

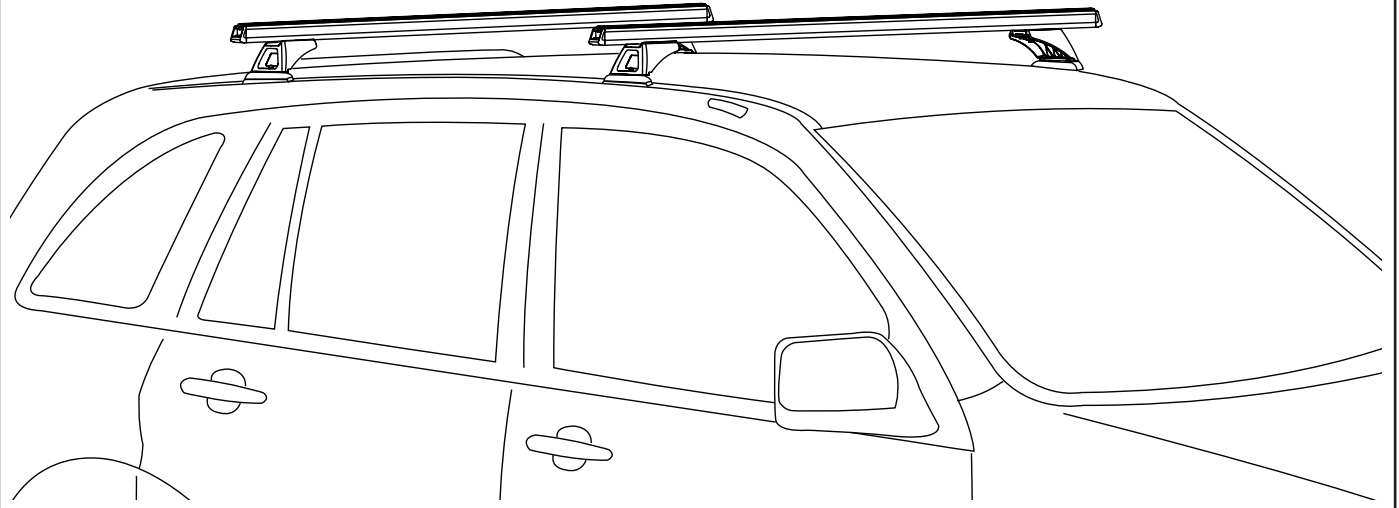


RHINO-RACK

Aerodynamic & Heavy Duty Roof Rack Systems

RTS512 Toyota RAV 4 - Rhino Heavy Duty Two Bar Track Mount

Important: Please read these instructions carefully prior to installation.
Please refer to your fitting instruction to ensure that the roof racks are installed in the correct locations.
Check the contents of kit before commencing fitment and report any discrepancies.
Place these instructions in the vehicle's glove box after installation is complete.



Care Instruction: Thoroughly clean under the roof channel trim when removed prior to installation.

Important Information

Maximum carrying capacity: 75kg

Recommendations:

It is essential that all bolt connections be checked after driving a short distance when you first install your cross bars. Bolt connections should be checked again at regular intervals (probably once a week is enough, depending on road conditions, usage, loads and distances travelled). You should also check the cross bars each time they are re-fitted.

Make sure to fasten your load securely. Please ensure that all loads are evenly distributed and that the centre of gravity is kept as low as possible.

Use only non-stretch fastening ropes or straps.

Sensitivity to cross winds, behaviour in curves and braking.

The handling characteristics of the vehicle, changes when you transport a load on the roof. For safety reasons, we recommend you exercise extreme care when transporting wind-resisting loads; special consideration must be taken into account when braking.

Please remove cross bars when putting vehicle through an automatic car wash.

Load Ratings:

Maximum permissible load is 75kg per pair of cross bars (include the weight of the cross bars, 5kg). When cross bars are to be used in off-road conditions, please build a safety factor of 1.5 into this load limit. 50kg maximum for off-road conditions. Although the cross bars are tested and approved to AS1235-2000, Australian road conditions can be much more rigorous. However, increasing the number of cross bars does not increase the vehicles maximum permissible roof loading.

