

RHINO-RACK®

Toyota Hilux Gen 8 & 9 Non-Invasive Backbone

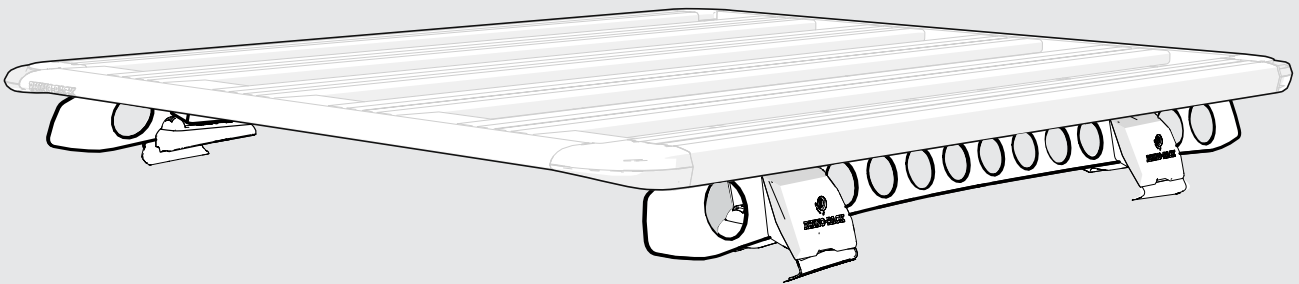
RNITHB1

Important:

1. Check the Rhino-Rack website to ensure you have the latest issue of these instructions.
2. Please refer to your fitting instruction to ensure that the product is installed correctly.
3. Check the contents of kit before commencing fitment and report any discrepancies.
4. Place these instructions in the vehicle's glove box after installation is complete.
5. These instructions must be followed for warranty to be upheld.

Fit Time: 1 hour

NOTE: 62100 or 65100 Pioneer **must be unpacked/assembled** before commencing these Fitting Instructions



Australian Patent
2023370513

USA
(19/124,712)

Patent Pending NZ
(819921)

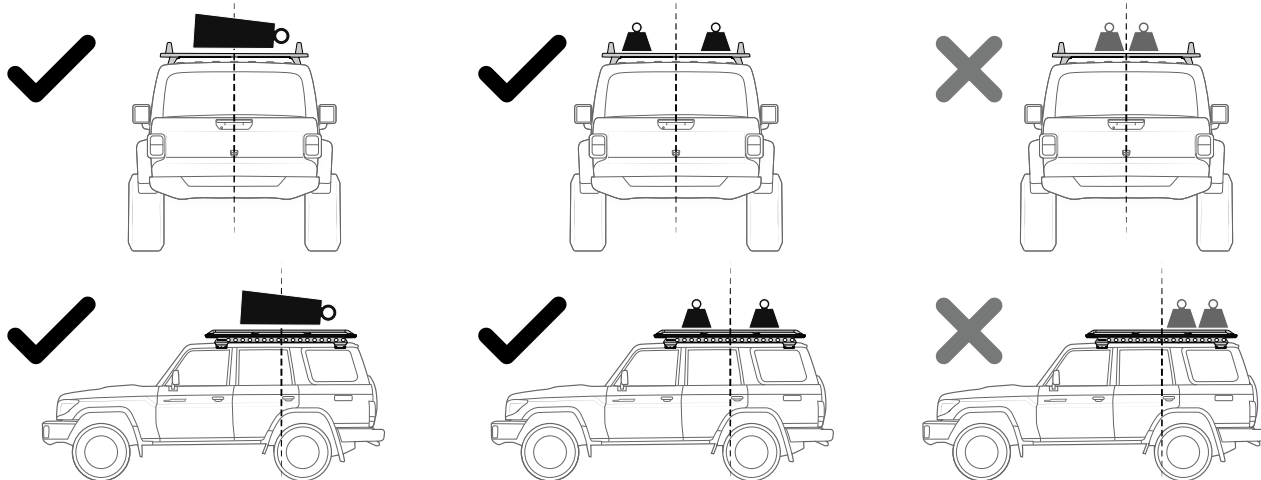
For details see rhinorack.com/patents

RHINORACK.COM

Doc. No: 520-RFI-00206

Issue No: 2

Issue Date: 06/10/2026



Distribute loads evenly and laterally/longitudinally as low as possible over the span.

Avoid point loads concentrated at the front or rear.

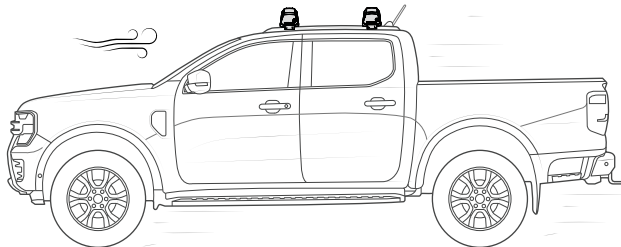
Without a load:



Do not exceed a maximum speed of
130 km/h (80 mph)



130 KM/H
80 MPH



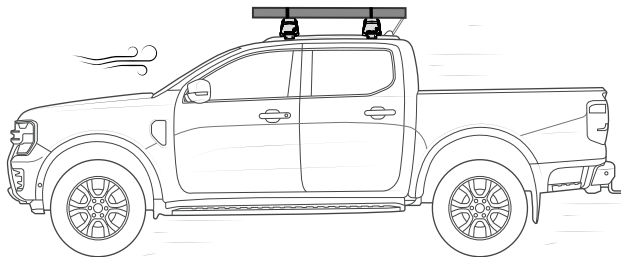
With a load:



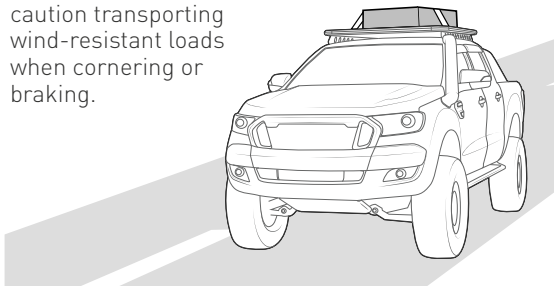
Do not exceed a maximum speed of
100 km/h (62MPH)



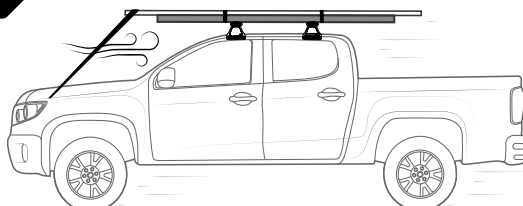
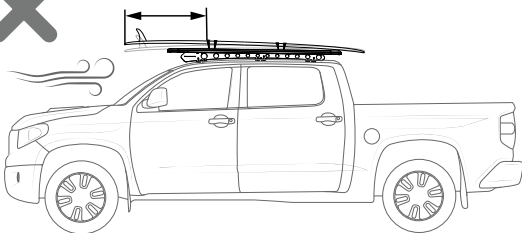
100 KM/H
62 MPH



Use extreme caution transporting wind-resistant loads when cornering or braking.

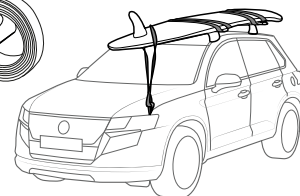
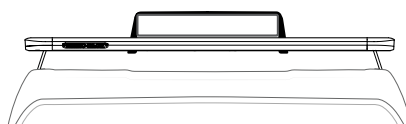
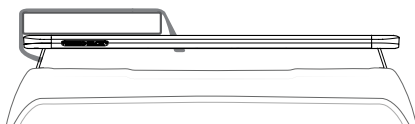


Off-road conditions can be more rigorous. Use extreme caution on paths without a sealed surface like tar or bitumen.

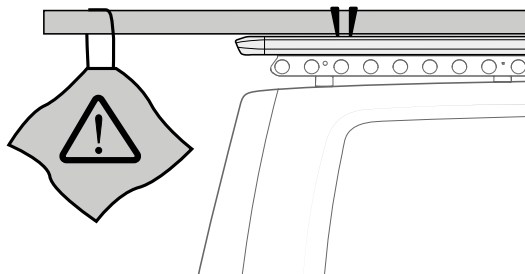


Overhangs over **600 mm (23 5/8 in)** must be tied to the bonnet; flexible loads **must also** be secured to rigid support.

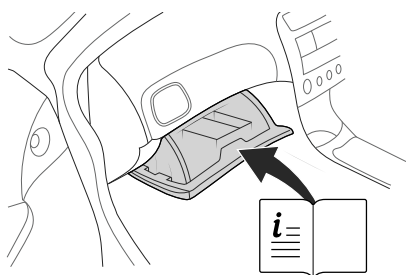
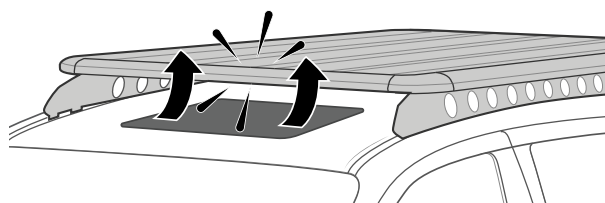
✗ Loads must be tied down to the platform, not around backbone



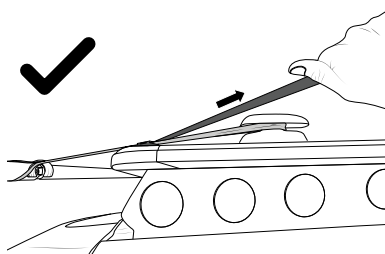
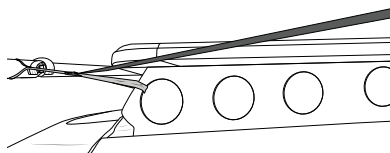
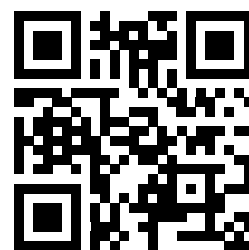
Use only non-stretch fastening ropes or straps to attach cargo to roof racks



Ensure sunroof will not collide with roof rack system.



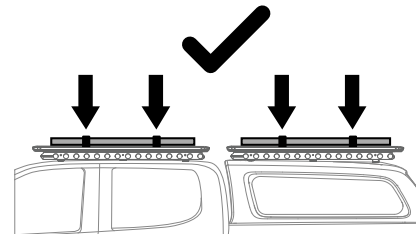
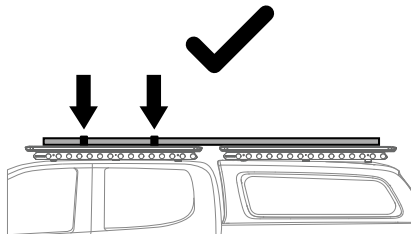
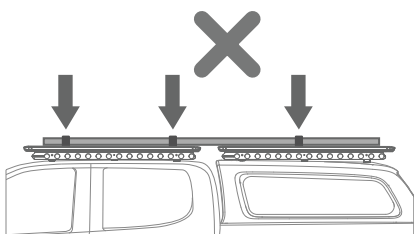
[Youtube.com/Rhinorackaustralia](https://www.youtube.com/Rhinorackaustralia)



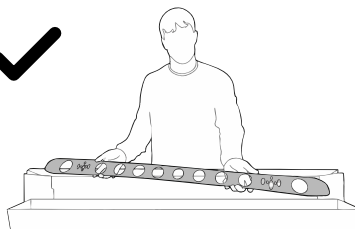
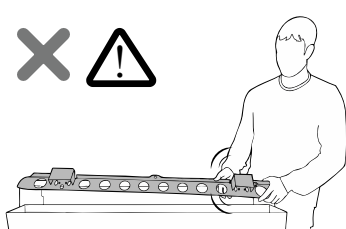
DO NOT tie off to the backbone blades.

If tying down cargo or open awnings, attach any tension strap or guy ropes to the platform, or an anchor on the platform.

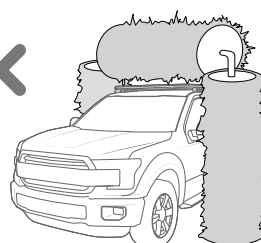
Tub/tray/canopys can move independently from the vehicle cabin. Rigidly fix to either the cabin roof racks or the tub/tray/canopy roof racks but not both simultaneously.



