

Part Number: 3450200 F/KIT: 6172247

Product
JEEP DELUXE BULL BAR

Description:

Suited to vehicle/s:

CHRYSLER WRANGLER JK JEEP 2006 ON

WARNING

REGARDING VEHICLES EQUIPPED WITH SRS AIRBAG;

When installed in accordance with these instructions, the front protection bar does not affect operation of the SRS airbag.

ALSO, NOTE THE FOLLOWING:

- ♦ This product must be installed exactly as per these instructions using only the hardware supplied.
- ♦ In the event of damage to any bull bar component, contact your nearest authorised ARB stockist. Repairs or modifications to the impact absorption system must not be attempted.
- ♦ Do not use this product for any vehicle make or model, other than those specified by ARB.
- ♦ Do not remove labels from this bull bar.
- ♦ This product or its fixing must not be modified in any way.
- ♦ The installation of this product may require the use of specialized tools and/or techniques
- ♦ It is recommended that this product is only installed by trained personnel
- ♦ These instructions are correct as at the publication date. ARB Corporation Ltd. cannot be held responsible for the impact of any changes subsequently made by the vehicle manufacturer
- During installation, it is the duty of the installer to check correct operation/clearances of all components
- ♦ Work safely at all times
- ♦ Unless otherwise instructed, tighten fasteners to specified torque

ARB 4x4 ACCESSORIES

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GENERAL CARE AND MAINTENANCE

By choosing an ARB Bar, you have bought a product that is one of the most sought after 4WD products in the world. Your bar is a properly engineered, reliable, quality accessory that represents excellent value. To keep your bar in original condition it is important to care and maintain it following these recommendations.

- Prior to exposure to the weather your bar should be treated to a Canuba based polish on all exposed surfaces. It is recommended that this is performed on a six monthly basis or following exposure to salt, mud, sand or other contaminants.
- As part of any Pre Trip Preparation, or on an annual basis, it is recommended that a thorough visual inspection of the bar is carried out, making sure that all bolts and other components are torqued to the correct specification. Also check that all wiring sheaths, connectors, and fittings are free of damage.
 Replace any components as necessary.
 - This service can be performed by your local authorised ARB stockist.

HAVE AVAILABLE THESE SAFETY ITEMS WHEN FITTING PRODUCT:

Protective eyewear



Hearing protection



NOTE: 'WARNING' notes in the fitting procedure relate to OHS situations, where to avoid a potentially hazardous situation it is suggested that protective safety gear be worn or a safe work procedure be employed. If these notes and warnings are not heeded, injury may result.

FASTENER TORQUE SETTINGS:

| SIZE | Torque Nm | Torque lb ft | | |
|--|-----------|--------------|--|--|
| M6 Trilobial Screws for BUFFERS, Table Below | | | | |
| M6 | 6Nm | 4.4lbft | | |
| M6 | 9Nm | 4lbft | | |
| M8 | 22Nm | 16lbft | | |
| M10 | 44Nm | 32lbft | | |
| M12 | 77Nm | 57lbft | | |

OPTIONAL LIGHT SETS TO SUIT THIS PRODUCT: Up to IPF 900 SERIES FOG OR DRIVING LIGHT SETS

> WARN WINCHES TO FIT THIS PRODUCT MID SIZE FRAME 6000LB – 9500LB TI SERIES 9500LB POWER PLANT 9500LB – 12000LB RC SERIES 9000LB

> > **BASIC TOOL KIT**

JEEP BAR ACCESSORY KITS

3550030 FOG LIGHT INSERT COVERS

| PART NO | QUANTITY | DESCRIPTION |
|---------|----------|---------------------|
| 3199960 | 2 | MOUNTING PLATES |
| 3162468 | 2 | FOG LIGHT INSERT |
| 6151317 | 8 | SCREWS # 8-18 X 5/8 |

THIS KIT IS FOR WHEN YOUR VEHICLE DOES NOT COME FITTED WITH FOG LIGHTS.

3550040 NON WINCH BAR PAN COVER

| PART NO | QUANTITY | DESCRIPTION |
|---------|----------|----------------|
| 3314652 | 1 | PAN COVER |
| 6151021 | 4 | BOLT M8 X 20MM |
| 6151132 | 4 | NUT FLANGE M8 |
| 4581046 | 4 | WASHER FLAT M8 |

THIS KIT IS FOR WHEN YOUR BAR IS NOT GOING TO BE FITTED WITH A WINCH.