Note for Dealers and Fitters:

It is your responsibility to ensure instructions are given to the end user or client.

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Toyota RAV 4 - Rhino Heavy Duty Two Bar Track Mount

Parts List

Item	Component Name	Qty	Part No.
1	Tracks LEFT & RIGHT	pair	C605/C424
2	Heavy Duty Buffer Strip 1250mm	2	R004
3	Heavy Duty End Cap	4	M002
4	Rhino Heavy Duty Bar 1250mm	2	A019
5	Track Cover REAR Left	1	M248
6	Track Cover FRONT Left	1	M250
7	Track Cover FRONT Right	1	M249
8	Track Cover REAR Right	1	M247
9	M6 x 40mm Security Screw	4	B085
10	M10 Channel Nut	4	N024
11	M6 Spring Washer	4	W004
12	M6 x 12.5mm Flat Washer	4	W003
13	RLCP Track mount Leg	4	M123
14	Top Pad	4	M173
15	Base Pad	4	M172
16	M6 Brass hex spigot nut	4	N042
17	M10 x 20mm Hex Bolt	4	B003
18	M10 Internal Shakeproof Washer	4	W021
19	M10 x 38mm Flat Washer	4	W022
20	Track Bolt Plate	4	C413/C412
21	5mm Rivet	6	H008
22	5mm Security Allen Key	1	H001
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Tools Required:

Pneumatic or Concertina rivet gun.

Marking pen.

Power or Cordless drill.

5mm drill with drill depth stop.

Vacuum cleaner.

Cold galvanizing solution & brush.

10mm Socket Wrench.

Silastic Sealer/Butyl Mastic.

5mm Security Allen key, provided in kit

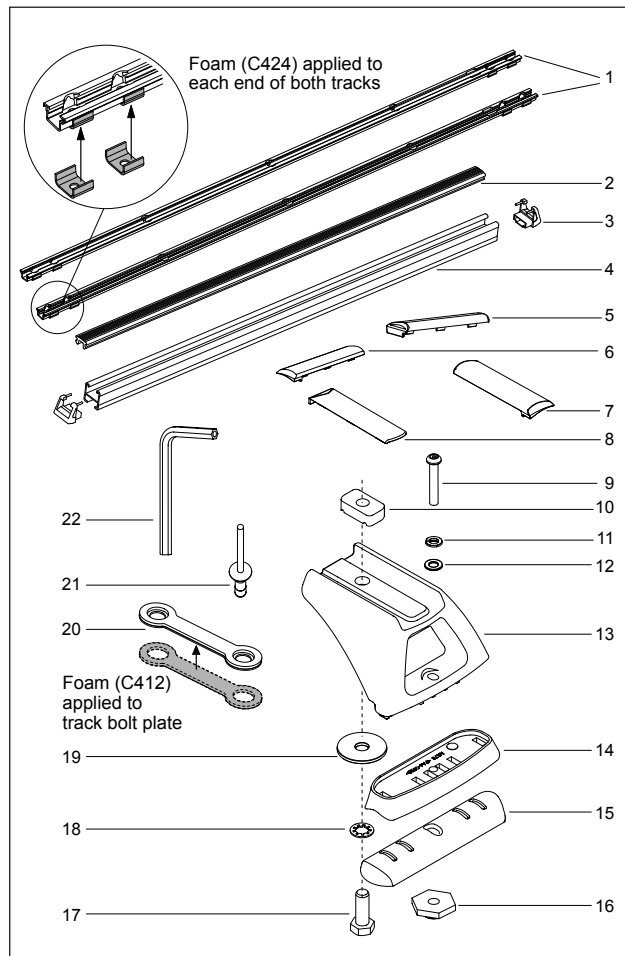
5/8 or 16mm spanner.

Measuring tape.

Hacksaw.

Philips head screwdriver.

