

# Jeep Grand Cherokee WL and L Overland & Trailhawk (incl. 4xe) 2022-on Tactical / Round Nudge Bar

### **IMPORTANT! – READ BEFORE INSTALLATION**

- When installed in accordance with these instructions, the front protection bar does not affect the operation of the vehicles SRS airbags.
- This product must be installed exactly as per these instructions using only hardware supplied.
- Take a few moments to read instructions thoroughly before beginning work.
- In the event of damage to any bar component please contact OFFROAD ANIMAL to arrange repair/replacement of components.
- Do not use this product for any vehicle make or model other than that specified on these instructions.
- Do not remove labels from this product.
- This product and its fixings must not be modified in any way unless stated in these fitting instructions.
- The installation of this product is recommended for trained personnel.
- These instructions are correct at time of publication. OFFROAD ANIMAL cannot be held responsible for the impact of any changes subsequently made by the vehicle manufacturer. If you find something has changed please contact us to let us know!
- During installation it is the duty of the installer to check correct operation/clearances of all components.
- If Instructions are to be printed for reference in the workshop, it is recommended that they are printed in colour, for best legibility.

# GENERAL CARE AND MAINTENANCE

Only wash the product with a PH neutral car wash to prevent paint damage and discolouration.

Plastic parts may be maintained with silicone spray.

Do not use acidic or alkaline based cleaning products.

It is important to perform regular checks (pre trip or on an annual basis) on the installed product. Checks include:

- Visual inspection for damage (eg. cracks, chips, dents etc.)
- Electrical wiring is not rubbing anything or worn out
- Bolts are torqued to correct specification (see torque guide below)

For touching up small stone chips, Offroad Animal recommends the following paint products:

- Dupli-Color Trim & Bumper Paint Black (TB101)
- VHT Hood, Bumper & Trim Paint Black (SP27)

#### **BOLT TORQUE SETTINGS**

Use the following bolt torques on all general fasteners, unless otherwise specified.

GENERAL FASTENERS		
Size	Torque Nm	
M5	5 Nm	
M6	9 Nm	
M8	22 Nm	
M10	44 Nm	
M12	77 Nm	

Use the following bolt torques on all structural front bar mount and tow point fasteners, and rear towbar fasteners, unless otherwise specified.

FRONT BAR MOUNTS AND TOW POINTS + REAR TOWBAR		
Size	Torque Nm	
M10	57 Nm	
M12	100 Nm	
M14	164 Nm	
M16	248 Nm	

Always use a torque wrench to set correct torque settings. Ensure torque wrench is set to Nm unit of measurement. Otherwise perform conversion to lb-ft.

# **PARTS LISTING**

**IMPORTANT:** Check all parts are present before beginning work! Contact OFFROAD ANIMAL if something is missing.

## Main Parts - In the Box

Qty	Part Number	Description	Image
1	NB-JGC-WL- 22-ASM1	WL Round Nudge Bar Welded Assy	
	1		OR
1	NB-JGC-WL- 22-ASM2	WL Tactical Nudge Bar Welded Assy	
1	B-0900R	WL Nudge Bar Chassis Bracket	
1	B-0900L	WL Nudge Bar Chassis Bracket	

4	T-0065	WL Nudge Bar Crush Tube Spacer 16mm	
	TACTICAL NUDGE BAR ONLY		
2	B-0904	WL Stealth Nudge Bar Centre Gusset	
4	СРНР020	Plasitc Hole Insert, 28MM, Black, Tigerlink Hardware CPHP020	

# **ROUND Nudge Bar Fasteners – Contained in Small Parts Kit Bag**

Qty	Part Number	Description
4	4 M10 x 25 BLACK ZINC	Bolt Hex, M10X25x[1.5], GR8.8 ZP, ISO4042 ZnNi
4		BLACK PASSIVATED FINISH
4	M10 FW LHD BLACK ZINC	WASHER, FLAT M10X28.5X2.5, ISO4042 ZnNi
4		BLACK PASSIVATED FINISH
4	M10 FLANGE NUT	Flange Nut, M10x1.5 G8.8 ZP
4	M12X55	Bolt Hex, M12X55x1.75, GR8.8 ZP
4	M12 FLAT WASHER	M12 FW
4	M12 FLANGE NUT	Flange Nut, M12x1.75 G8.8 ZP