Always use two hands at equal distance to lift the Backbone to avoid bending.



Racks must be removed when vehicle is put through an automatic car wash.



Carrying Capacity

Check the website and the vehicle owners hand book for your vehicle manufacturer's maximum carrying capacity. Load must be evenly distributed over the system.



Cargo Load Limit

Total permissible weight allowed on top, and attached to the rack whilst the vehicle is in motion.



System Weight

Total weight of the rack system. (e.g. Crossbars, Backbone, Platform)



Max System Load Capacity

Please ensure you use the vehicle manufacturer's maximum roof allowance if it is lower than the figure listed in the fitting chart/supplement.



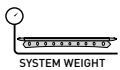
Vehicle Manufacturer's Load Limit

Total permissible weight attached to the rack. This is inclusive of the weight of the rack system.

System has been rigorously vibration and crash tested, and is suitable for full cargo carrying capacity in both on and off-road conditions.

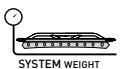
Pioneer 6 / 62100

DYNAMIC LOAD LIMIT (ON AND OFF-ROAD):
*USE THE VEHICLE MANUFACTURER'S MAXIMUM ROOF ALLOWANCE IF IT IS LOWER THAN THE FIGURE LISTED

 CARGO	 SYSTEM WEIGHT	 LOAD LIMIT	OR	 Max kg
UP TO 56 Kg 123 lbs	+ 24 Kg 53 lbs	=		UP TO 80 Kg 176 lbs
*VEHICLE MANUFACTURER'S ROOF LOAD LIMIT				
 TOTAL STATIC LOAD LIMIT: UP TO 250 Kg / 551 lbs*				

Pioneer 6 Tradie / 65100

DYNAMIC LOAD LIMIT (ON AND OFF-ROAD):
*USE THE VEHICLE MANUFACTURER'S MAXIMUM ROOF ALLOWANCE IF IT IS LOWER THAN THE FIGURE LISTED

 CARGO	 SYSTEM WEIGHT	 LOAD LIMIT	OR	 Max kg
UP TO 54 Kg 119 lbs	+ 26 Kg 57 lbs	=		UP TO 80 Kg 176 lbs
*VEHICLE MANUFACTURER'S ROOF LOAD LIMIT				
 TOTAL STATIC LOAD LIMIT: UP TO 250 Kg / 551 lbs*				

In Service Maintenance Checks

- All bolt connections should be checked after driving a short distance when you first install your roof racks.
- All bolted connections should be checked again at regular intervals (weekly is recommended, depending on road conditions, usage, loads and distances travelled).
- Off-road conditions are more rigorous. Check all bolted connections and your load more regularly.
- Ensure that your vehicle manufacturer's GVM, and gross axle weights are not exceeded (refer to vehicle owner's manual).
- All bolted connections should be checked each time they are re-fitted.
- **Always use the supplied Torque tool "V" when tightening the door clamps to the vehicle.**

Torque Settings:

Unless stated otherwise in these instructions, all fasteners should be set to the following torque settings:



4-5Nm
3-4lbs/ft



8-10Nm
6-7.5lbs/ft



16-18Nm
12-13lbs/ft

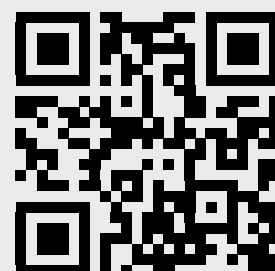
Note for Dealers and Fitters

It is your responsibility to ensure these fitting instructions are given to the end user or client. These instructions remain the property of Rhino-Rack Australia Pty. Ltd. and may not be used or changed for any other purpose than intended.

Warranty

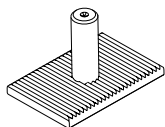
We love creating our products for you and hope you love using them too. For complete peace of mind, register your product at www.rhinorack.com/warranty. This way, we can quickly help you with any future approved fitment warranty claims.

And remember – never to forget to **Make Space For Adventure!**

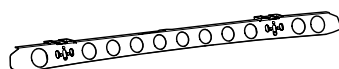


Parts

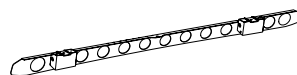
T-Bolt

A x6


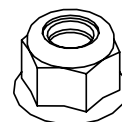
LEFT Blade

B x1


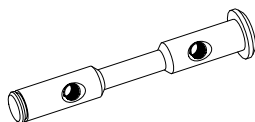
RIGHT Blade

C x1


M8 Nyloc Nut

D x6


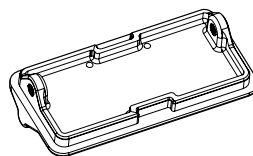
Pin

E x4


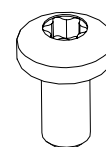
E-Clip

F x4

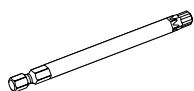

Pivot Base Plate

G x4


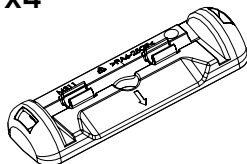
M6 x 12mm Torx Pan Head Screw

H x4


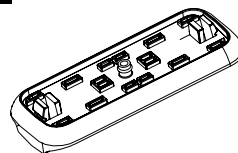
T30 Torx Key

I x1


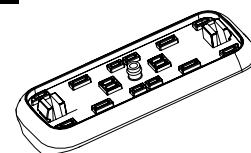
Base

J x4


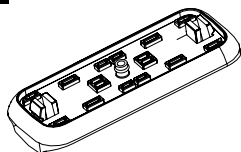
REAR Right Pad M700

K x1


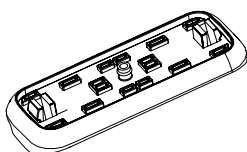
REAR Left Pad M699

L x1


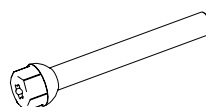
FRONT Right Pad M698

M x1


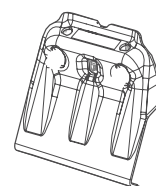
FRONT Left Pad M697

N x1


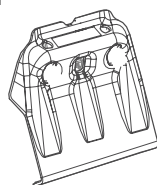
M8 Leg Bolt

O x8


FRONT Left Clamp

P x1


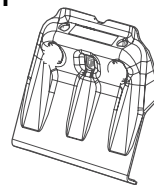
REAR Left Clamp

Q x1


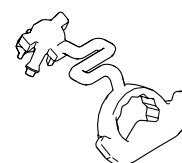
FRONT Right Clamp

R x1


REAR Right Clamp

S x1


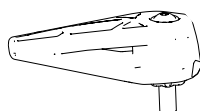
Clamp Clip

T x8


Clamp Cover

U x4

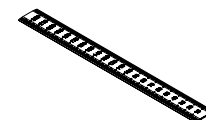

Torque tool

V x1


Key

W x2


Measuring strip

X x4


Instructions

Y x1


TOOLS REQUIRED:

T1 - Tape Measure

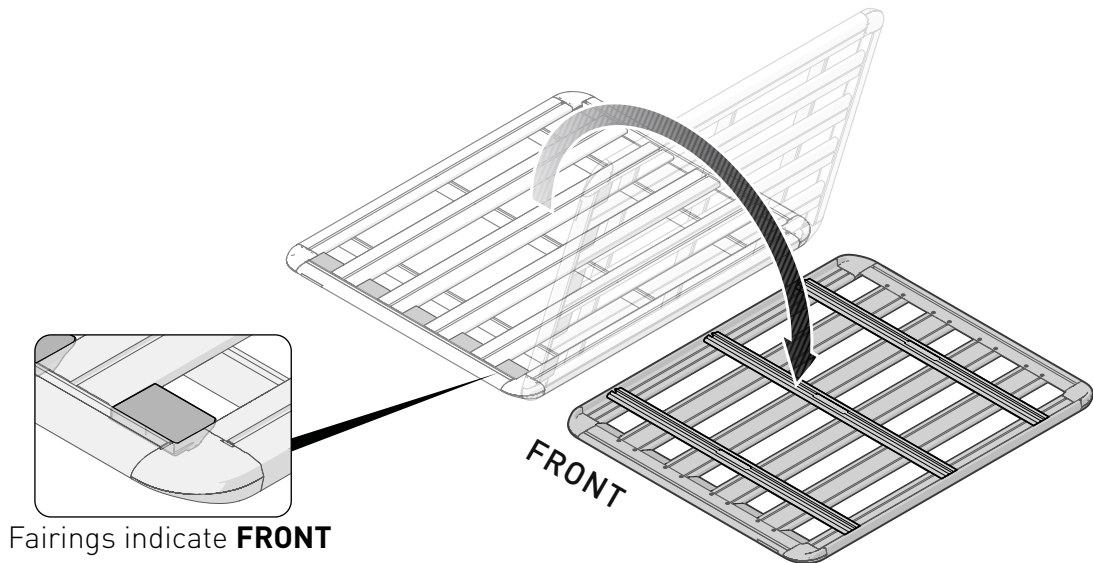
T2 - Torque Wrench & 13mm Socket

T3 - 1/2" Spanner

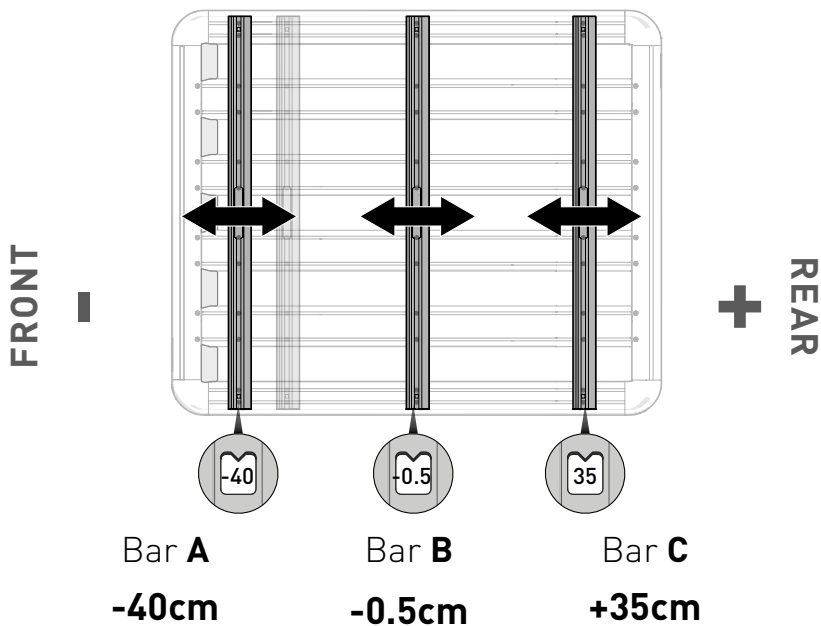
T4 - Scissors

This fit is **only applicable** with Pioneer **62100** and **65100**. The platform must be **unpacked/assembled** before commencing these steps.

1



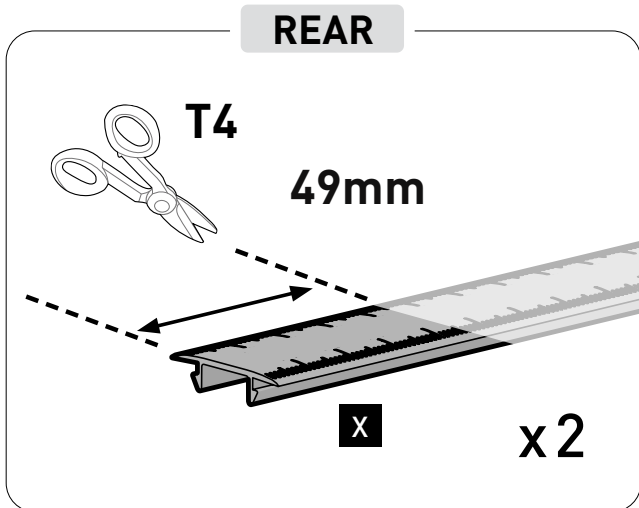
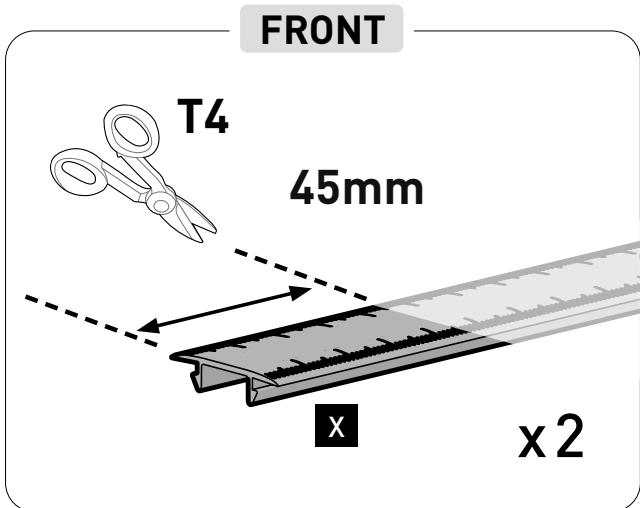
2 The underbars on the Pioneer need to be adjusted using the following measurements.