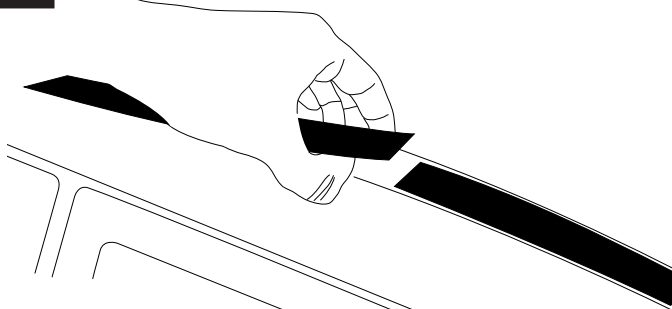
Flat head screwdriver.



Drill depth stop.

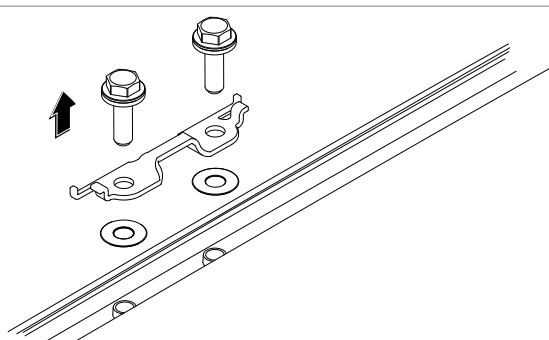
Round piece of wood or plastic of larger outer diameter than the hole being drilled.
5-6mm hole through centre.

1



Unclip to remove the bolt cover plates towards each end of the roof gutter trim. Lift and remove the long middle section trim from the roof starting at the front of the vehicle. The shorter trim at each end can be left in place.

2



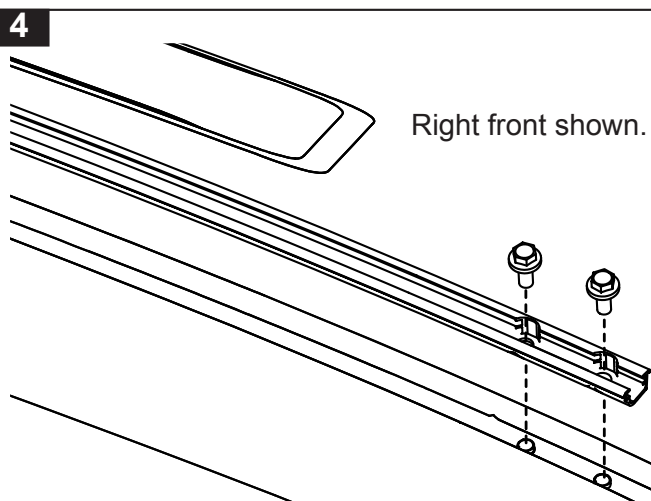
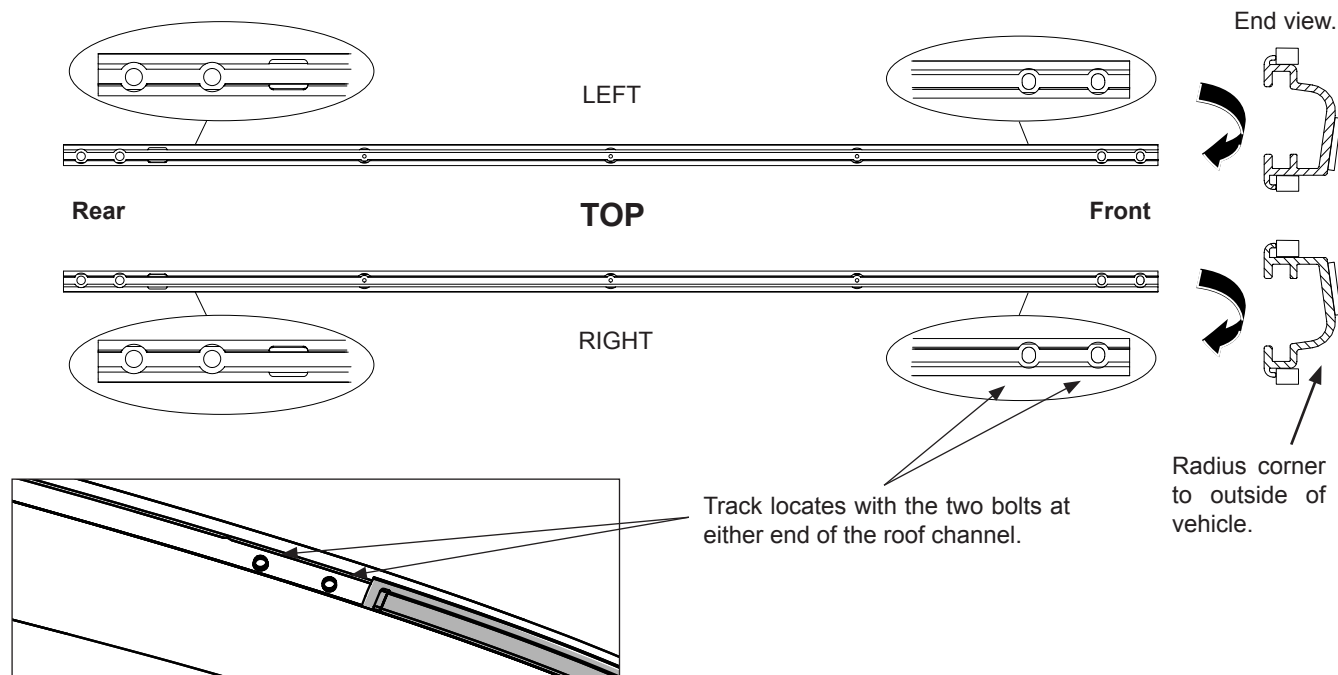
Using a 10mm socket wrench remove the two bolts and brackets at each end of the roof channel. Do not remove the rubber coated washer on these bolts. **Keep the bolts and washers as they will be used to fasten the track to the roof.**

