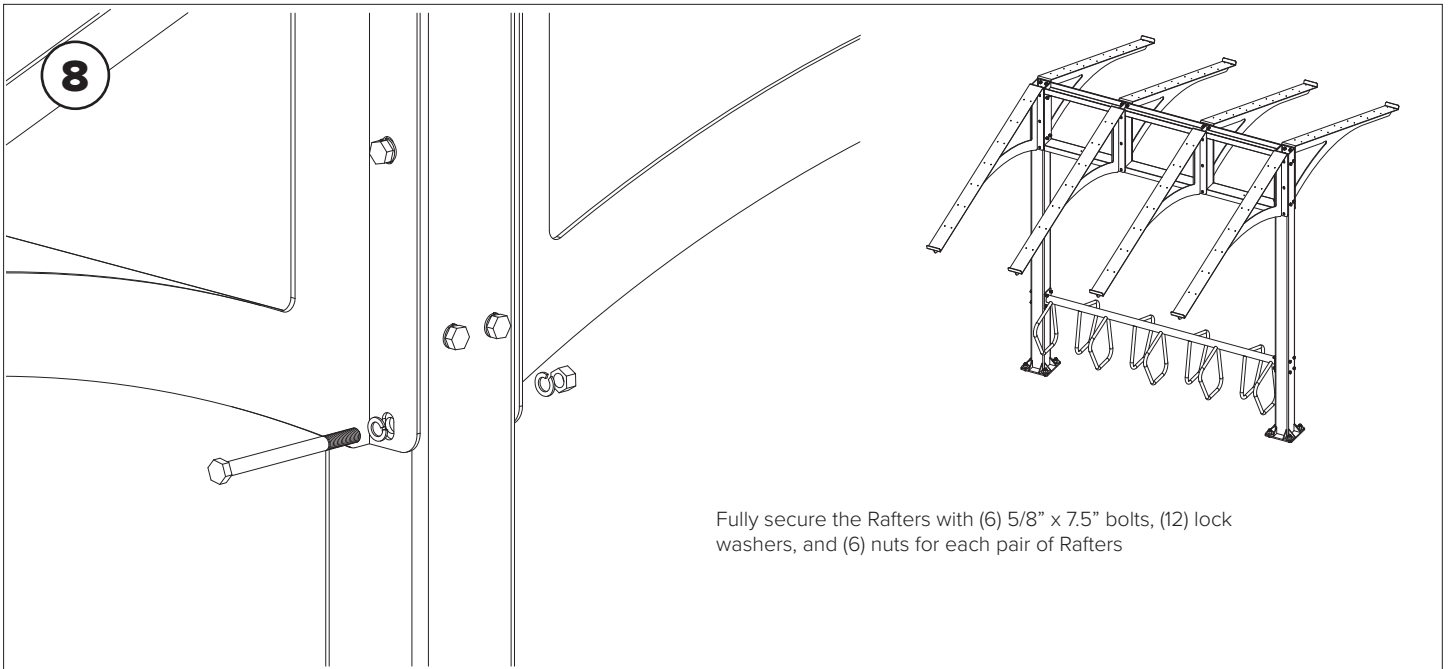
Fully tighten all bolts and nuts. Then tighten Simpson Torq-Cut anchor nuts to 240 ft-lbs.

