

INSTRUCTIONS for the SCHOONER Aluminum Stake Pocket Truck Rack
WARNING: Do NOT attempt to install or use this rack without following all instructions.

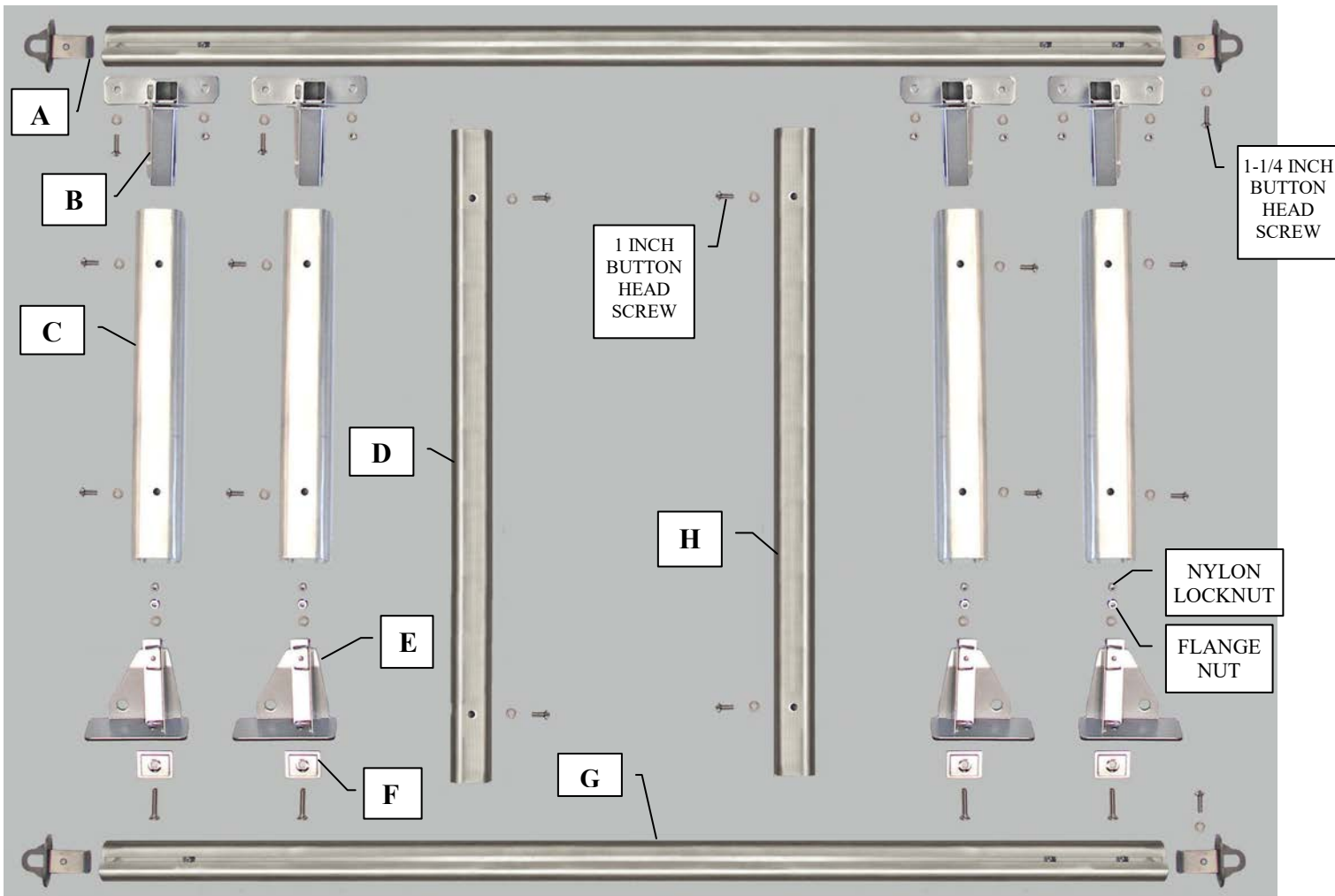
SPECIFICATIONS and SAFE LOADING REQUIREMENTS