IMPORTANT: Clean the roof channel to ensure a flat surface prior to sitting the track in place.



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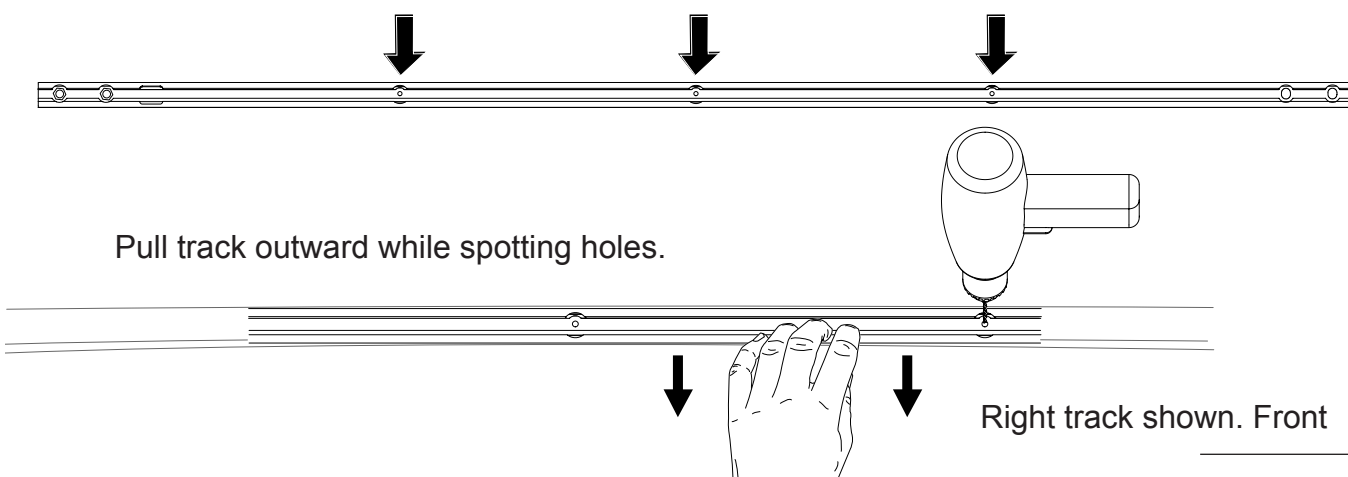
- 3** Tracks are LEFT and RIGHT handed. Place the track into the roof channel to check front and rear bolt alignment.