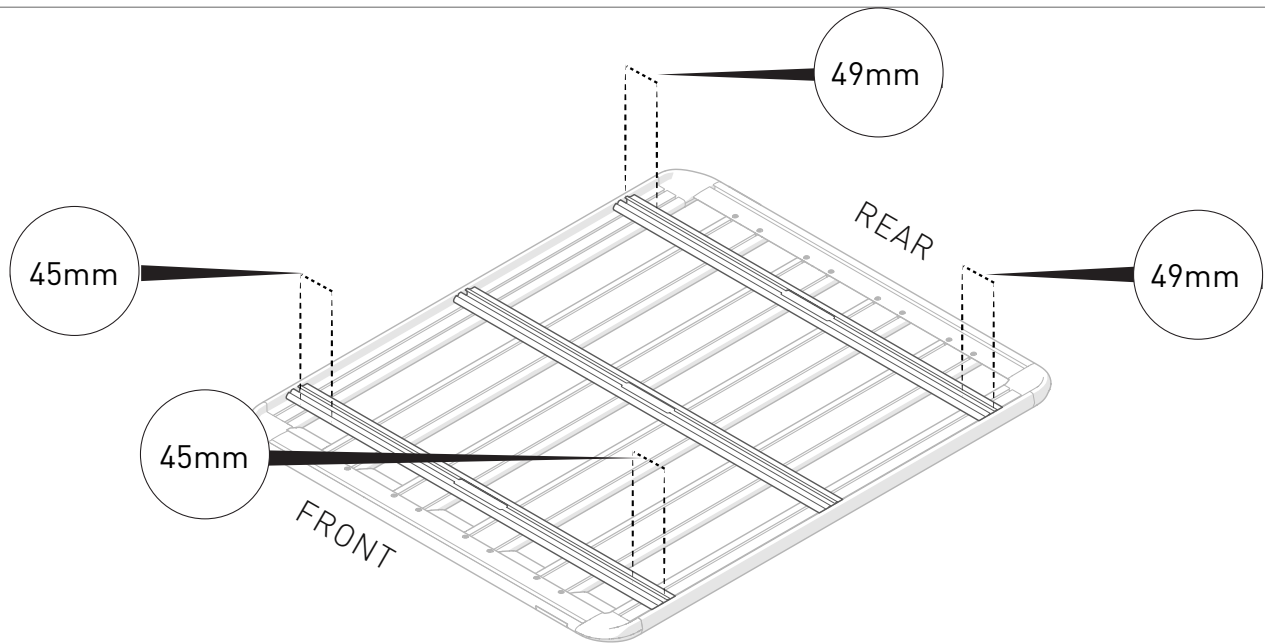
NOTE

Tighten underbars in position with the 6.5 Nm torque tool supplied in the Pioneer kit.

3 Cut the measurings strips **X** to the correct size.

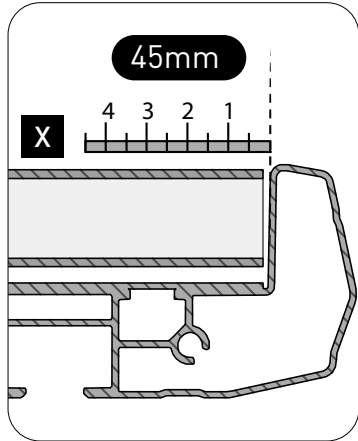
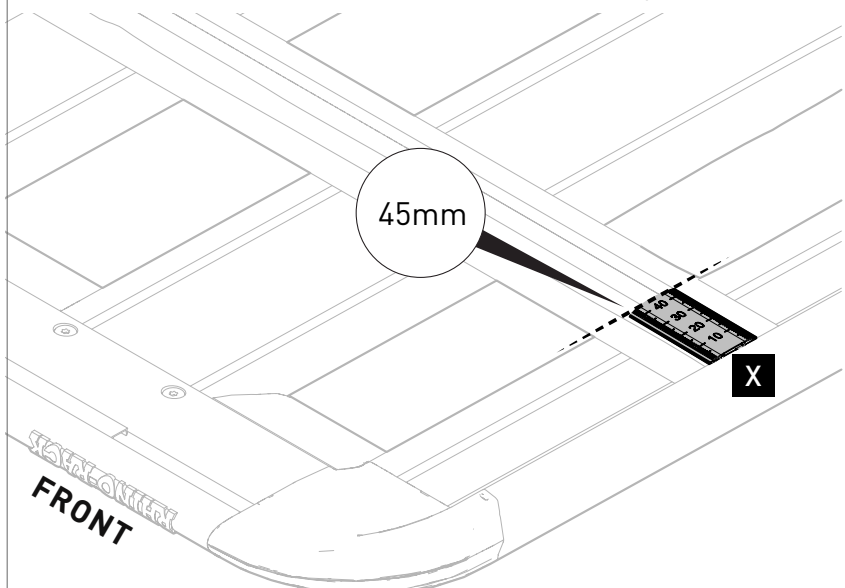


4a



4b

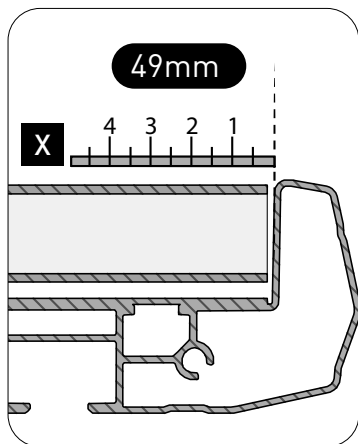
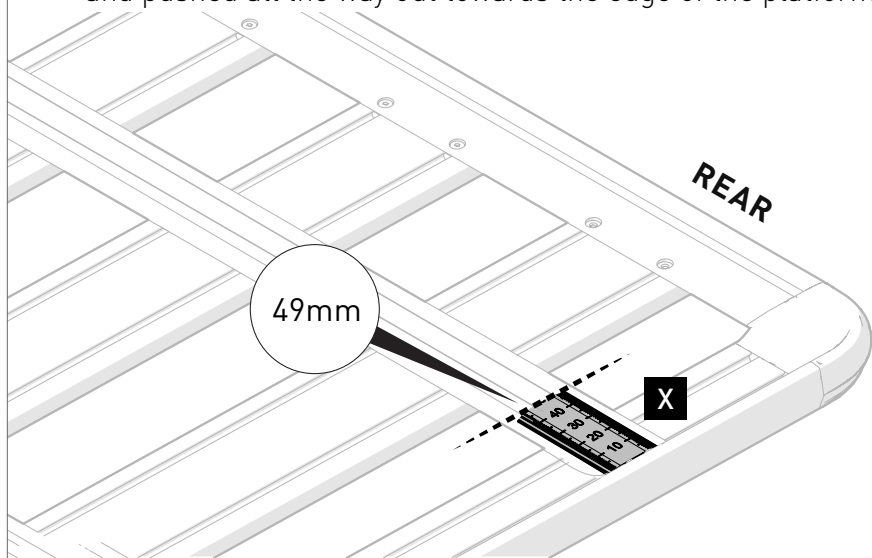
At the **Front** of the Platform ensure that the **45mm** measuring strips are inserted into the underbar and pushed all the way out towards the edge of the platform.