3550050 CRUSH CAN EXTENDER KIT.

THIS KIT MUST BE PURCHASED IF YOUR VEHICLE IS FITTED WITH CRUSH CANS.

| PART NO | QUANTITY | DESCRIPTION |
|---------|----------|--------------------------------|
| 3757526 | 2 | CRUSH CAN MOUNTS |
| 6151143 | 6 | 8-18 X 20 SELF DRILL SCREWS |

| USE | PART No | QTY | DESCRIPTION |
|-----------------------|-------------|--------|---|
| | 6151357 | 8 | BOLT M10 x 1.5 x 30mm SEMS ASSY |
| | 6151168 | 2 | BOLT M12 X 1.75 X 80mm |
| TO FIT BAR TO | 4581050 | 2 | WASHER SPRING 1/2" |
| VEHICLE CHASSIS | 4581049 | 2 | WASHER FLAT 1/2" |
| | 3199848 | 2 | NUT PLATE CAGED M12 |
| | 6151305 | 2 | NUT CAGED M12 X 1.75 |
| | 5848342 | 2 | PACKER |
| | 60.00.12 | _ | |
| | 6151262 | 2 | BOLT M8 x 20mm BLACK |
| CONTROL BOX BRACKET | 4581075 | 2 | WASHER FLAT M8 BLACK |
| | 3756262 | 1 | CONTROL BOX BRACKET |
| | 6151132 | 2 | NUT FLANGE M8 |
| | | | |
| | 3757047 | 2 | BRACKETS LIGHT BOLT ON |
| LIGHT BRACKETS | 6151234 | 4 | BOLT M8 X 25MM BLACK |
| | 4581075 | 8 | WASHER FLAT M8 BLACK |
| | 6151212 | 4 | NUT NYLOC M8 |
| | | | |
| MINIMED BY AMERICA | 6151213 | 4 | BOLT M6 x 20MM BLACK |
| NUMBER PLATE BRACKET | 6151017 | 2 | BOLT M6 X 16MM |
| ASSEMBLY | 5848302 | 2 | PACKER NYLON BLACK |
| | 4581082 | 4 | WASHER FLAT M6 x 20mm BLACK |
| | 6151128 | 4 | NUT FLANGE M6 |
| | 6151162 | 2 | NUT NYLOC M6 |
| | 3757048 | 1 | NUMBER PLATE MOUNT |
| | 3757049 | 1 | NUMBER PLATE PIVOT |
| | 6151046 | 4 | WASHER FLAT M6 |
| | 180302 | 10 | CABLE TIES |
| WINCH FITMENT | 6151073 | 4 | BOLT 3/8" X 1 ½" |
| ,,,,,,,,,, | 4581040 | 4 | WASHER FLAT M10 |
| | 6151357 | 2 | BOLT M10 x 1.5 x 30mm SEMS ASSY |
| | 6151321 | 2 | NUT FLANGE M10 |
| | | | |
| | 4681011L | 1 | BRACE WING LHS |
| WING BRACE TO WINGS | 4681011R | 1 | BRACE WING RHS |
| | 6151262 | 8 | BOLT M8 X 20MM BLACK |
| | 4581075 | 8 | WASHER FLAT M8 BLACK |
| | 6151132 | 8 | NUT FLANGE M8 |
| | | | |
| INDICATORS TO BAR | 3500080 | 1 | INDICATOR KIT |
| | 6821198 | 1 | INDICATOR LOOM KIT |
| | <u> </u> | | |
| | 3163008 | 2 | BUFFERS JEEP WRANGLER |
| BUFFERS TO BAR | 6151372 | 8 | SCREW 14G X 1" PLASTITE HEX (TRILOBIAL) |
| | | | , , , , , , , , , , , , , , , , , , , |
| | 3757531 L/R | 1 PAIR | BRACKETS FOG LIGHT |
| FOG LIGHT FITTING KIT | 6151254 | 8 | SCREW M4 X 20MM |
| 6172261 | 6151404 | 8 | NUT FLANGE M4 |
| V2. 25V1 | 4584294 | 8 | WASHER FLAT M4 X 9MM |
| | 6821184 | 1 | 1300MM RED WIRE LOOM |
| | 180701 | 8 | SCOTCH LOKS |
| | 6151262 | 4 | M8 X 20MM BOLTS BLACK |
| | 4581075 | 4 | WASHER FLAT M8 X 20MM BLACK |
| | 6151132 | 4 | NUTS M8 FLANGE |
| | 0131132 | | NO IS MOTEMINE |
| | | | |
| | | | |

ASSEMBLY SEQUENCE FOR BULL BAR INSTALLATION. PLEASE READ AND UNDERSTAND FITTING INSTRUCTIONS BEFORE ATTEMPTING TO FIT BAR TO VEHICLE



1. To fit a bar to vehicle, the plastic bumper and all hardware behind bumper must be removed from vehicle.

See photos below.