Lightly fasten the original M8 roof bolts to the threads front and rear in the roof channel. This will help hold and locate the track while holes are spot drilled for the rivets.

DO NOT TIGHTEN BOLTS AT THIS STAGE.

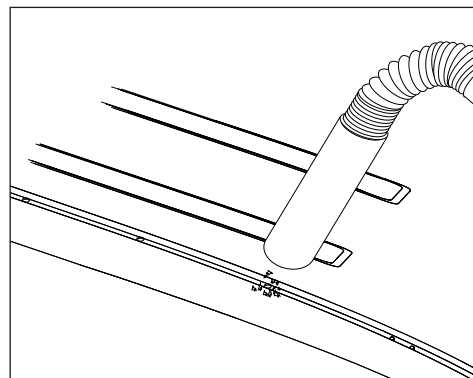
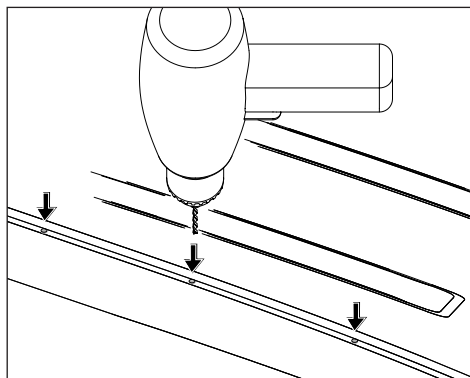
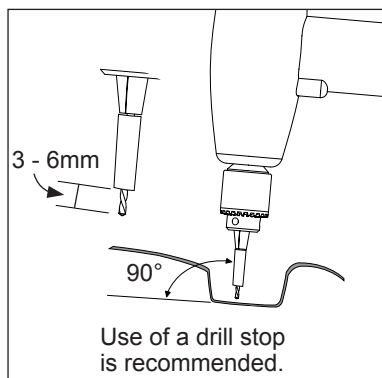
- 5**
- Using a 5mm drill bit spot drill the roof channel in three places each side to mark the holes to be riveted.
 - Pull and hold the track towards the outer edge of the roof channel while spotting the holes.



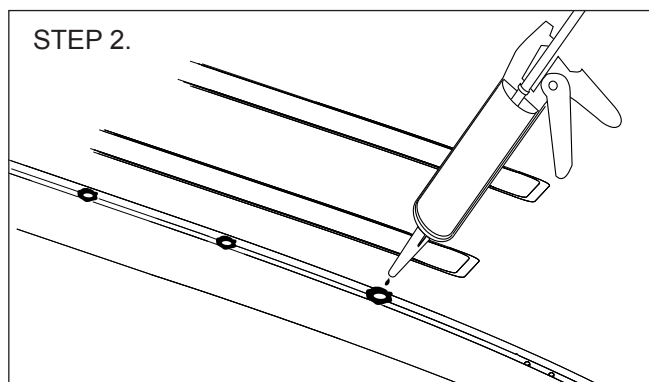
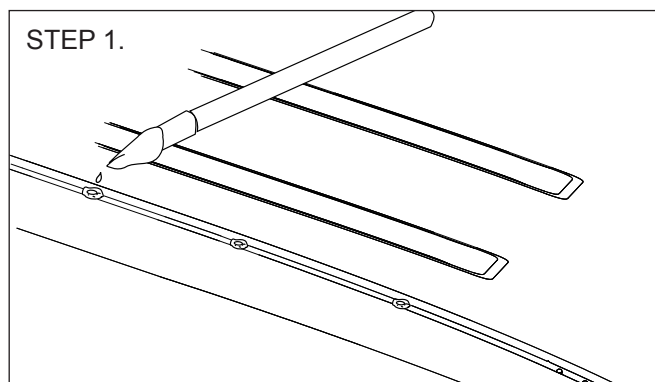


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- 6** Remove the M8 bolts and track. Fit a drill stop to prevent drilling into hood lining. Drill through the roof in three spots each side. Use a vacuum cleaner to remove swarf from the roof. This will minimise swarf entering the hole and avoid scratching. Wipe after with a rag.