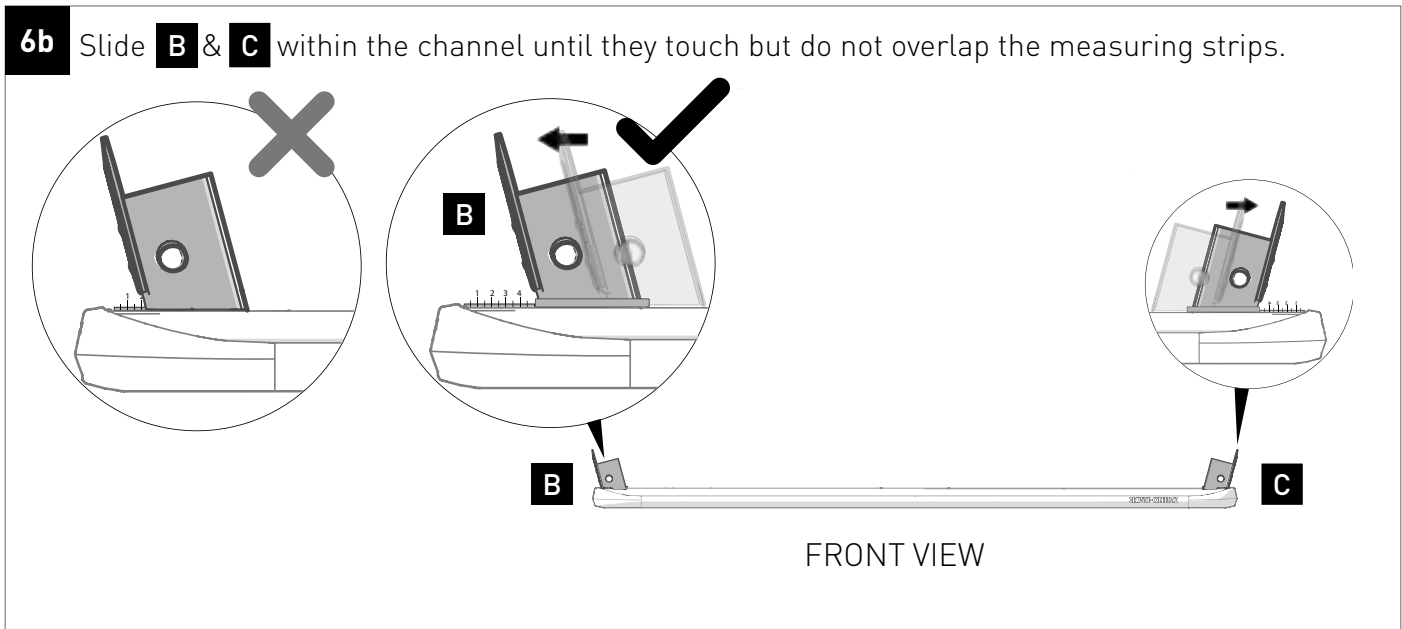
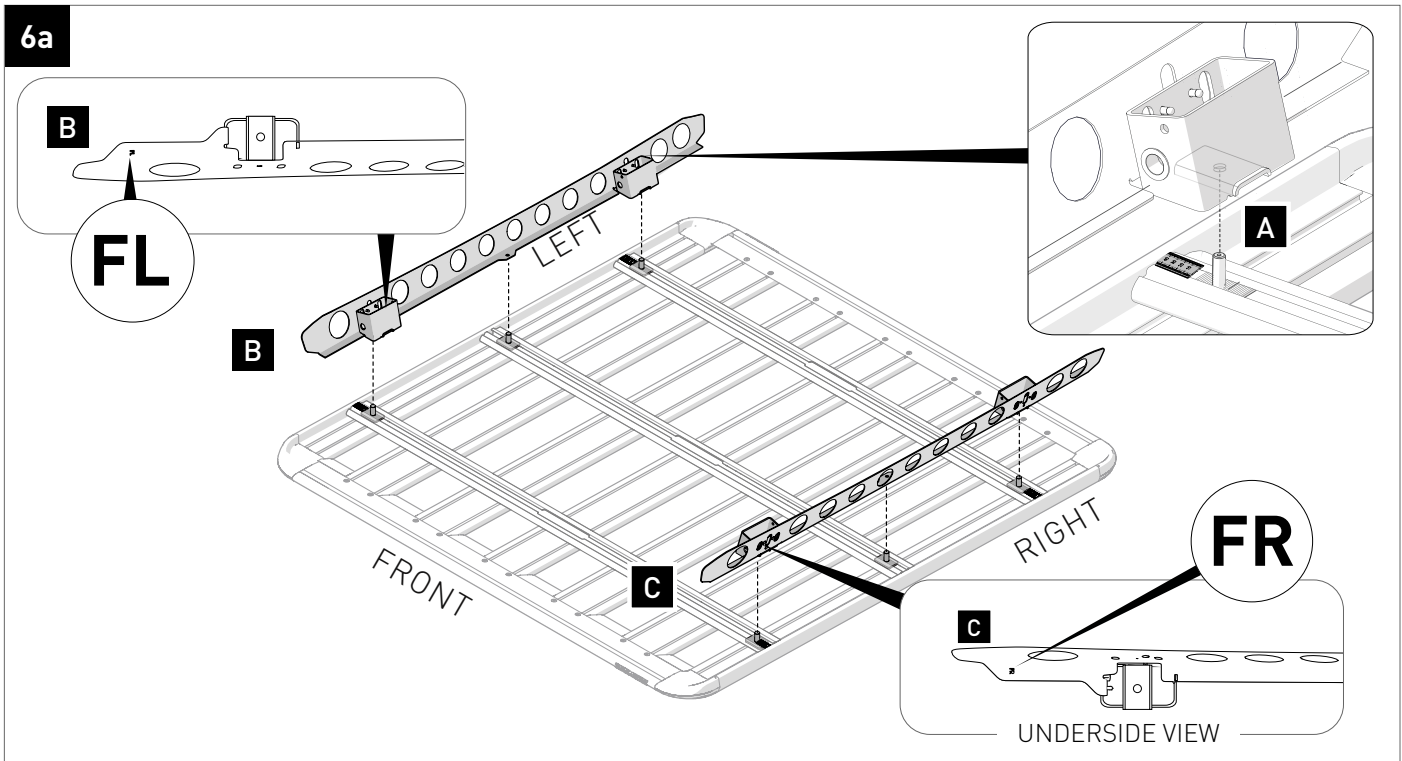
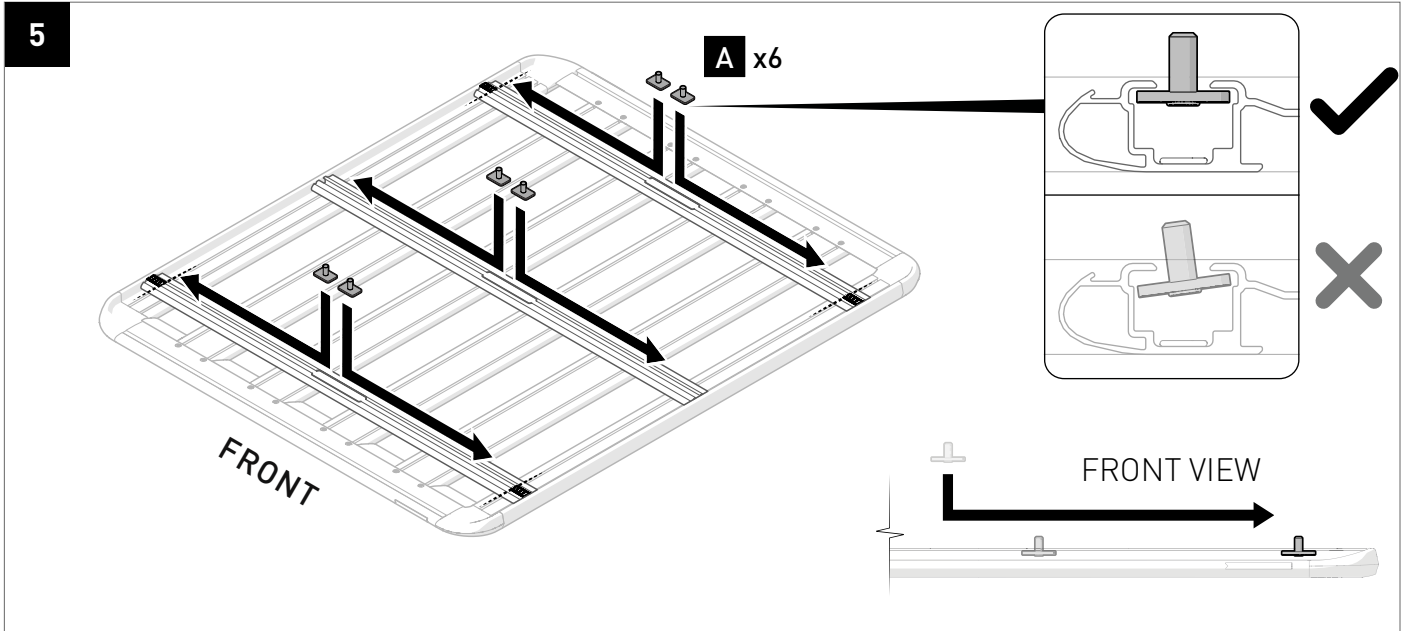
Repeat this step on the opposite side

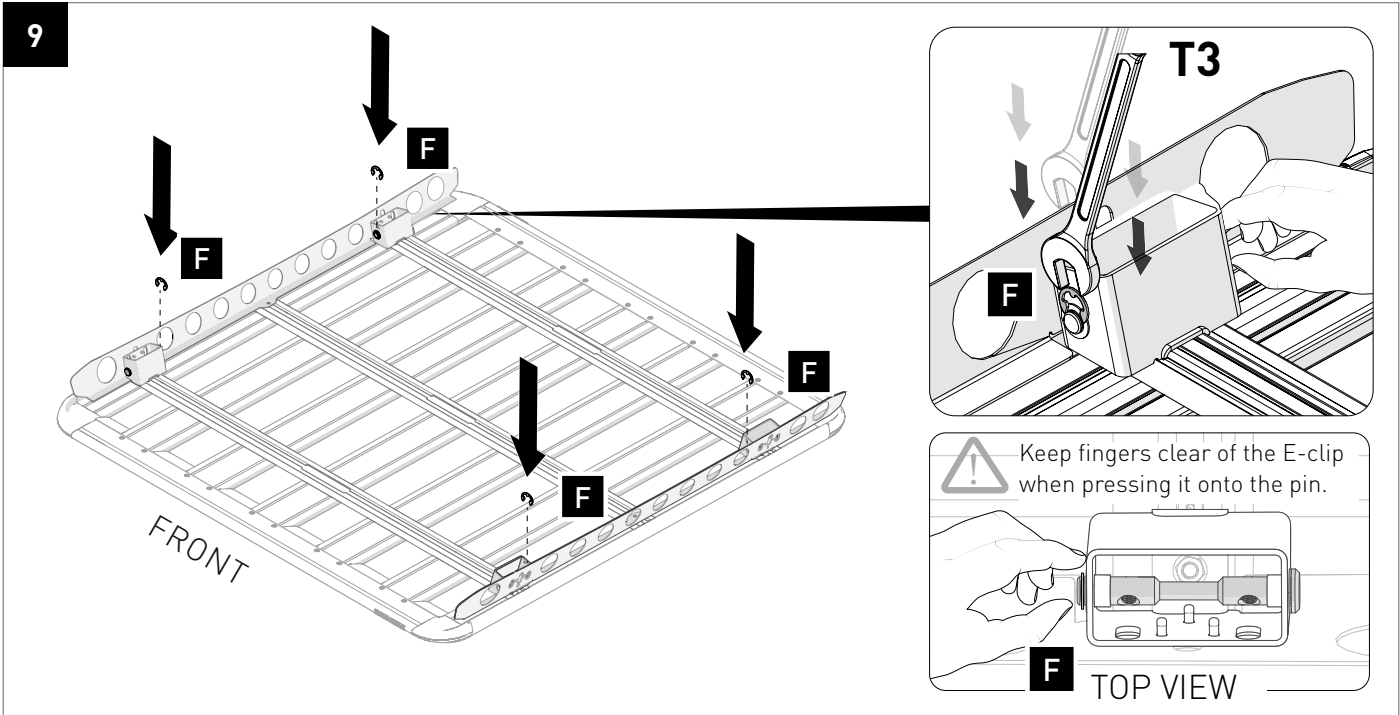
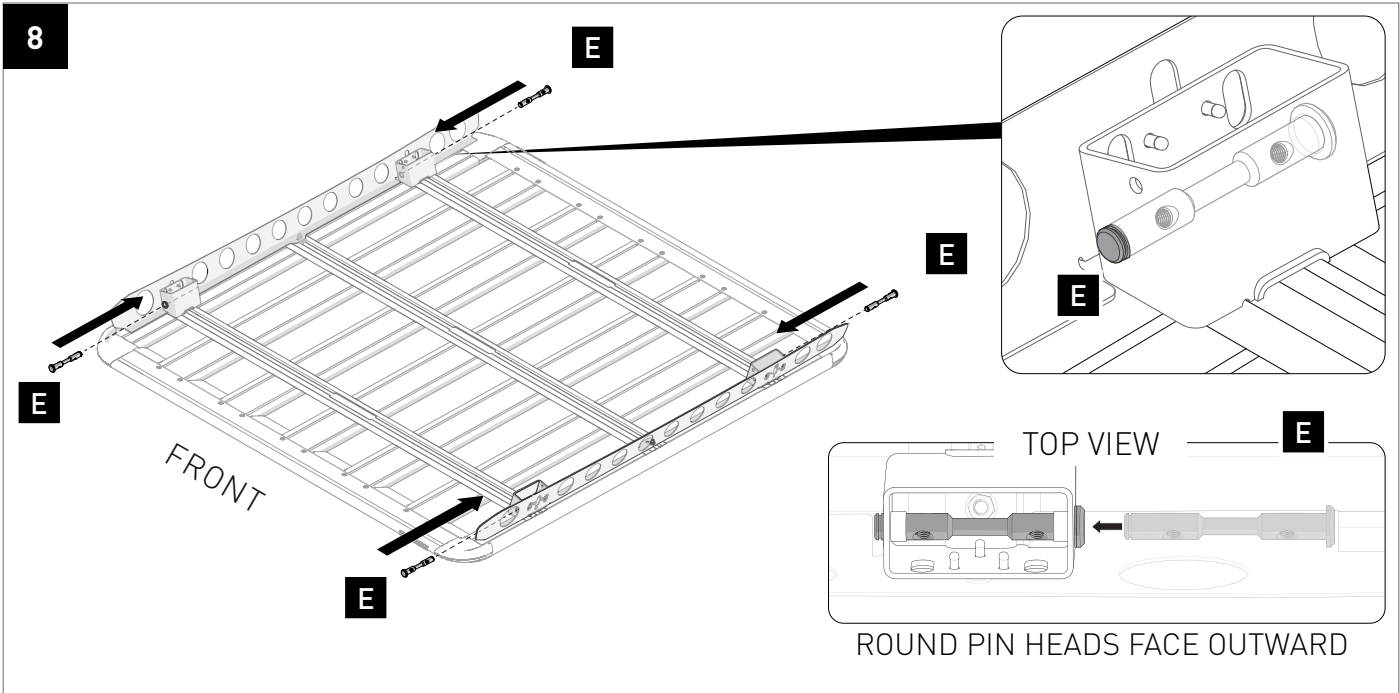
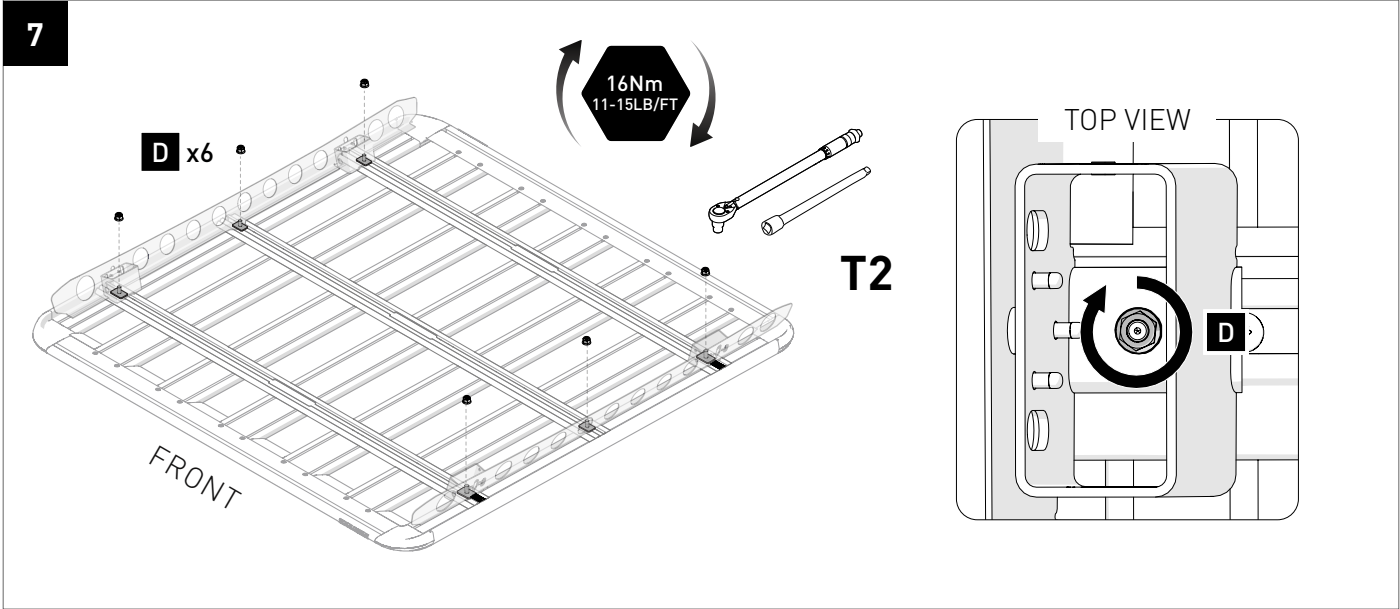
4c