The Schooner Aluminum Stake Pocket Truck Rack is intended to carry ladders and other cargo not exceeding 500 lbs and ONLY on pick-up trucks with stake pockets. **This rack is designed to carry loads, which are spread across the width of the support spans and shared evenly between the front and rear spans. It is not designed to carry loads where a force of over 100 lbs. is concentrated on any space less than 12 inches wide along either span or where a force of over 250 lbs overall is loaded on either span. This product is not warranted for use off-road or on unimproved or poorly maintained or bumpy roads, nor is warranted when used contrary to instructions or specified uses.** U.S. Rack does NOT warrant any automotive product and does not warrant truck bed rails against damage or failures caused by the weight of excessive loads being applied to them when the rack is installed on a vehicle. **U.S. Rack is not responsible for injury or property damage resulting from the rack being improperly installed or improperly loaded, nor is it responsible for injury or property damage resulting from loads or parts of loads falling or being blown off a vehicle.** Loads extending beyond the rear bumper of the vehicle must be designated with a red flag during daylight or red light during darkness in accordance with the state vehicle code. Ensure that neither the rack nor any cargo blocks the view of tail or brake lights from rear.

BE SAFE: Carrying any load can be hazardous. All loads must be tied down securely to the rack to prevent them from vibrating or sliding forward, backward, laterally or being blown off or broken by unexpected wind or road hazards such as potholes. Check each time you install the rack, load the rack, as well as daily to ensure that all connections are tight. Periodically check welds for cracking caused by metal fatigue. Avoid roll over by ensuring that loads are not top-heavy. High loads must be transported with GREAT CAUTION to prevent loads from striking low overhead objects or tipping during turns, abrupt stops, or high winds.

INVENTORY

Your safety is paramount. Before assembling the rack, inventory and inspect all parts. Visually check each part to ensure it corresponds to the inventory list and check all welds for signs of cracking or weakness. Manufacturing and shipping mistakes can happen. If you think you have received the wrong product for your model truck, if you do not have all the correct parts, or if any parts appear to be defective, STOP and do NOT install the rack. Also, these instructions are NOT for the 2001-2006 model Toyota Tundra; other instructions are available for it.



- A. Side Rail End Cap (x4)
- B. Top Connector (x4)
- C. Leg (x 4)
- D. Front Crossbar (x1)
- E. Base (left x2) and (right x2)
- F. Stake Pocket Insert Plate (x4)
- G. Side Rail (x2)
- H. Rear Crossbar (x1)

Additional Hardware: 3/8-16 x 1" button head cap screws (x12); 3/8-16 x 1.25" button head cap screws (x4); 3/8-16 x 1" carriage bolts with attached 1/2 x 7/8" metal washer (x6); 3/8-16 x 2.5" carriage bolts (x4); 3/8-16 flange nuts (x4); 3/8-16 nylon lock nuts (x8); 3/8 x 7/8" metal washers (x24); Allen wrench to fit the cap-screws.

NOTE: Some screws, washers, and nuts may be attached to other parts.

ASSEMBLY

Read ALL instructions through once BEFORE you do anything!



Make assembly and disassembly easier by greasing your screws with the grease packet.

Figures 2 and 3, below, show an overview of how the parts of this rack fit together.