- 7** **STEP 1.** Apply a liberal amount of cold galvanizing solution to the inside and surrounds of the drilled holes. Allow cold galvanizing solution to touch dry, ten minutes or so.
STEP 2. Apply a liberal amount of silastic sealer in and around the drilled holes to prevent water leaks.



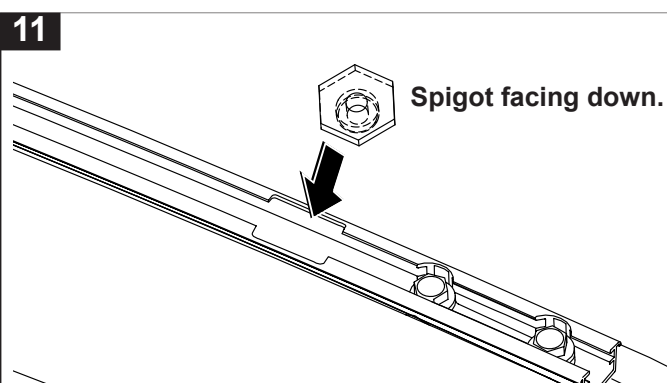
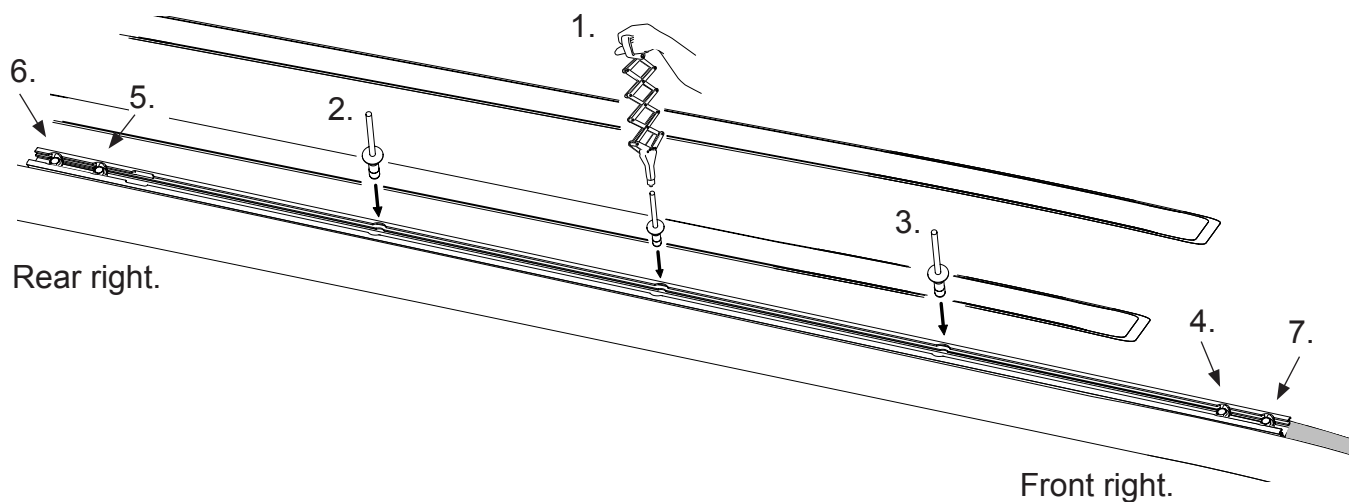
- 8**
-
- Peel all three white backing strips off the foam tape on each track. Rear of each track has rectangular cut out.
-
- Left track rear.

- 9**
-
- Bolt Plate
(foam side down).
- Front right shown.
- Place the track in the roof channel. Place the new supplied bolt plate foam side down against the track front and rear then locate M8 bolts through. Lightly finger tighten the M8 bolts. This helps locate the track while riveting.
-
- Outside of vehicle.