At the **Rear** of the Platform ensure that the **49mm** measuring strips are inserted into the underbar and pushed all the way out towards the edge of the platform.



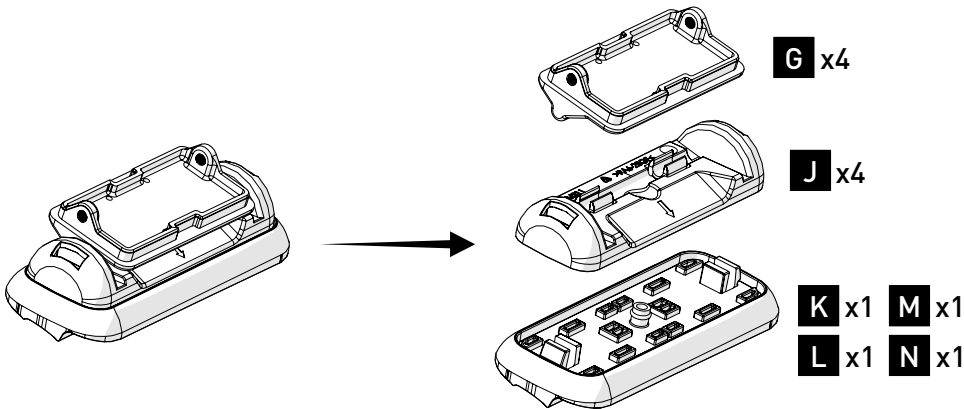
Repeat this step on the opposite side



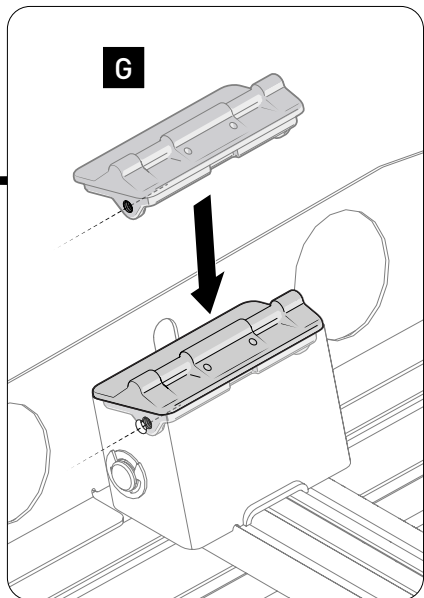
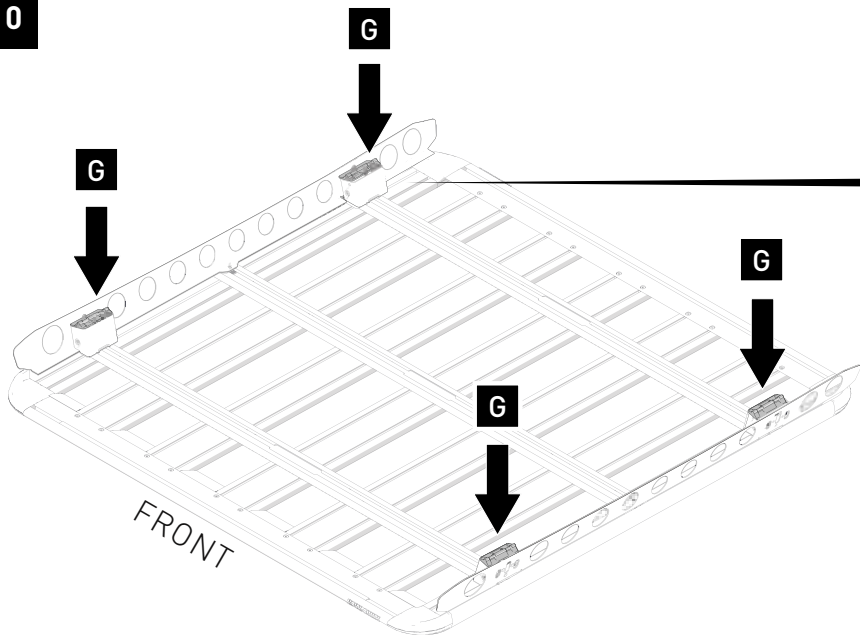


NOTE

The feet assemblies come pre-assembled for packing purposes. Separate the parts, then proceed with the following steps.