FIG. 2

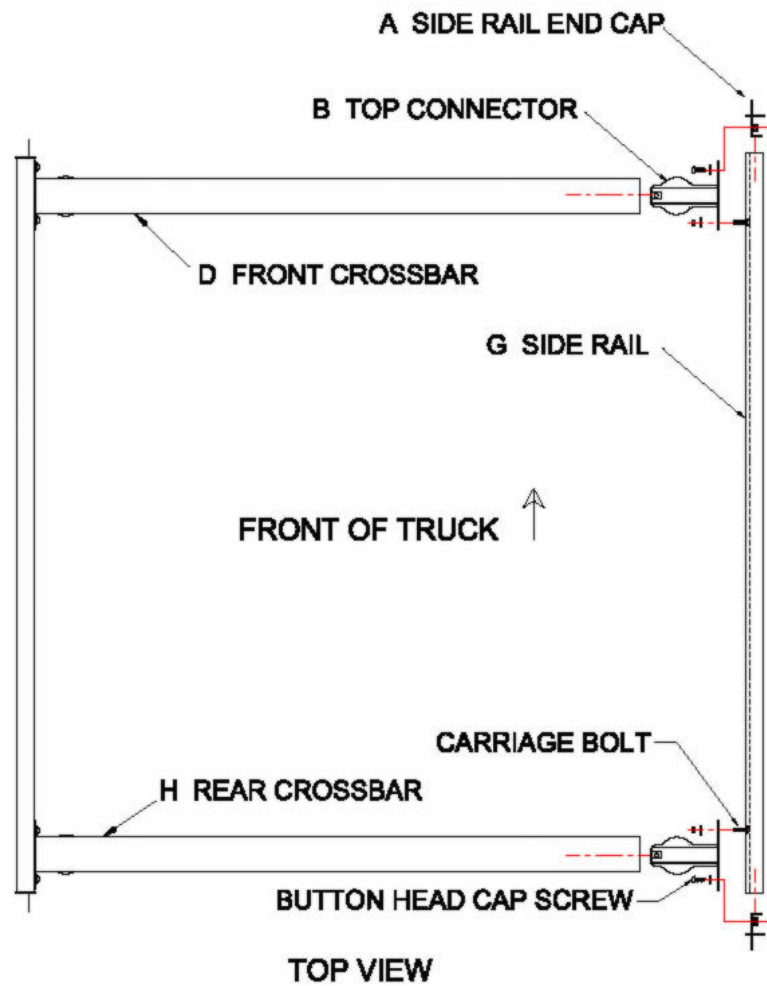
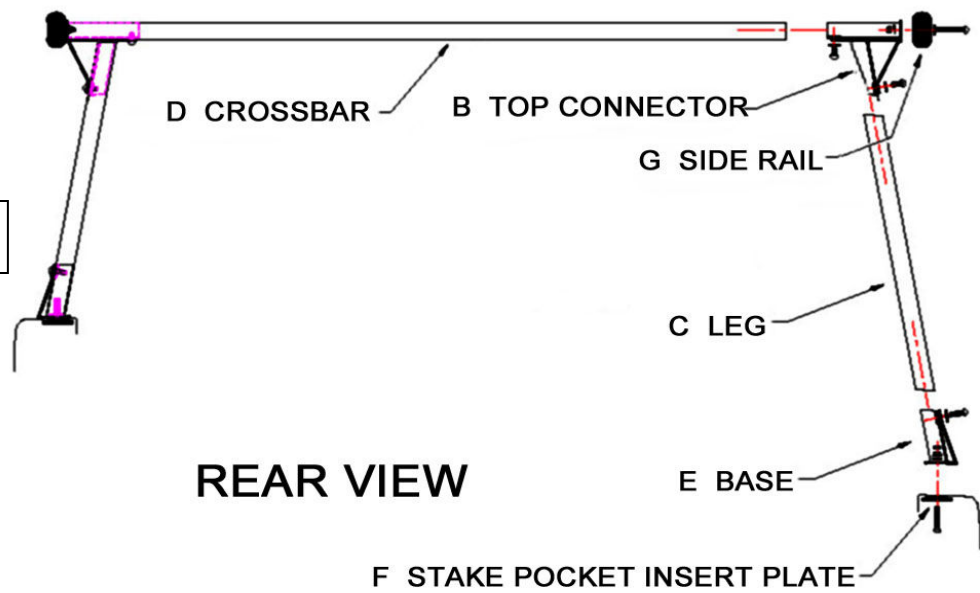
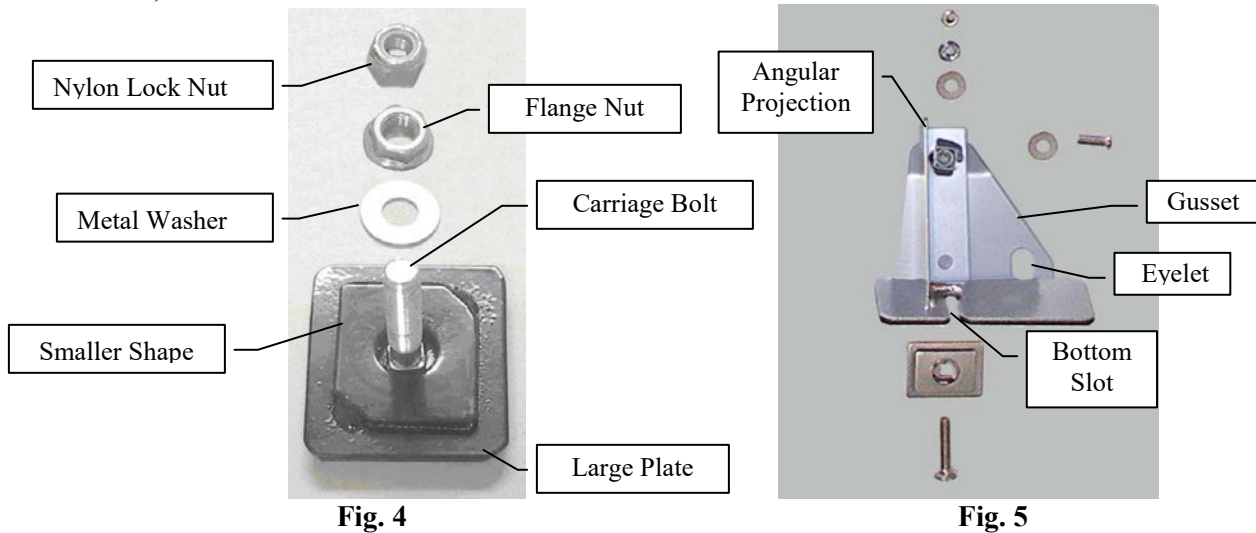