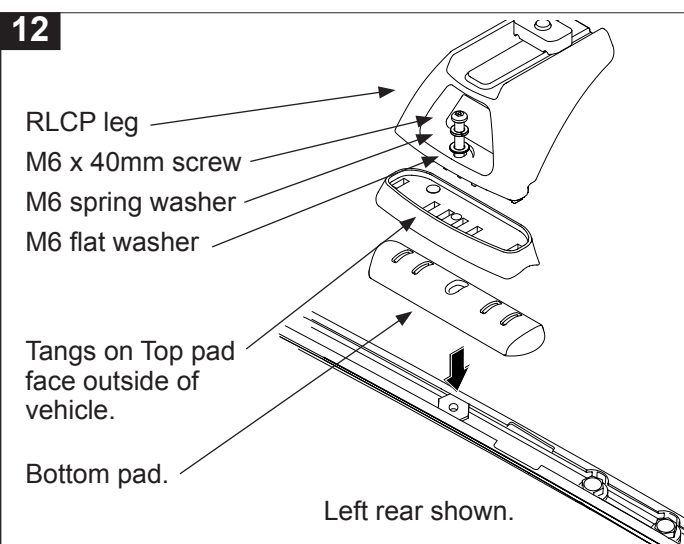
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- 10** Start with middle rivet (1) to initially pull the track down. Follow with the other two rivets (2 & 3). Finally, tighten the bolts using a 10mm socket in the order shown below (4, 5, 6, 7).

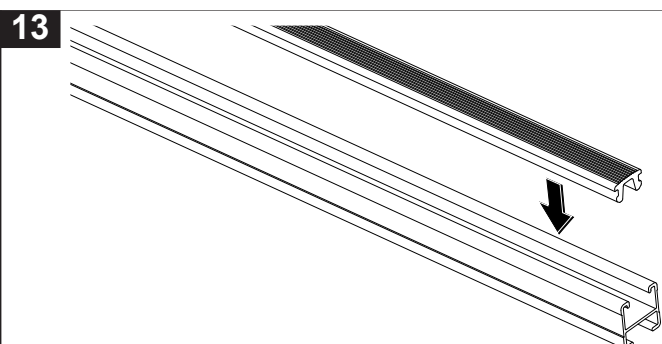


Place the M6 brass hex spigot nut into the opening at the rear of each track. With the spigot facing down slide along the track to position.

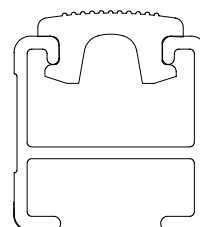
NOTE: It is much easier to slide the brass nuts close to the final position before attaching bas pads and leg.



Sit the bottom pad over the brass spigot nut then sit top pad on. Sit the leg assembly on. Place the M6 screw/washer assembly through the leg and fasten to the spigot nut. **DO NOT TIGHTEN AT THIS STAGE.**



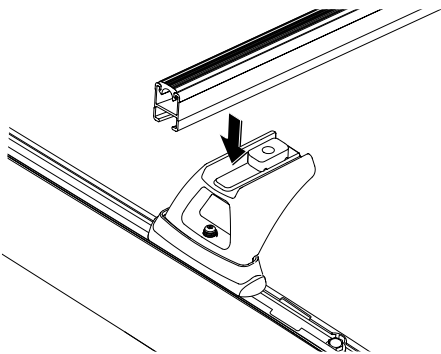
Insert cross bar rubber buffer strip into the top of the cross bar.