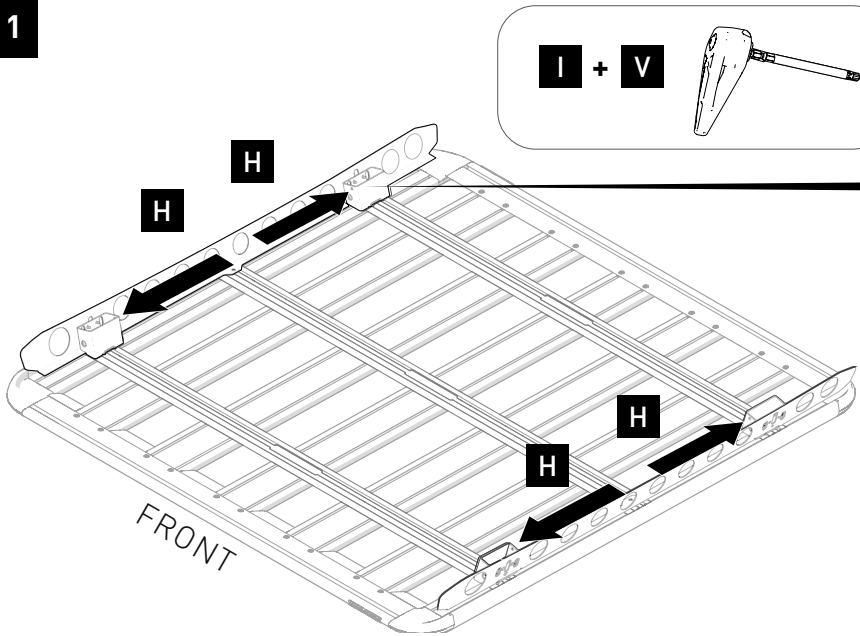


10

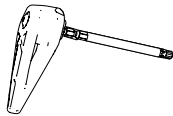


SCREW HOLES FACE CENTRE

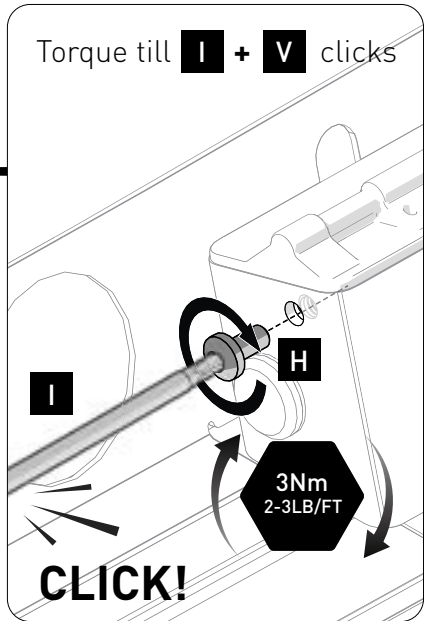
11



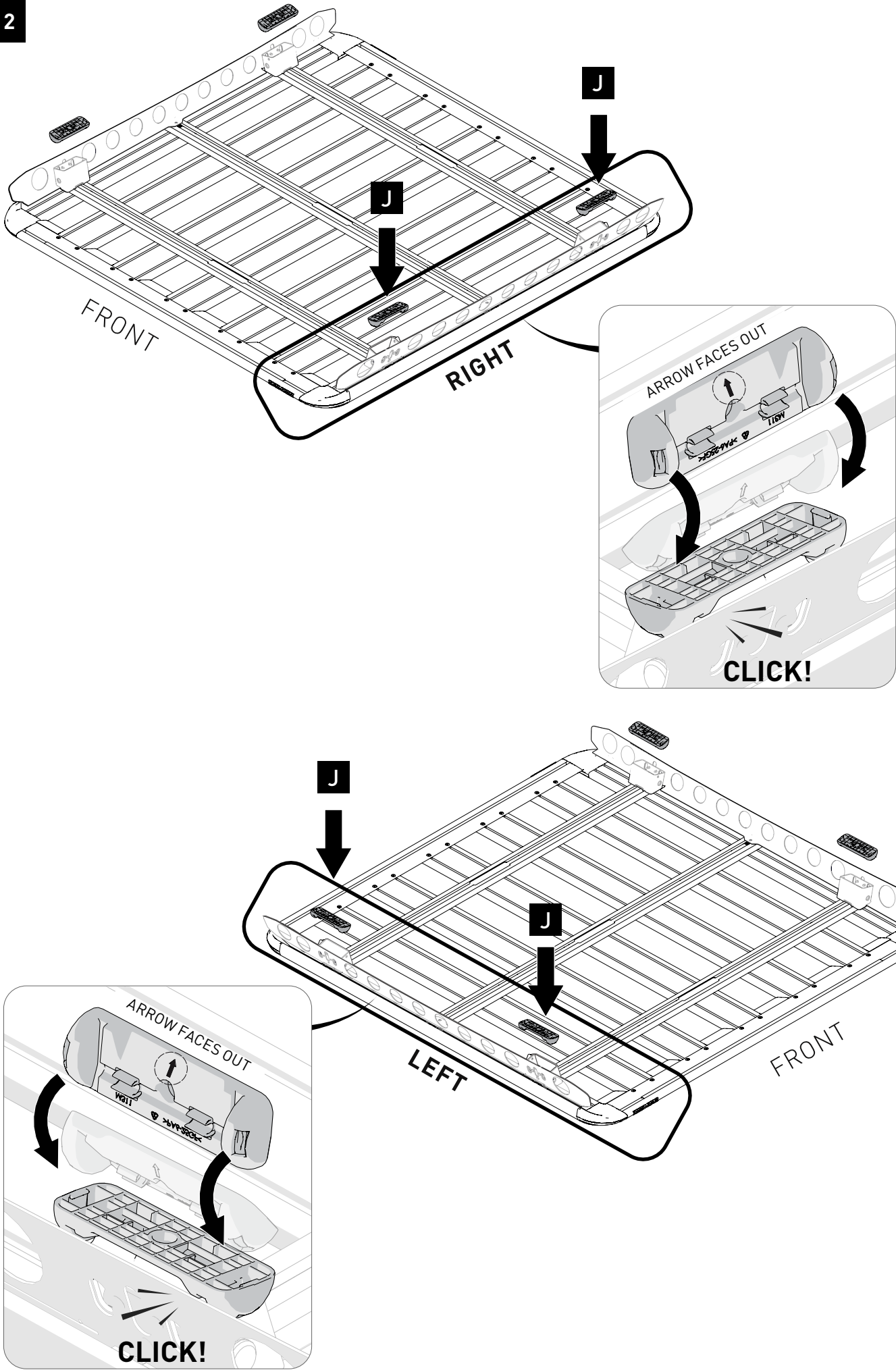
I + **V**



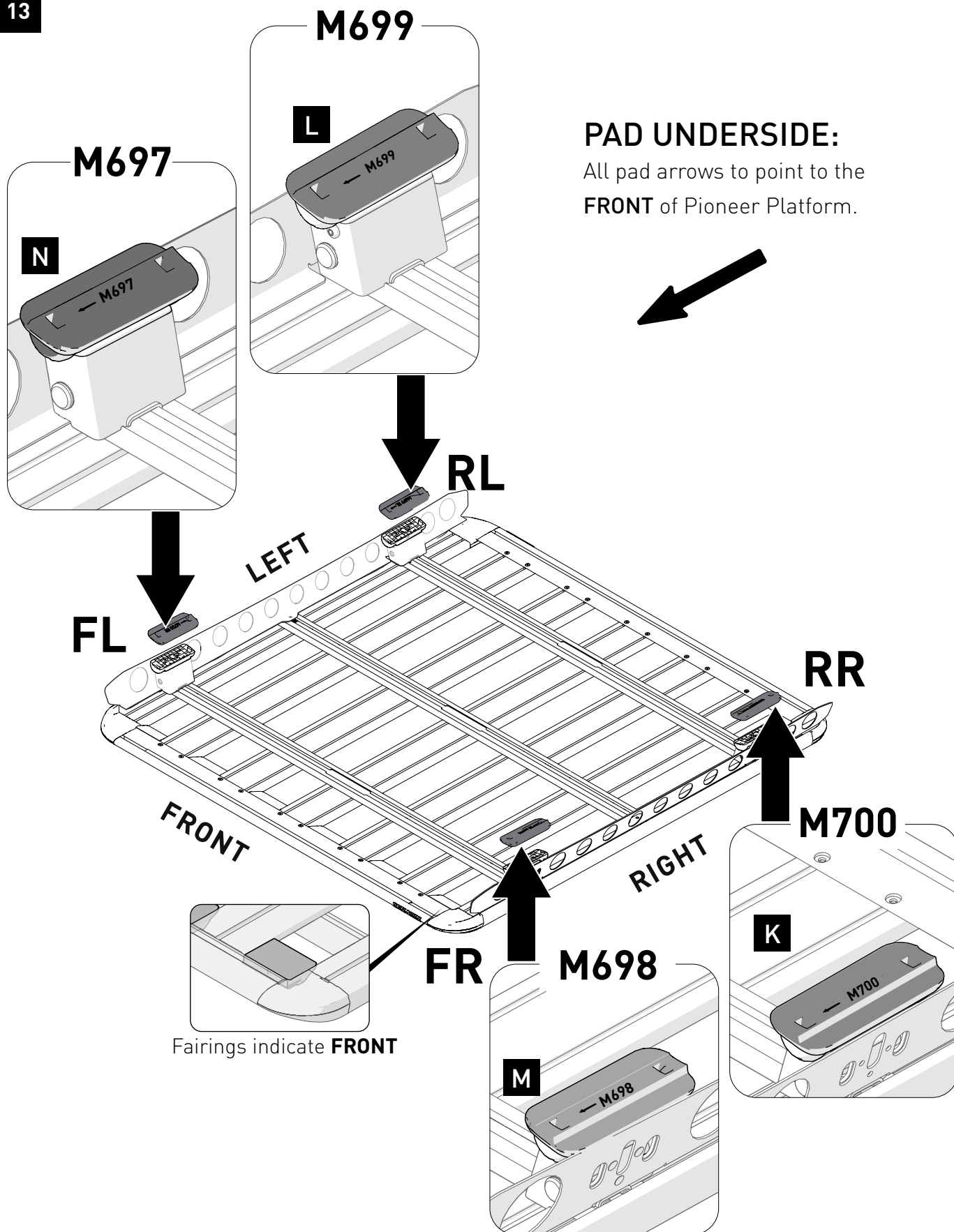
Torque till **I** + **V** clicks



12



13



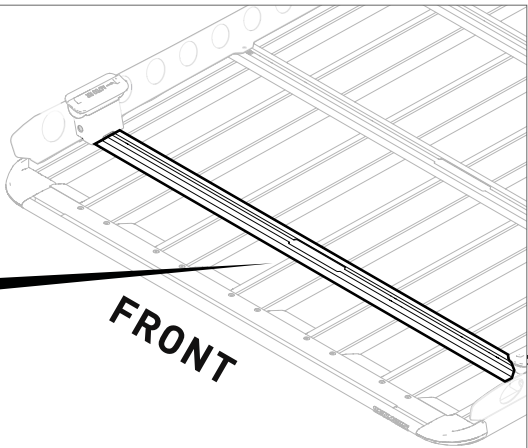
NOTE

If required, remove Base **J** and the pad from the leg. Ensure Base **J** is fully seated against the pad, then reinstall the base in the correct orientation.

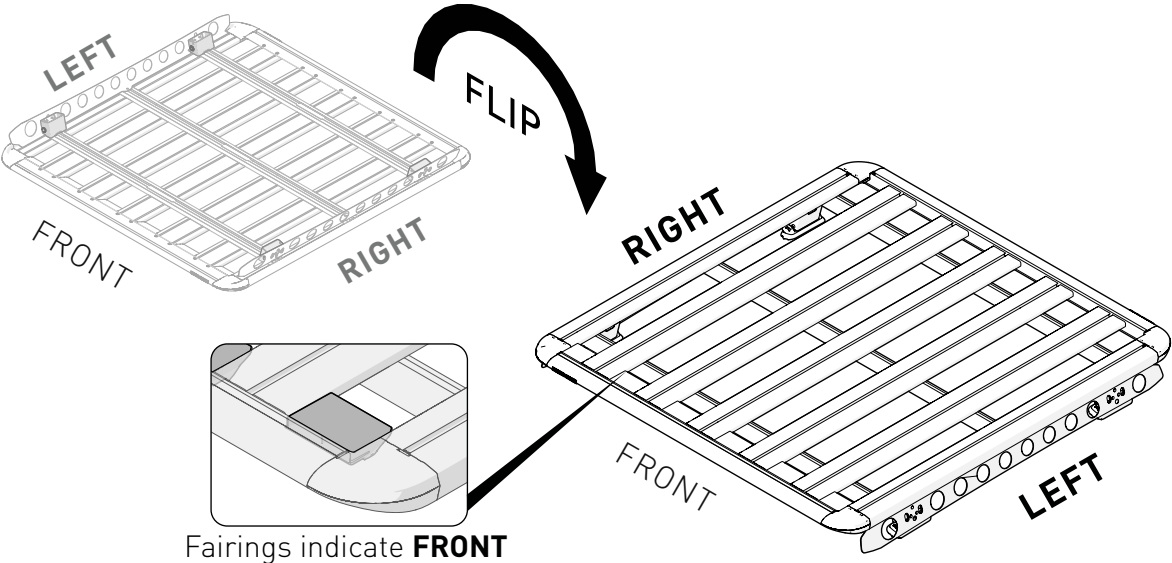
14a

REFER TO PIONEER FITTING INSTRUCTIONS

See the Backbone Installation section:
Cut the underbar cover to 996mm and
insert between the blades.

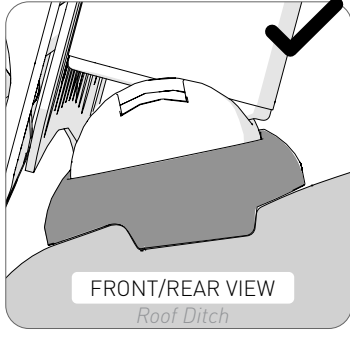
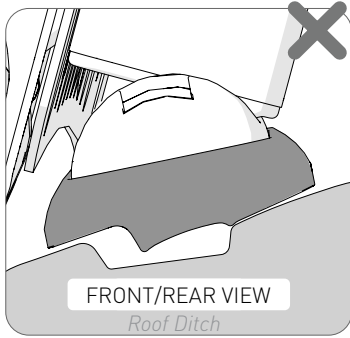
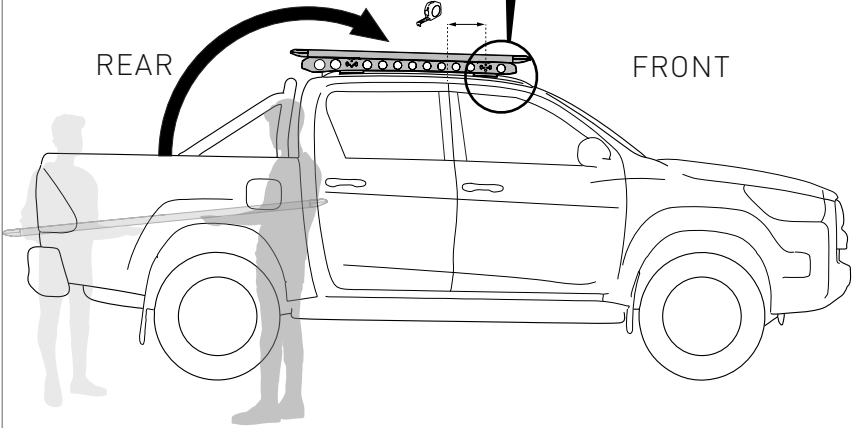
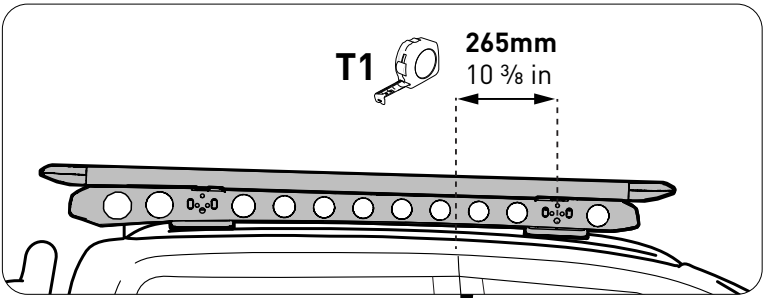