FIG. 3



1. **Examine the Bases.** Notice that there is a threaded hole in vertical part of the Base (F). If it contains a screw and washer, remove them for now.



2. **Examine Stake Pocket Insert Assembly.** Referring to Figs. 4 and 5, notice that the assembly contains a carriage bolt, metal washer, flange nut, and a nylon lock nut. These parts should always be assembled in this order. Examine the Pocket Insert Plate (F) and notice that it consists of a rectangular plate with a square hole upon which a smaller shape is welded. The proper orientation of this assembly is to have the smaller shape on top of the larger plate with the carriage bolt inserted from the bottom. When you receive your rack, the Pocket Insert Plate, washer, and nuts may already be attached to the Base, but if not, assemble them in the order shown in Figs. 4 and 5. This is how the parts will appear when being inserted into the stake pocket. The flange and nylon lock nuts will be screwed onto the end of the screw but not tightened until after the Insert Plate is seated in the stake pocket.

INSTALLATION

3. **Install Bases.** Park your truck in a safe and level place. To install the Bases on your truck you must first install the Stake Pocket Inserts. First make sure the parts of the assembly are screwed together in the order shown above with the nuts just screwed onto the end of the carriage bolt. As shown in Figs. 6, 7, and 8 grasp the washer and nuts of the assembly so the Plate is suspended from the carriage bolt. Tilt the plate diagonally and insert it into the stake pocket.