# **TACTICAL Nudge Bar Fasteners – Contained in Small Parts Kit Bag**

Qty	Part Number	Description	
10	M6x16 BHCS BLACK ZINC	SCREW, BUTTON HEAD CAP, M6X16X1 GR12.9,	
		ISO4042 ZnNi BLACK PASSIVATED FINISH	
10	M6 FLAT WASHER BLACK	M6 Flat Washer, 12x6.1x1, ISO4042 ZnNi BLACK	
10	ZINC	PASSIVATED FINISH	
10	M6 FLANGE NUT	Flange Nut, M6x1 G8.8 ZP	
4	M10 x 30	Bolt Hex, M10X30x[1.5], GR8.8 ZP	
4	M10 FW LHD WASHER, FLAT M10X28.5X2.5		
4	M10 FLANGE NUT	Flange Nut, M10x1.5 G8.8 ZP	
4	M12X55	Bolt Hex, M12X55x1.75, GR8.8 ZP	
4	M12 FLAT WASHER	M12 FW	
4	M12 FLANGE NUT	Flange Nut, M12x1.75 G8.8 ZP	

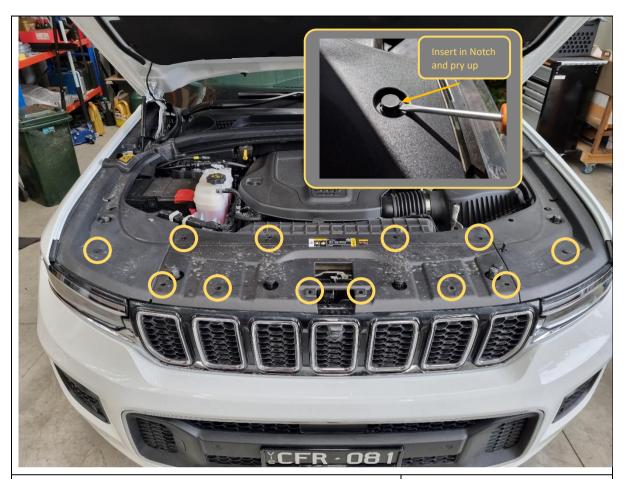
The following tools will be required to install the product.

Hand Tools	Power Tools	Workshop Equipment
Metric Socket Set 8-19mm	Electric/Air Impact	Masking Tape
	Driver (Optional)	
Socket Extension Bar		Marker Pen
	Angle Grinder	
Metric Spanner Set 8-19mm		Cable Ties
	Air Hacksaw	
Torx Key Set	or	
	Oscillating Multi Tool	
Flat blade screwdriver	or	
	Jigsaw	
Trim tool		
	Electric drill	
10mm drill bit		

# **WORKSHOP SAFETY**

It is the responsibility of the installer to always complete works in a safe manner. Make sure the following safety equipment is available and precautions are observed whilst fitting this product.

Hearing Protection	Always wear ear protection when using power tools.
Eye Protection	Ensure eye protection is always worn when cutting or drilling.
Manual Handling	Do not attempt to lift bar assemblies or rock sliders on your own.  Always use two people to lift or use mechanical Lifting aid such as hydraulic lifting trolley.
Vehicle Support	Always ensure vehicle is properly supported when working on it. Do not attempt to fit products whilst suspension work is being carried out. Do not work under a vehicle supported only by a jack.



This product is designed to work in conjunction with the Offroad Animal Pre Runner, Recovery Points and Hidden Winch Mount.

Please read and familiarise yourself with ALL fitting instructions for the products you are installing prior to commencing.

- 1. Open the bonnet.
- 2. Remove 12x plastic push rivets by levering center section upwards using flat bladed screwdriver or trim tool, as shown.
- 3. Lift and remove the radiator cover.

#### **TOOLS REQUIRED**

Flat Blade Screwdriver or Trim Tool

#### **FASTENERS**

12x Plastic Push Rivets



- 4. Remove 6x T40 Torx screws from the top of the grille.
- 5. Remove 2x 10mm hex head bolts from the top of the grille.

T40 Torx driver

10mm socket/spanner

#### **FASTENERS**

6x T40 Torx screws

2x 10mm hex head bolts



- 6. Remove 9x 10mm hex head bolts from the bottom of the bumper.
- 7. Remove 2x plastic push rivets from the bottom of the bumper.

Please note the bolt arrangement on the Trailhawk may be different to the Overland shown. In any case, remove all fasteners on the bottom of the bumper.