14b

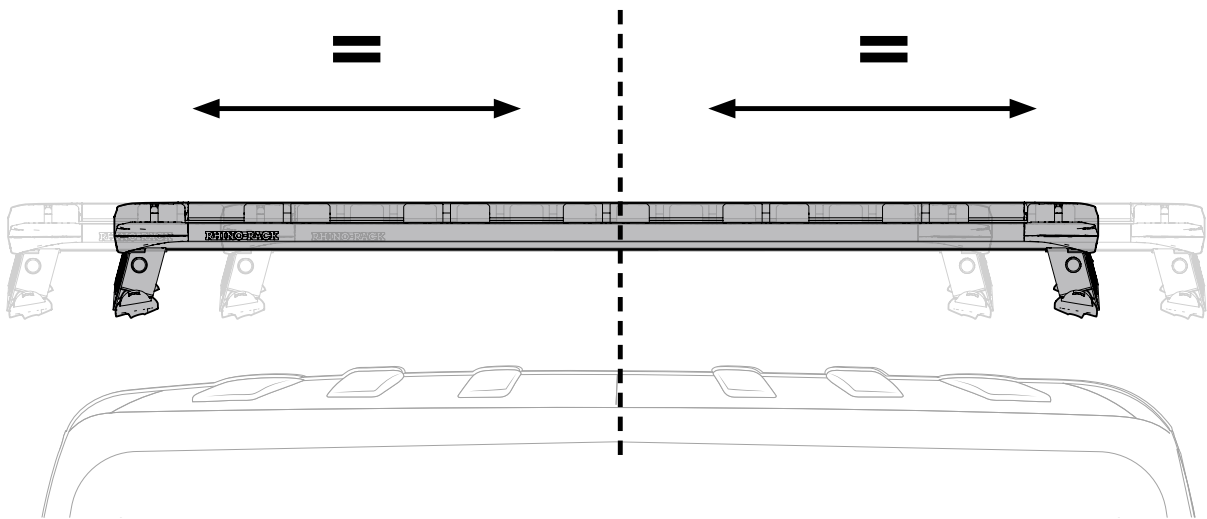


15a

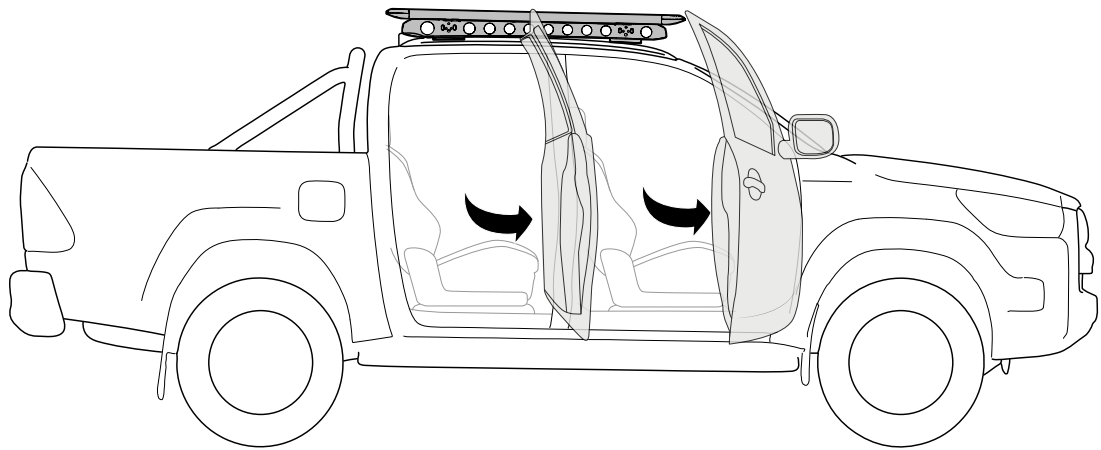
Place the assembly onto the roof of the vehicle in the correct orientation.



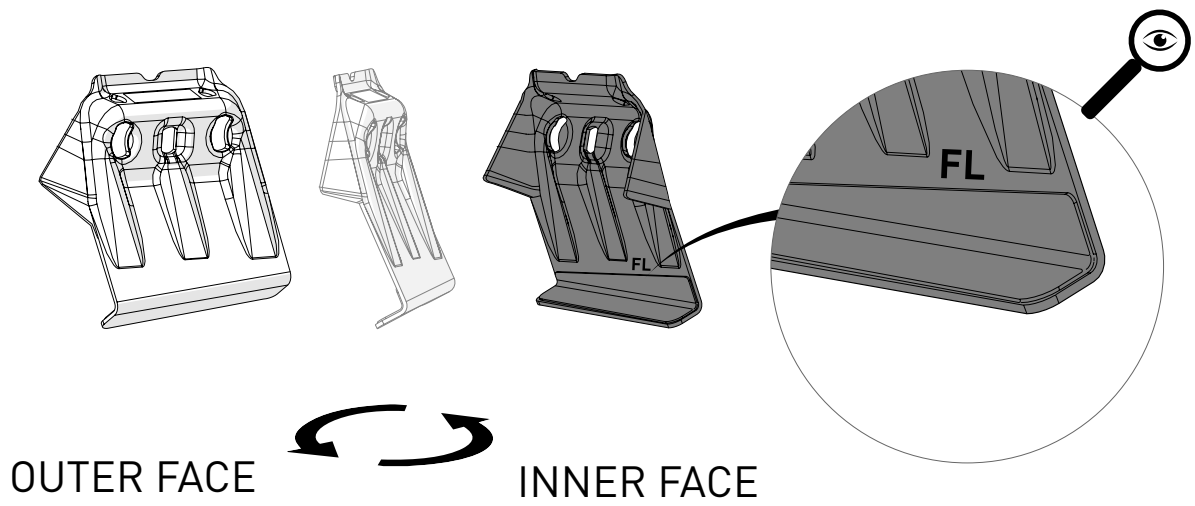
15b



16



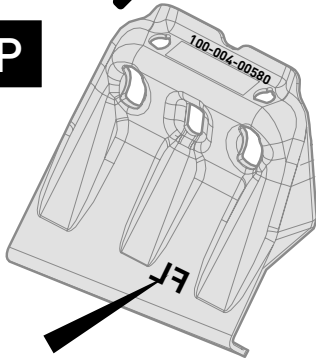
17 Clamp



100-004-00580



P



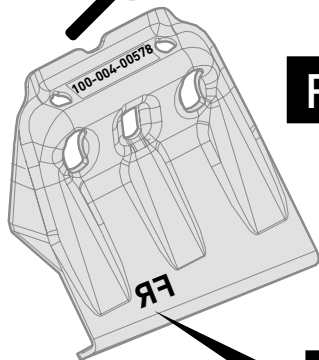
FL

FRONT



100-004-00578

R



FR



LEFT

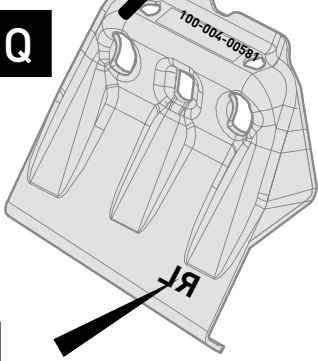


RIGHT

100-004-00581



Q



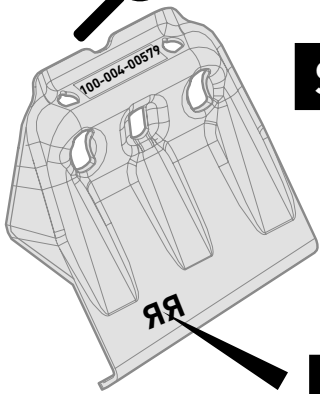
RL

REAR



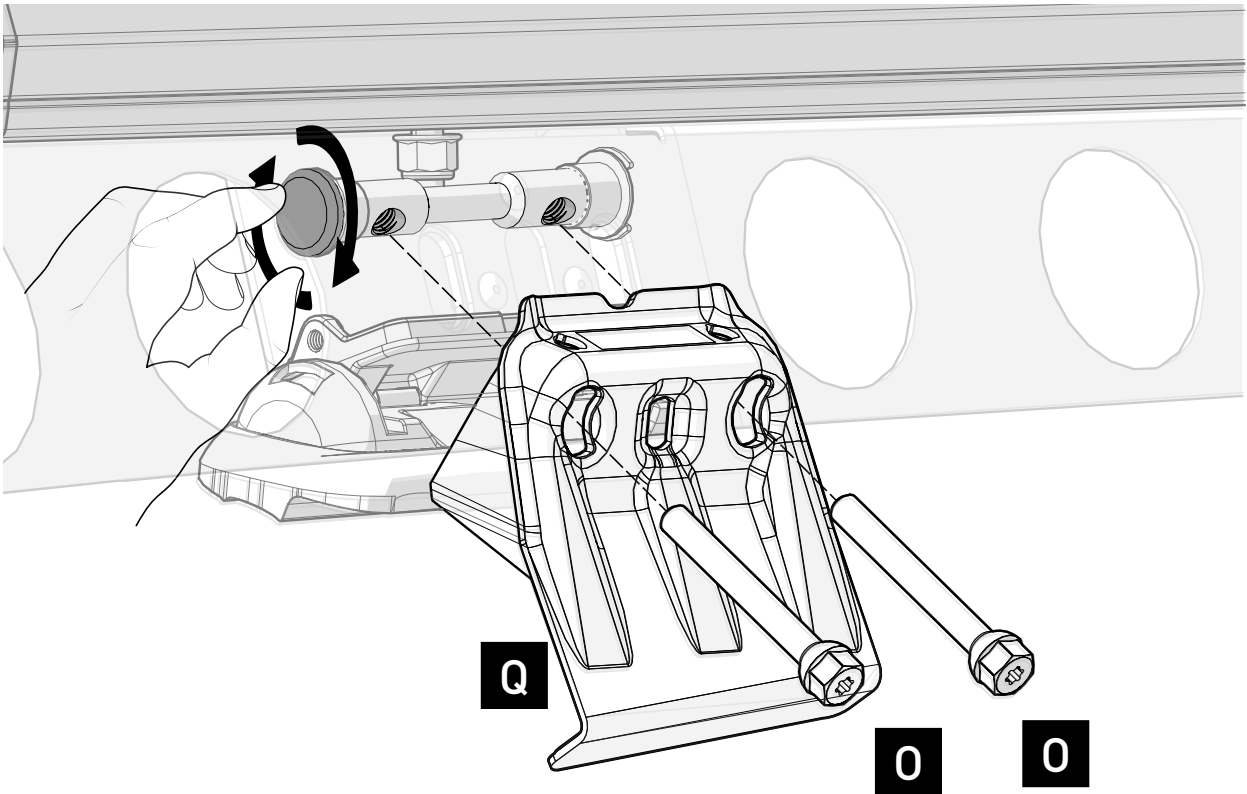
100-004-00579

S

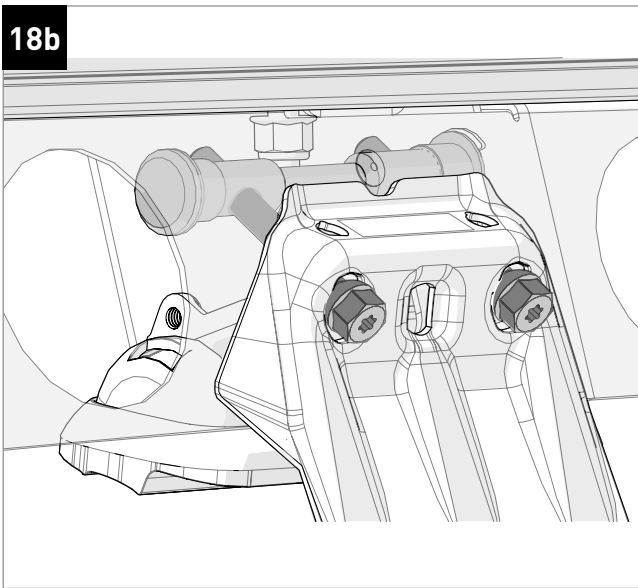


RR

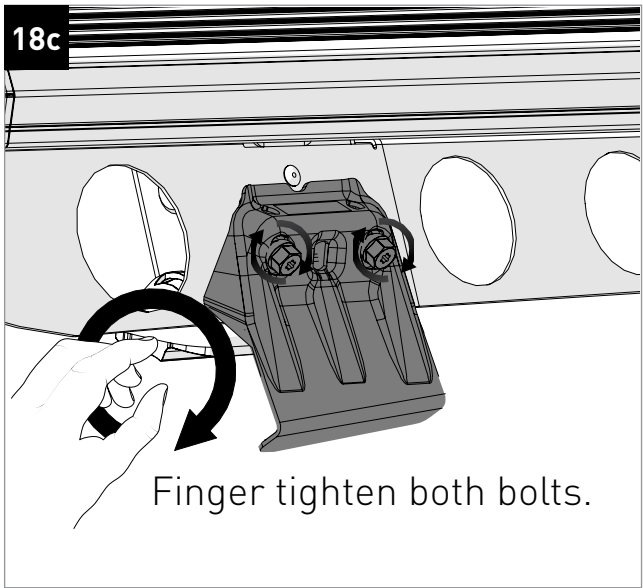
18a



18b



18c



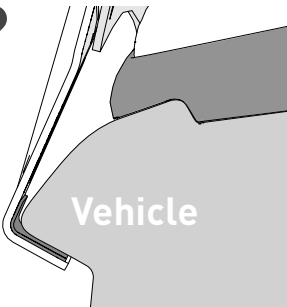
NOTE:

SIDE VIEW

The clamp must have full contact along its face.