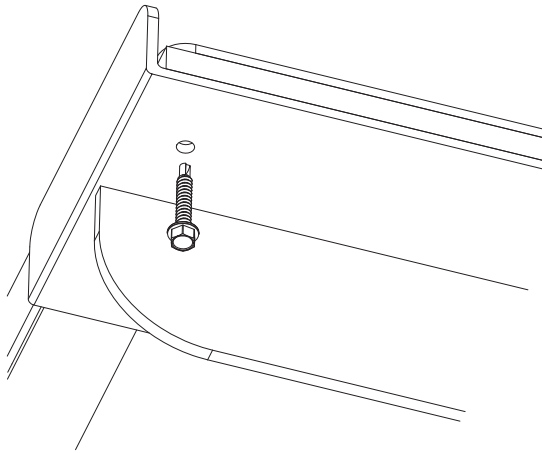
7


Center of Gravity Notch

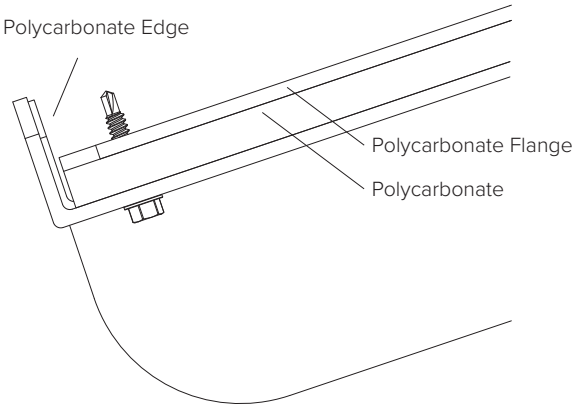


Apply foam rubber tape to the Rafter without covering .30" holes. Working from one end of the shelter to the other, lift a Rafter into place using a lifting strap. Secure the lifting strap at the rafter's center of gravity which is indicated by a notch at the apex of the Rafter cut-out. Once the Rafter is in place, fasten the rafter to the Upright with (2) 5/8" x 1.5" bolts, (4) lock washers, and (2) nuts using the two upper-most holes. Continue to fasten all remaining Rafters with the above method.

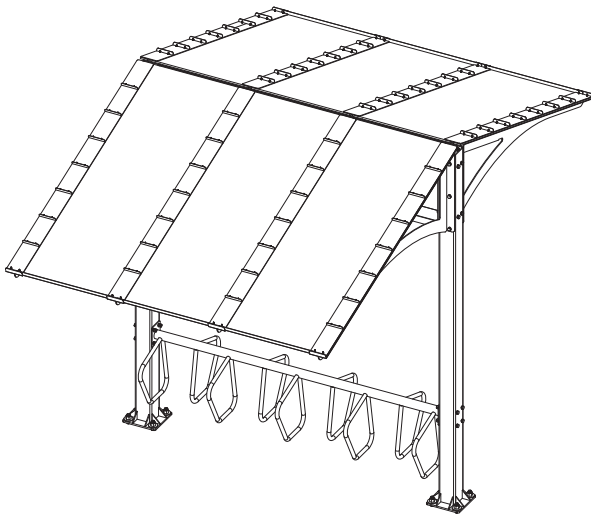


11


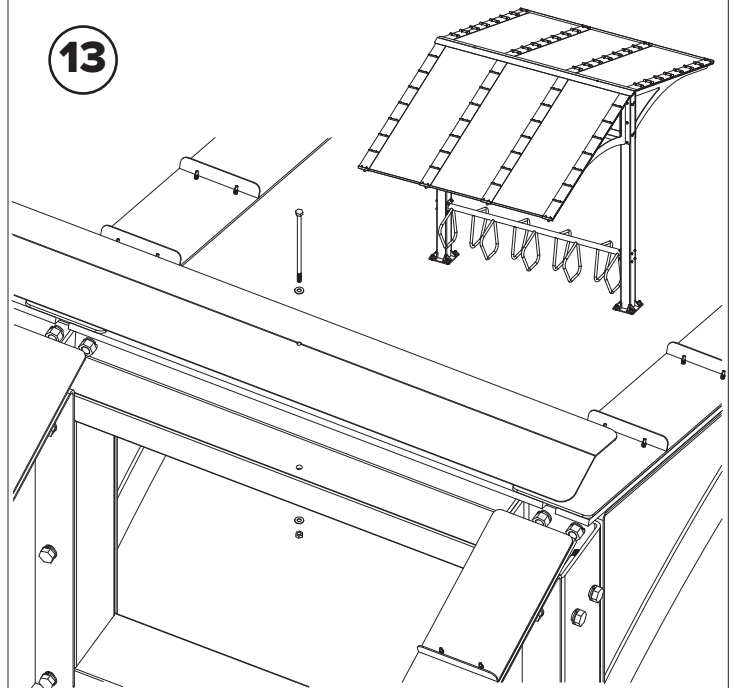
Polycarbonate Edge



Starting at the holes furthest from the shelter center, secure the Polycarbonate Flange with (16) 1/4" x 1.5" self-drilling screws. It is recommended that the assembly be clamped together while fastening the first two screws. The self-drilling screws will pass through the Rafter, drill through the Polycarbonate, and tap through the Polycarbonate Flange.

12


Continue installing the remaining Polycarbonates, Polycarbonate Drops, Polycarbonate Edges, and Polycarbonate Flanges.

13


Place the Roof Cap on top of the shelter and secure with (2) 1/4" x 6.5" bolts, (4) washers, and (2) lock nuts. Do not over-tighten to avoid bowing of the Roof Cap.