Fig. 6



Fig. 7



Fig. 8

Ensure that the larger portion of the plate is fully seated inside the pocket and the smaller raised portion of the Insert fits and is seated within the profile of the rectangular hole. It is **critical** that the raised portion of the small plate fits within this profile and that no edge of the larger plate is visible from above, even when the plate is moved around within the profile of the pocket. This will ensure that when the nuts are tightened the carriage bolt and plate cannot spin, slide to one side, or come out of the pocket.

Examine the Bases (E) and notice that there is an angular projection welded to the bottom of the Base and that a vertical gusset with an oval shaped eyelet is formed in the gusset. This eyelet is used as a tie-down point when using ratchet straps or ropes to tie down cargo on your rack. The eyelets in the gussets should be oriented so that they face each other (the eyelet in each of the rear Bases face toward the cab and the eyelet in the front Bases face toward the tailgate). To install the Base place it on the truck bedrail and orient it so that the slot formed in the bottom of the Base is aligned with the bolt projecting up out of the stake pocket as shown in Fig. 9. Slide the Base forward so that the bolt passes into the slot with the washer and nuts above the bottom of the Base as in Fig. 10. After the Base has been pushed forward, spin down the flange nut so that the washer is in contact with bottom of the Base as in Fig. 11. **DON'T forget to apply a little anti-seize grease to the screws before tightening or you may not be able to remove the nuts later.**



Fig. 9

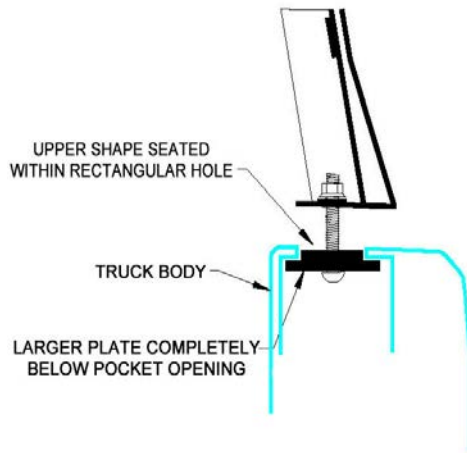


Fig. 10



Fig. 11

Use a wrench to tighten the flange nut until the Base is firmly seated, but not so tightly that the truck sheet metal is bent or the bolt threads are stripped. As shown in Figs. 12 and 23, tighten the nylon lock nut down to keep the flange nut tight.



Fig. 12



Fig. 13

4. **Attach Legs to Bases.** Examine the Legs and notice that there are holes drilled in the outside of each Leg. As shown in Fig. 14, place the bottom of each Leg over the angular projection of the Base and slide the Leg down until the bottom of the Leg sits flat on the bottom of the Base so that the hole in the side of the Leg aligns between the hole in the gusset and the threaded hole in the angular projection. Secure the parts together by threading a 1-inch long button head cap screw with metal washer into the hole. Tighten the screws with the Allen Wrench because the screw will be difficult to tighten once it engages the nylon insert in the lock nut. However, do not tighten the screw all the way down yet.