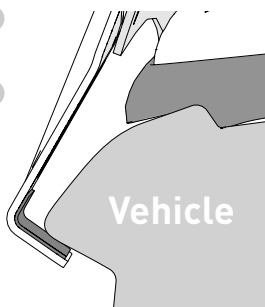
Clamp



Vehicle

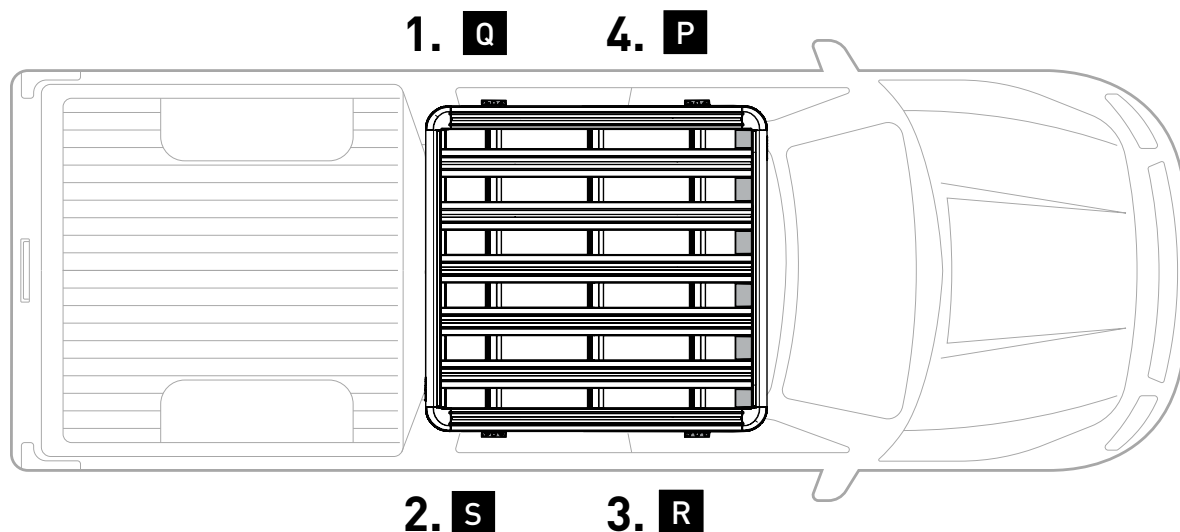


Clamp

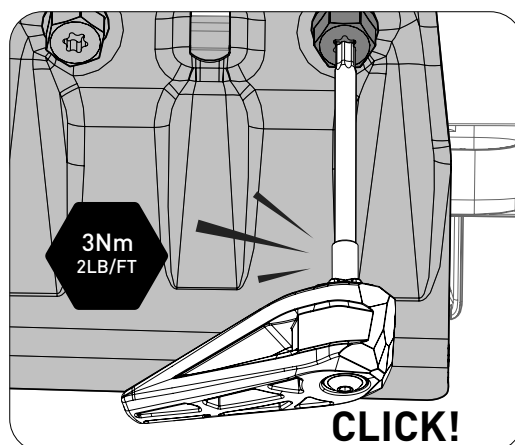
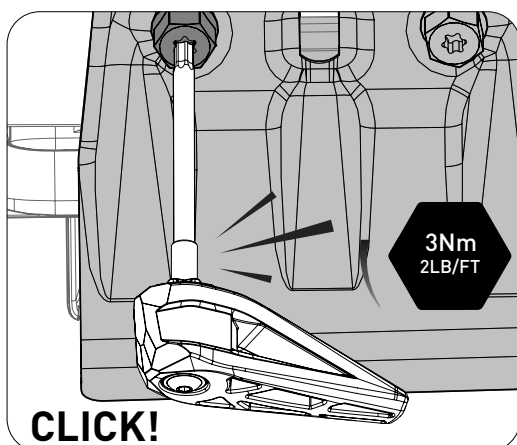
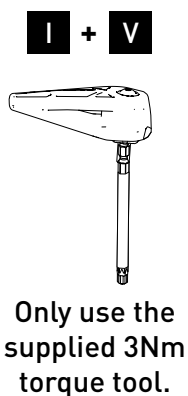


Vehicle

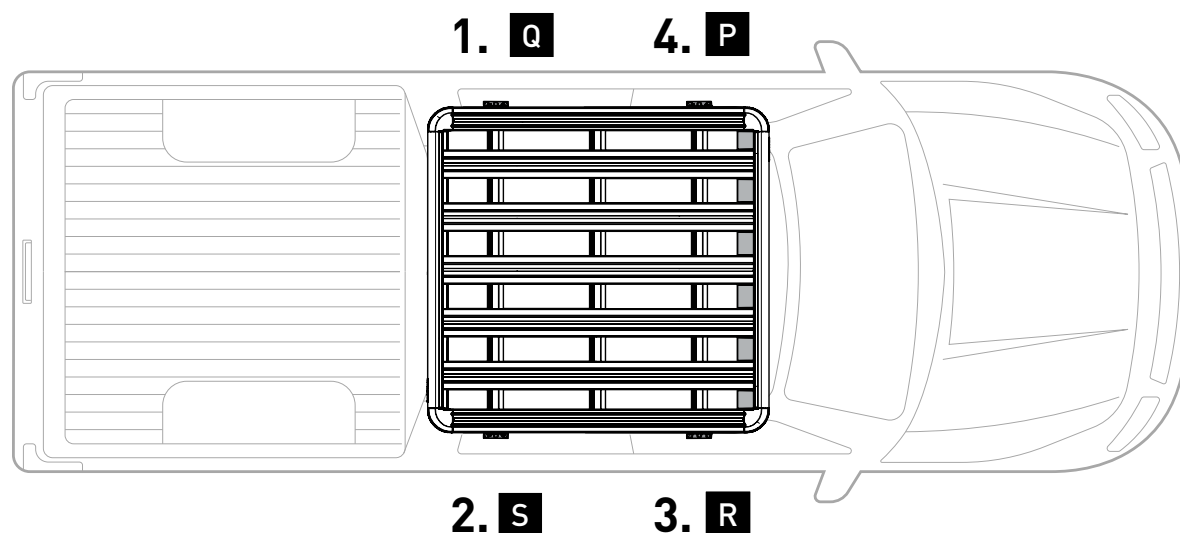
19 Repeat step 18 for Clamp **S**, **R** and **P** in that order



20 On **RL** clamp **Q**, tighten the bolts using the supplied torque tool **I** + **V**, until it clicks signifying they are torqued to spec **3 Nm**.

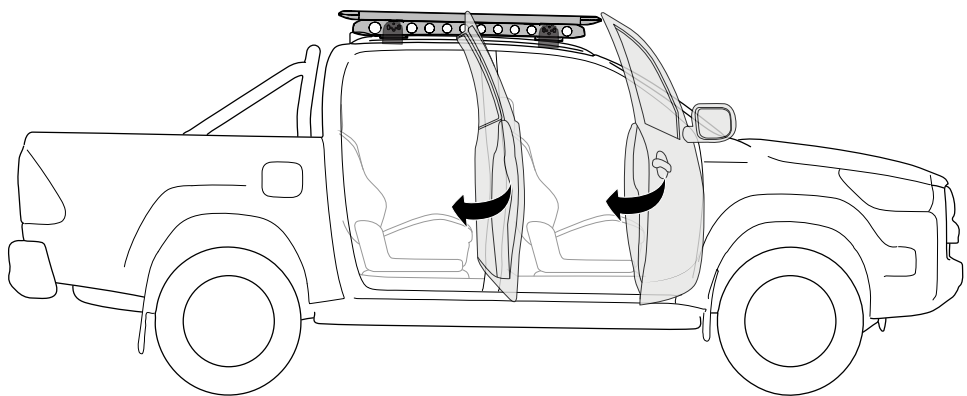


21 Repeat step 20 for Clamp **S**, **R** and **P** in that order.

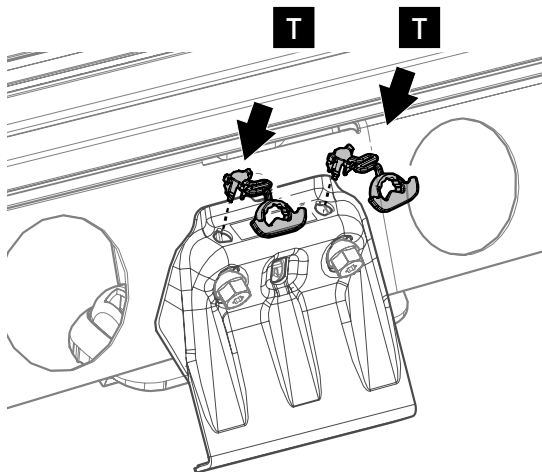


22

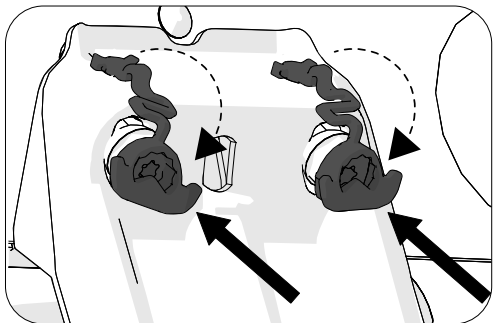
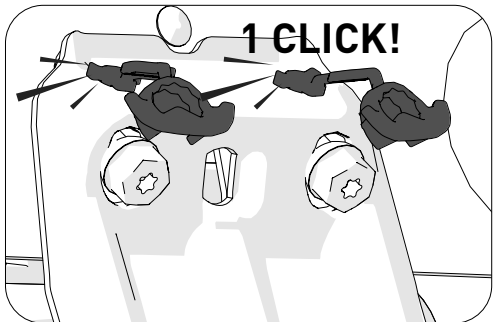
Close doors **carefully** to confirm all clamps clear the doors



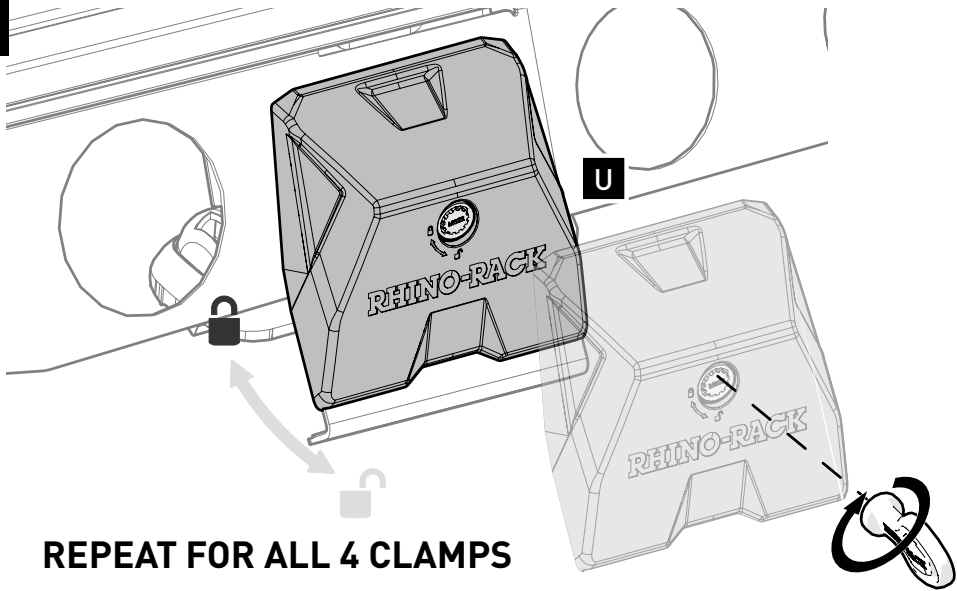
23



REPEAT FOR ALL 4 CLAMPS

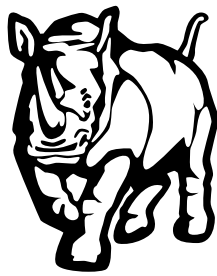


24



REPEAT FOR ALL 4 CLAMPS

NOTES



RHINO-RACK®

MAKE SPACE FOR ADVENTURE

RHINORACK.COM

Rhino-Rack AUSTRALIA

22A Hanson Pl,
Eastern Creek, NSW, 2766

Rhino-Rack USA

19822 E 22nd Ave,
Aurora, CO, 80011