

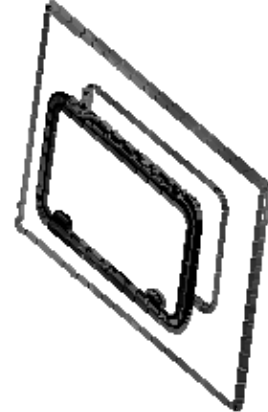


Arctic Tern Cargo Door Installation Guide

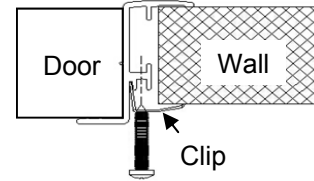
Thank you for purchasing an Arctic Tern Cargo Door from Tern Overland! We hope you have a great experience installing and enjoying the Cargo Door for years to come. Here are some tips and guidance. Please review before installing.

General Information: The door is held in the wall with a combination of metal clips and a high strength polyurethane adhesive such as Silaprene® SolidBond™ distributed by Tern Overland. Four different sizes of clips are available to accommodate wall thicknesses from 30mm to 52mm (2"). Be sure to order the correct clips for your installation. If the door is being installed in walls thinner than 30mm or thicker

Step 1: Mark and cut the door hole. The door may be removed from the door frame to make this step easier. To remove the door, carefully pry out the plastic plugs on the top and bottom of each hinge. Use a suitable punch to drive out the hinge pins. With the door removed, the aluminum frame may be held against the wall for marking. The hole should be close to the size of the door and should not exceed the door size by more than 3mm. Generally, the cut hole is the hatch size plus 2mm, and the corner radius is 71mm. Example: 300x600 hatch = 302mm x 602mm. Cut the hole using a suitable saw for your wall material. Masking tape should be used to protect surrounding areas from the saw base. Note: for FRP composite panels, no additional framing is needed inside the wall. It is recommended to seal the cut edge of the composite with gelcoat or some suitable sealant. Other wall construction may require additional framing in the wall to support the door.



Step 2: Re-install the door into the frame and test fit. Use the clips provided and the screws to secure the door in the wall. The clips fit into the narrow section of the channel, and the screws fit into the wider section. Pre-drill pilot holes into the channel for the screws. There should be 2 clips at each corner, one just beyond the hole radius on each side. After the corners, clips should be positioned about every 300mm (12"). Snug down the clips.

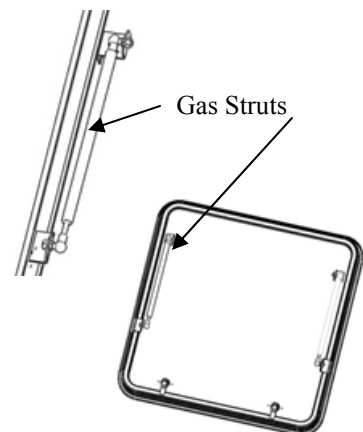
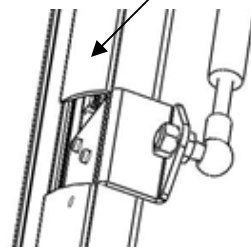
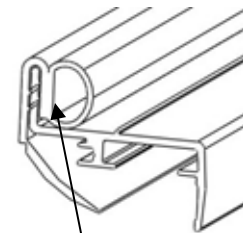


Step 3: Close the door and make sure the gap around the door is even. If the door is not square and even in the frame, use small wooden blocks to keep the two aligned. Loosen and snug the clips until the door is properly fitted. Check the function of the door for smooth operation.

Step 4: Glue the door into place. We recommend Silaprene® SolidBond™ distributed by Tern Overland, Sikaflex 252 or equivalent adhesive, & appropriate clean up solvent. Remove the clips and carefully remove the door assembly. Clean all the glue surfaces with alcohol. Apply a generous bead of adhesive to the door flange. Allow enough adhesive for a good squeeze out. Set the door into the wall and install the mounting clips. Snug the mounting clips to achieve approximately 1mm of adhesive thickness between the door flange and the wall. No less! Do not over tighten! Close the door and triple check that the spacing between the door and the frame is even. Remove any excess adhesive. Leave the door closed. Do not disturb until the adhesive has

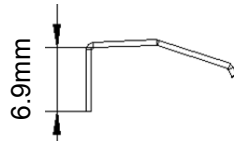
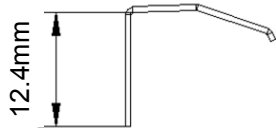
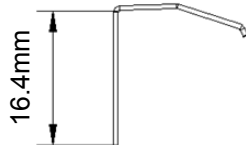
Step 5: After the door is installed, you may install the inner rubber seal. This is supplied uncut, since final trimming must be done. Begin pushing the trim onto the inner flange of the door frame at the middle of the bottom. Bend the trim just enough to make the corners. Make sure the trim is pushed fully into corners as you go. No adhesive is needed. If your hatch included gas struts, you will need to trim away the inner lip to fit around the gas strut brackets. Do not cut the entire trim! You only need to notch out the inner lip! When you reach the beginning, cut the trim with a pair of tin snips so that the two end meet closely. A dab of 3M Super Black weather strip adhesive may be used to join the two ends if desired.

Notes: The trim has metal clips molded inside to grip the flange firmly. If these clips get spread open, you can carefully squeeze them back together with pliers. This may be needed at the corners. A plastic mallet is helpful for setting the trim onto the flange.



Step 6: Have a helper hold the door while you install the gas struts. The gas cylinder should be attached to the door, and the rod to the frame. This ensures proper lubrication and sealing of the strut. The strut should be installed on the inside of the frame bracket, away from the sealing flange, and on the outside of the door bracket, toward the sealing lip. This gives a straighter alignment of the strut and does not obstruct the opening.

Clean the door with a cleaner or polish suitable for powdercoating. We highly recommend NOVUS products. You can find out more on our website or give us a call to order.

Wall Thickness	Clip #	Clip Length
30 - 36mm	Clip 1	
37 - 41mm	Clip 2	
42 - 45mm	Clip 3	
46 - 52mm	Clip 4	