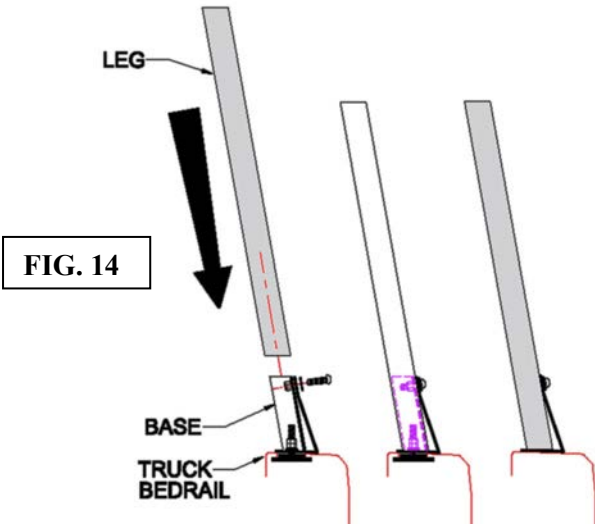


FIG. 14



FIG. 15

5. **Attach the Crossbars to the Top Connectors.** Attach the crossbars (D) and (H) to the Top Connectors (B) as shown in Fig. 16. **NOTE: In some cases the Front and Rear Crossbars are not the same length. If they are not the same length, the longer Crossbar will be positioned at the FRONT of the bed.** Examine the Top Connectors and notice that each has two angular projections, one with a pointed end and one with a flat end. Begin the assembly by orienting the Crossbar so that the holes drilled in it are on the bottom. Align the other projection with the ends of the each Crossbar and insert the projection all the way in until the holes in the bottom of the Crossbar align with the holes in each projection. Place a metal washer onto a 1" button head cap screw and thread it up into each hole then tighten it loosely. Do NOT tighten these screws fully at this time.

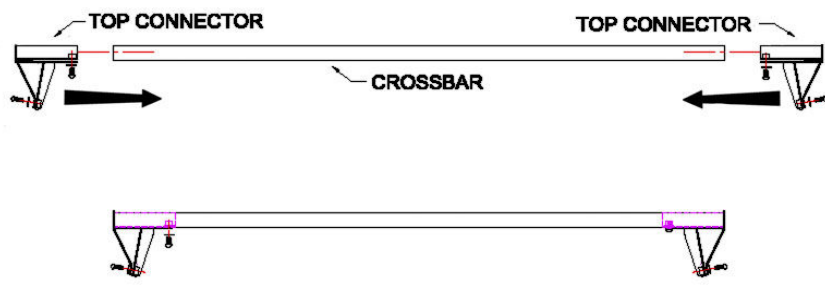


FIG. 16

Attach the Top Connectors to the Legs. Examine Fig. 17 and install the Crossbars by inserting the pointed end of the angular projections down into the ends of the crossbars as illustrated below. Then inserts 1" button head cap screws with washers into the sides of the Legs and tighten firmly.