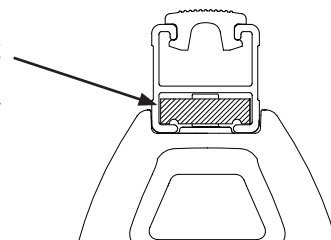
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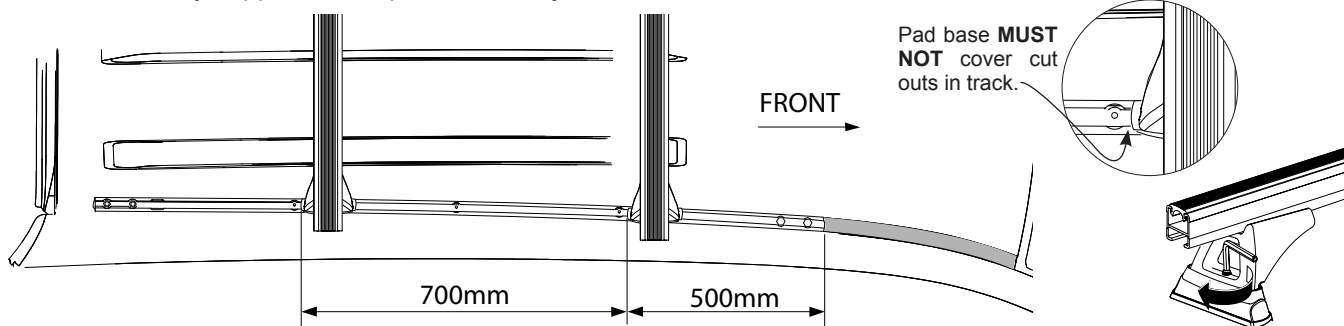
Place each cross bar onto the legs. Make sure the channel nut sits across the bar as shown below.

It is important that the channel nut sits across the cross bar when tight.



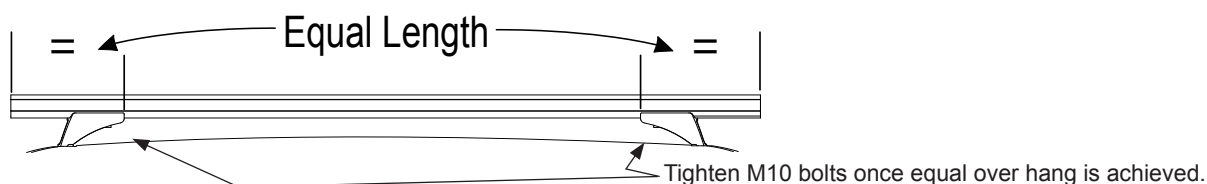
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Measure **500mm** from the **front of the track** to the rear edge of the front base pad. Then **700mm** to the rear edge of the rear base pad. Both sides of the vehicle must be parallel. **Tighten M6 security screws to 3-4 Nm** with allen key supplied. The pads must sit just inside the hole cut outs of the track.

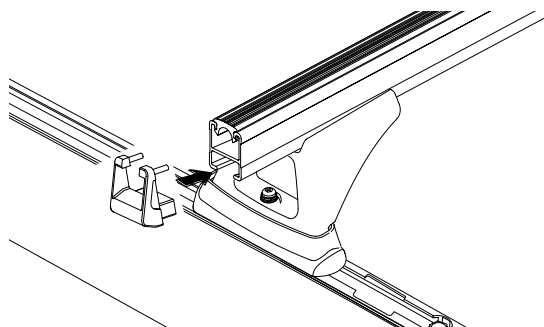


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Check that the cross bar overhang is equal on both sides, adjust as necessary. Tighten the M10 x 20mm hex bolt on the underside to 5 Nm. **DO NOT OVER TIGHTEN.**



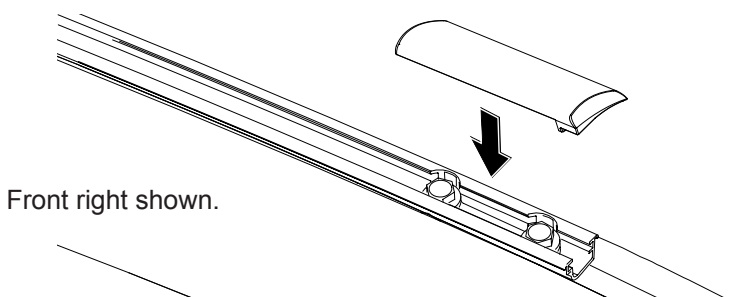
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The cross bar rubber buffer strip may need to be trimmed before fitting end caps. Fit the end caps to the cross bars. A rubber mallet may be needed to knock them in.

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Push down to clip the track covers on. They are marked on the underside to denote their position on the track.



FR = Front Right
RR = Rear Right
FL = Front Left
RL = Rear Left