THIS PHOTO OF VEHICLE ON LHS IS NOT FITTED WITH FOG LIGHTS



- 2. JK Jeep Wrangler come in three versions of bumper bars.
- 3. No Fog lights.
- 4. Fog lights inboard.
- 5. Fog lights outboard.







6. This is how the vehicle must be prepared before fitting a bar to the vehicle.







- 7. If the vehicle comes equipped with crush cans, these have to be removed from the steel bumper section.
- 8. Mark out section to be cut out, and by using a angle grinder fitted with a turbo disc, carefully remove the sections on either side of bumper section.
- 9. Clean up sharp edges with a file and paint with black paint to protect against corrosion.

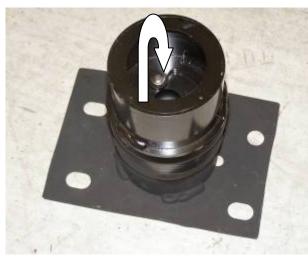


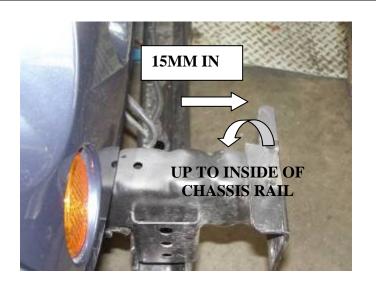


- 10. Next step is to attach crush can extensions to crush cans using self drilling screws.
- 11. When attaching extensions to crush cans make sure they are concentric to each other.

3 SCREWS PER CRUSH CANS.

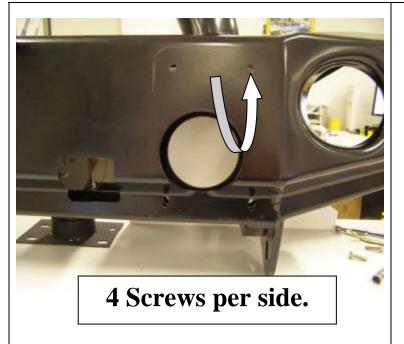






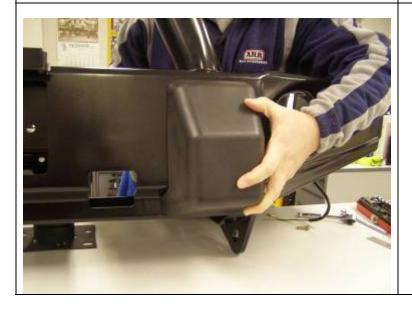
- 12. If a winch is going to be fitted, the right hand side mounting plate on end of chassis has to be notched for winch clearance.
- 13. Cut top flange up to chassis rail and 15mm in.

VIEWED FROM RHS OF VEHICLE



- 14. Before fitting bar to vehicle, all lights and buffers must be fitted to bar .
- 15. Support bar so you can get to the front and rear when fitting parts mentioned above.
- 16. To fit buffers to bar, hold buffer against front of bar and secure from inside of bar using 6mm trilobial screws.
- 17. Tighten to torque specifications as per table.
- 18. Do not over tighten.



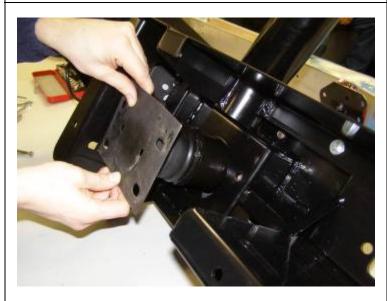






19. Next step is to fit indicator light to bar. Fit plastic plugs into cut outs and screw light into plastic plugs from front of bar.





- 20. Fit crush cans back into rear of bar and align the hole pattern.
- 21. It is helpful to put a smear of silicon between crush can plate and rear of bar mounting face to keep crush can in position whilst lifting bar to jeep chassis.