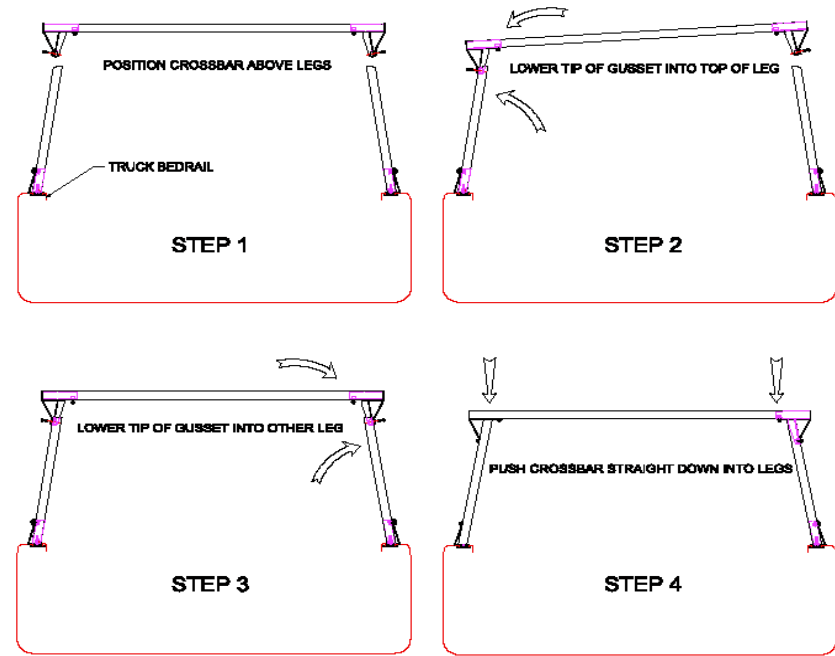
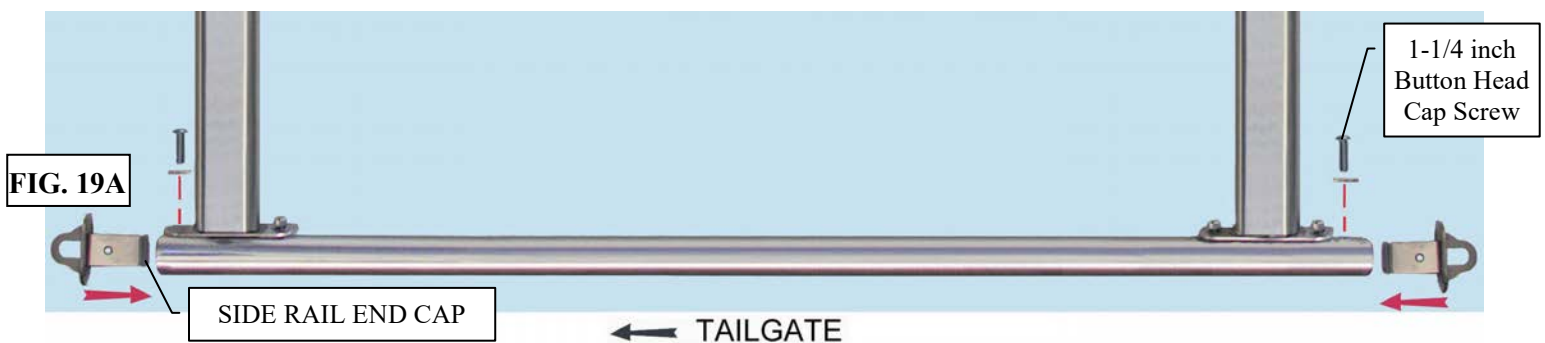
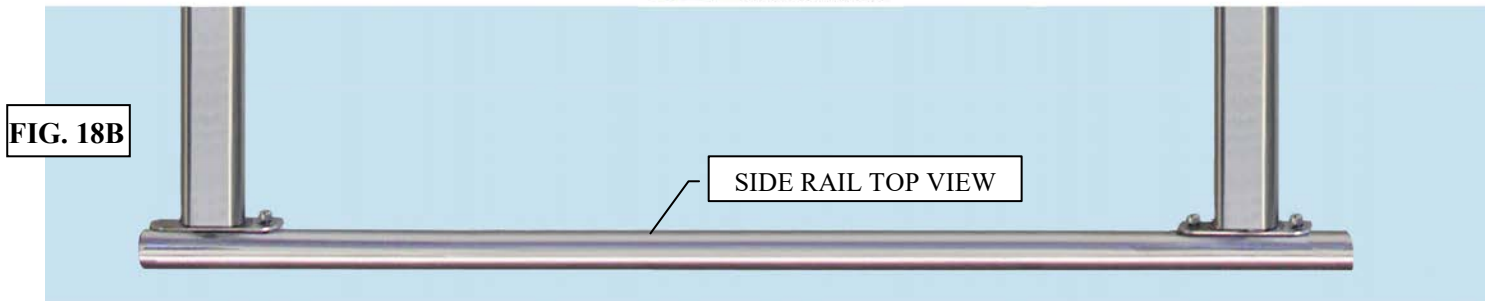
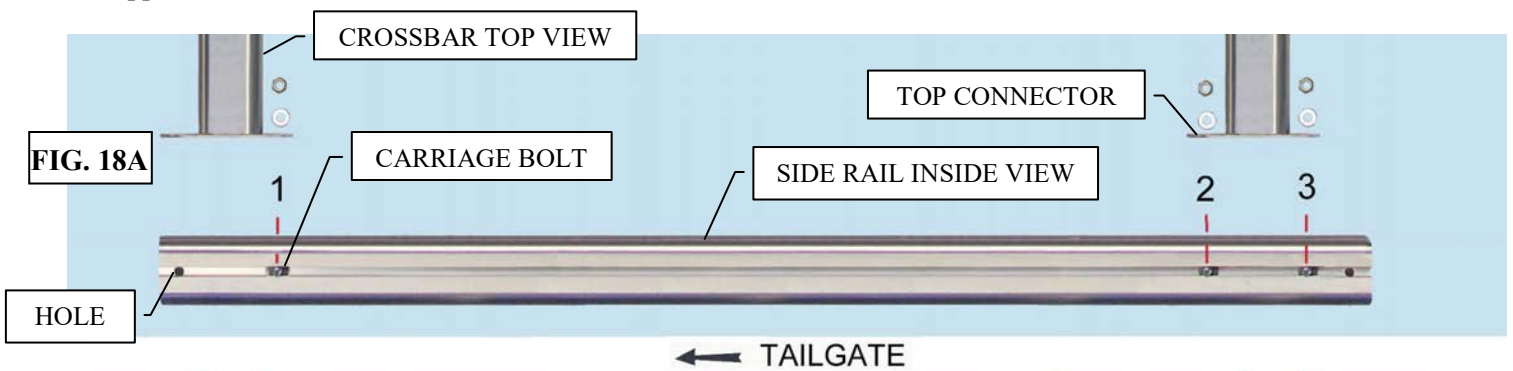