#### **TOOLS REQUIRED**

10mm socket/spanner

Flat Blade Screwdriver or Trim Tool

#### **FASTENERS**

9x 10mm hex head bolts

2x Plastic Push Rivets



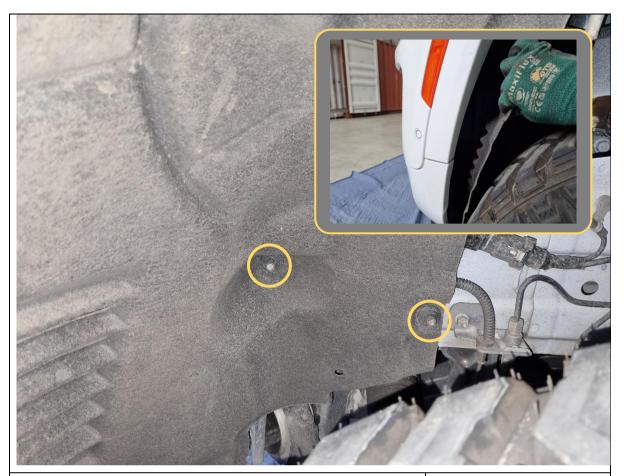
8. On each side, remove 5x 8mm hex head screws securing the wheel arch liner to the bumper.

#### **TOOLS REQUIRED**

8mm socket/spanner or Phillips Head screwdriver

#### **FASTENERS**

5x 10mm hex head bolts



- 9. Remove at least 3x of the black plastic nuts securing the wheel arch liner to the body using a 10/11mm socket.
- 10. Pull down on the front half of the wheel arch liner to expose the inside of the bumper.

Note: Fully removing the wheel arch liner will make it easier for fitment later but is not mandatory.

#### **TOOLS REQUIRED**

10/11mm socket

#### **FASTENERS**

Plastic nuts



11. Pull and release the clips retaining the flare to the bumper + quarter panel.

It is easiest to insert an 8mm socket on the inside and push the trim clips outwards (see inset photos).

12. Use a rag to protect the flare and to prevent it from flapping around.

#### **TOOLS REQUIRED**

8mm socket (optional)

Rag



- 13. On both sides, remove the 10mm hex head bolt securing the bumper to the quarter panel.
- 14. Disconnect sensor looms, camera loom and washer hoses on both sides of the bumper (see inset photos).

There should be 1x sensor loom plug each side, a camera loom plug on the LH, and washer hose on the RH.

#### **TOOLS REQUIRED**

10mm socket

#### **FASTENERS**

2x 10mm hex head bolts



15. If headlight washers are equipped, pull out the plastic cover cap and unclip it from the plastic washer stem.

**TOOLS REQUIRED** 



16. Remove the bumper by releasing the clips on either side and lifting the top flap of the grille over the bonnet rubber stops.

TOOLS REQUIRED

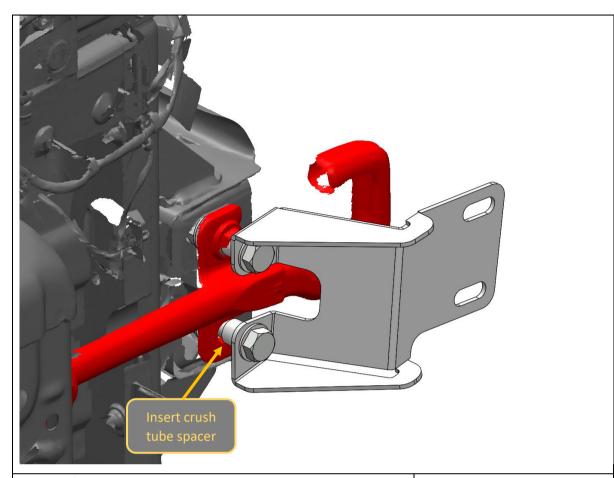


- 17. The Offroad Animal Pre Runner is designed to mount to either the genuine Jeep tow hooks or Offroad Animal Recovery Points.
- 18. If Offroad Animal Recovery Points are to be used, install the recovery points now. Refer to recovery point fitting instructions for installation procedure.
- 19. If factory tow hooks are being used, remove the 2x 16mm hex head bolts on each side.

16mm socket/spanner

#### **FASTENERS**

4x 16mm hex bolts



- 20. If using genuine Jeep tow hooks, install the nudge bar chassis bracket to the outside of the tow hooks.
- 21. Use 2x 16mm crush tube spacers in between the bracket and tow hook.
- 22. If the stock impact beam is still being used, re-use the factory 16mm hex head bolts to secure the bracket.
- 23. If bolting to the Offroad Animal Hidden Winch Mount bracket, use the provided M12x55 hex head bolts, washers and nuts.
- 24. Repeat for other side.