22. Secure fog light to mounting bracket using 4mm hardware.

PHOTO IS LHS FOG LIGHT ASSEMBLY



- 23. Secure fog light assembly to bar using 8mm hardware.
- 24. Fit top bolt through bar then into fog light mounting bracket, and secure with 8mm flange nut
- 25. Lift fog light assembly as per photo to enable you to fit 8mm flange nut to bolt fitted from inside of bar.

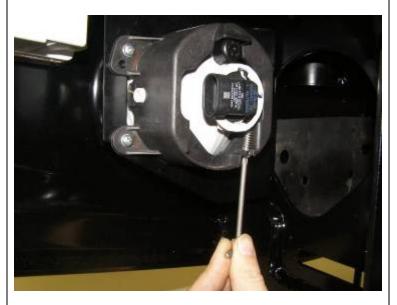


26. Adjust fog light so it fits in the centre of the bar light apperture, then tighten both bolts.



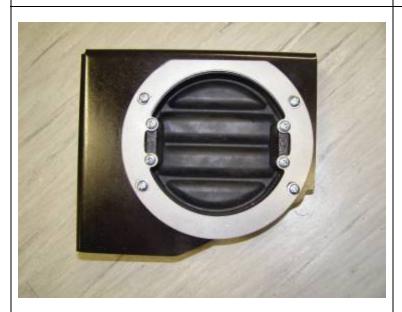
27. This is how the bar looks when all above componentry is fitted.

LHS OF VEHICLE



28. When the bar is fitted to vehicle, final vertical adjustment of fog light can be carried out using a (Torx T20 key).

PHOTO IS OF LHS OF VEHICLE



- 29. If vehicle is not fitted with fog lights, a blanking cover plate kit (part no 3550030) can be purchase.
- 30. The kit comprises of 2 plastic moulded covers, 8 screws and two mounting plates.
- 31. In photo on the left, it is fasten to fog light mounting bracket.



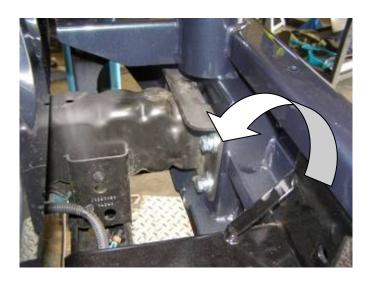


32. When cover is fitted to fog light mounting bracket, it fits to the bar the same method as fitting a fog light assembly.

PHOTO IS OF RHS OF VEHICLE.



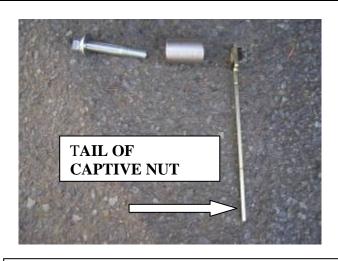
33. Photo on left shows cover plate fitted to a non fog light bar.



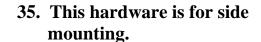
34. The next step is to fit bar to vehicle. With the help of a friend, lift bar onto chassis and secure using 10mm hardware, Finger tighten only.

4 BOLTS PER SIDE

VIEWED FROM LHS OF VEHICLE



Set up RHS of vehicle





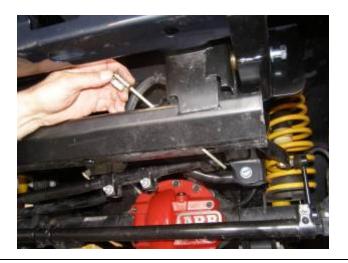
Caged nut fitted to nut plate



- 36. Packer fits in between inside of chassis rail and bar in rear part of captive slot
- 37. Pass 12mm bolt plus washers through outside of bar, through packer and just protruding into chassis rail.
- 38. The reason for just protruding into chassis rail is because there is a brace inside of chassis rail.

VIEWED FROM UNDER RHS OF VEHICLE.

YOU WILL HAVE TO BEND TAIL OF CAPTIVE NUT PLATE TO FIT INTO CHASSIS RAILS.



39. Pass caged nut plate from top through crossmember, then upwards into open end of chassis rails.



40. When all bolts are fitted, tighten to correct torque, brake off the part of the captive nut plate which hangs through the hole in vehicle crossmember with a pair of pliers.

(ARROW IS POINTING TO PART TO BE BROKEN OFF)



TOP VIEW LHS OF VEHICLE.

- 41.If a number plate is to be fitted to vehicle, you must assemble as per photo opposite.
- 42. To assemble, using a 6mm x
 25mm bolt, flat washer, pass
 through outer frame, fit black
 nylon packer then pass
 through inner frame and
 secure using a 6mm nyloc nut.
- 43. Tighten just enough so the assembly can pivot.
- 44. The reason for a pivoting number plate assembly is to allow the number plate to pivot up when the winch is being operated.