FIG. 17

Note: If you find it too difficult to get the projections to slide down into the top of the Legs, you may need to remove the screws from the bottom of the Legs on one or both sides and pull the Legs up (but not completely off) the Bases. This will give you more flexibility to insert them and work them down into the Legs.

6. **Attach Side Rails to the Crossbars.** Examine the Side Rails (G) and notice that each has a slot running the length of the Rail on one side and a hole drilled near each end as shown in the upper half of Fig. 17. Now examine the Side Rail End Caps (A) and notice that each has one threaded hole. Lay the Side Rails on the ground and as shown in Fig. 17, slide one carriage bolt into the Side Rail slot from one end and two more from the other end and array them as shown below. Pick up a Side Rail and hold it against the end of the Crossbars so that the holes in the Top Connectors align with the carriage bolts. Push the bolts through the holes and screw a nylon lock nut with washer loosely onto each bolt. Insert a Side Rail End Cap into each end until the holes in the Side Rail align with the threaded holes in the End Cap. Insert a 1.25" button head cap screw with washer into the hole at the front end of the Side Rail and tighten firmly with the Allen wrench. Align the hole at the other end of the Side Rail with the free hole on the rear crossbar Top Connector. Insert another screw with washer and tighten firmly with Allen wrench. Attach the other Side Rail and then check all the components of the rack to ensure everything is aligned. Firmly tighten all fasteners. Insert a 1" screw with washer into one of the holes and attach the front of the Side Rail. When completed the assembly should appear as shown below.



7. **Insert and tighten all screws and nuts on the rack firmly** so that all members of the rack are held rigidly together and the rack cannot move in the stake pockets when pressure is applied. Tighten the fasteners firmly, but not so tightly that the sheet metal or threaded parts are damaged. Frequently recheck tightness of threaded parts. When completed the rack should appear as shown below.



Fig. 20

REMEMBER TO BE SAFE: Carrying any load can be hazardous. Avoid roll over. As with all racks, ensure that loads are not top-heavy. Loads should be placed so that the center of mass of the load is no closer than 24” from the sides of the rack. High loads must be transported with **GREAT CAUTION** to prevent loads from striking low overhead objects and from tipping during turns, abrupt stops, or high winds. Loads extending beyond the rear bumper of the vehicle must be designated with a red flag during daylight or red light during darkness in accordance with the state vehicle code.