16mm socket/spanner or 18/19mm socket/spanner

#### **FASTENERS**

4x 16mm hex head bolts or 4x M12x55mm hex head bolts 4x M12 flat washers 4x M12 flange nuts



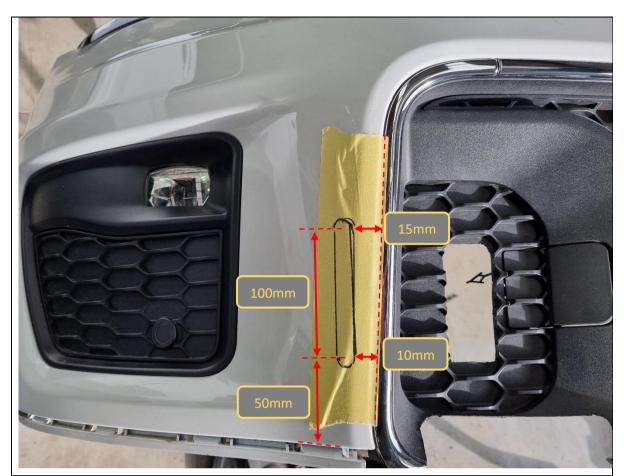
25. If using the Offroad Animal Recovery Points, bolt the nudge bar chassis bracket to the outside of the recovery point using the provided M12x55 hex head bolts, washers and nuts. Do this on both sides.

#### **TOOLS REQUIRED**

18/19mm socket/spanner

#### **FASTENERS**

4x M12x55mm hex head bolts 4x M12 flat washers 4x M12 flange nuts



- 26. The bumper needs to be cut to clear the nudge bar chassis brackets.
- 27. Mark out a 100mm long x 10mm wide slot using the image above as reference.

Marker pen

Masking tape



28. Unclip the loom behind the marked area and secure to the side and out of the way with cable ties.

Trim tool or Flat head screwdriver

Cable ties



29. Use a 10mm drill bit and drill 2x holes at each end of the marked slot.

Corded/cordless Drill

10mm drill bit



30. Using a jigsaw or other cutting tool, cut out the area marked.

Jigsaw or Air hacksaw or similar



- 31. Use a utility knife to clean up the edges of the cut.
- 32. If also fitting Offroad Animal Recovery Points, Pre Runner or Hidden Winch Mount, now is the time to make the bumper cuts required for those accessories. Refer to respective fitting instructions for details.

Utility knife



- 33. Refit the trimmed bumper back onto the vehicle. Re-trim if necessary to get the nudge bar mounts to poke through.
- 34. Reconnect all looms and washer hose lines. Re-fit flares, inner wheel guards and radiator covers in reverse order to disassembly.

16mm socket/spanner

#### **FASTENERS**

4x 16mm hex bolts



- 35. Fit any extra accessories such as lights or radio antennas to the nudge bar now. Please note mounting accessories on top of the middle of the nudge bar may obscure the vision of the front camera.
- 36. Accessories can be mounted to the round nudge bar using clamp style bull bar tube mounting brackets. The tube specification is 63.5mm, so a 60-65mm size clamp should be compatible.



- 37. The tactical nudge bar is designed to accommodate the Offroad Animal Slim 32" LED light bar with the mounting feet facing inwards. Other similar 32" size light bars should fit but are not confirmed.
- 38. The tactical nudge bar also has holes and slots on the top face to mount driving lights and radio antennas.



39. Fit the 2x Tactical Nudge Bar centre gussets to the back of the Tactical Nudge Bar, using 5x M6x16 black button head bolts, black flat washers and flange nuts on each gusset.

#### **TOOLS REQUIRED**

4mm hex/Allen key

#### **FASTENERS**

10x M6x16 black button head 10x M6 black flat washer 10x M6 flange nut



- 40. Fit the nudge bar to the mounts.
- 41. The round nudge bar fits in between the mount brackets.
- 42. Loosely secure with 2x M10x25 hex bolts, flat washers and flange nuts per side.

16mm socket/spanner

#### **FASTENERS**

4x M10x25 hex bolt 4x M10 flat washer 4x M10 flange nut



- 43. The Tactical Nudge Bar fits over the outside of the mount brackets.
- 44. Loosely secure with 2x M10x30 hex bolts, flat washers and flange nuts per side.

Note: It is easiest to use a socket to hold the M10 hex bolt and guide it in to the hole.

#### **TOOLS REQUIRED**

16mm socket/spanner

#### **FASTENERS**

4x M10x30 hex bolt 4x M10 flat washer 4x M10 flange nut



- 45. Adjust the nudge bar on its slots so that it is sitting level. The top surface should be just below the bottom edge of the grille.
- 46. Once happy with alignment, tighten the nudge bar bolts.

16mm socket/spanner



47. For the Tactical Nudge Bar, plug the bolt access holes with the supplied plastic plugs for a sleek finish.

TOOLS REQUIRED



Congratulations! You're done! Go overlanding and enjoy your newly protected Grand Cherokee.

Why not complete the tough look of the Grand Cherokee front end with the Offroad Animal Hidden Winch Mount and Pre Runner?