- 45. When the number plate assembly is assembled, fit to bar using 6mm x 16 mm bolt plus 6mm hardware.
- 46. Tighten bolts to torque specifications.
- 47. If bar is going to be a non winch bar, a pan cover kit (part no. 3550040) can be purchased, see paragraph 61 for fitting instructions.



WINCH MOUNTING PLATFORM

- 48. As mentioned above, this bar can be fitted with a series of different Warn winches.
- 49. If a mid size frame type winch is to be used, a control box bracket has to be fitted to har.
- 50. Lower winch onto mounting platform of bar. Fit 3/8" square nuts into winch retaining cavities.
- 51. Bolt up from under bar using 3/8" x 1 ½"bolts, spring and flat washers



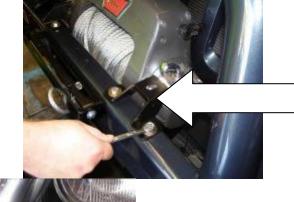
- 52. Fit control box bracket to bar using M8 x 25mm bolts plus 8mm hardware.
- 53. Fit control box to control box bracket and connect terminals to winch as per Warn instructions.
- 54. Cable tie all power cables together and keep clear of all moving parts, hot parts and sharp edges.
- 55. If a RC Series winch is to be fitted, the same as above applies except the RC winch has its own bolt on control box mount.



56. If a Power Plant 9500LB – 12000LB is going to be used. The top compressor cover must be removed by undoing the 4 capped head screws.



- 57. Place protective cloths over top of bar and lift winch onto winch mounting platform.
- 58. Refit top cover.
- 59. Secure and connect terminals the same method as paragraph 53
- 60. Winch has built in control box feature, therefore no control box bracket required.



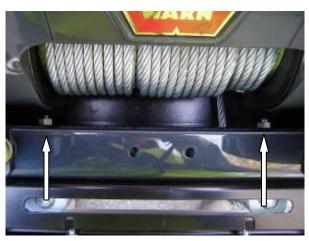
ARB

Hold nyloc nut Using ¼" drive Ratchet with extension

- 61.Lastly, fitting a TI 9500LB winch, same method as a power plant winch.
- 62.If fitting lights to bar, the light mounting brackets must be fitted at this stage.
- 63. The brackets are bolted to bar using 8mm hardware and secured using a 8mm nyloc nuts.
- 64. The bracket faces back towards the winch so when the lights are fitted the high lift jack, if used, does not hit the light.
- 65. If lights are going to be fitted to a bar fitted with a power plant winch, the brackets face outwards, therefore a hi lift jack cannot be used.



66. The next part to fit to bar is the roller fairlead. This is secured to bar using 10mm hardware.



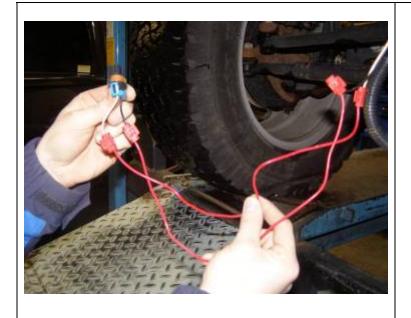
67. Pass 10mm bolt assembly through front of roller fairlead, through bar and secure from behind using a 10mm flange nut.

ARROWS INDICATE 10MM FLANGE NUTS



- 68. Fit wing braces to bar using 8mm hardware.
- 69. When all bolts are fitted, tighten to torque specifications.

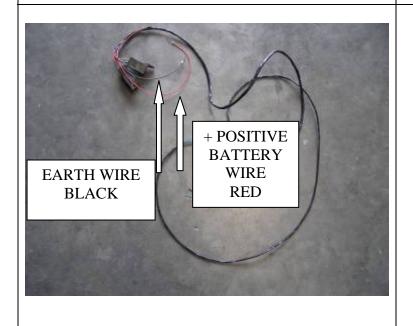




- 70. To wire up fog lights, you will find in the bolt kit a 1300mm (51") length of red wire which has to be cut into four equal lengths.
- 71. The next step is cut off the fog light plugs from vehicle loom leaving approximately 100mm (4") of wire on the ends of the plugs.
- 72. Using scotch lok fasteners supplied in the bolt kit, fasten the red wire lengths in between plug ends and vehicle loom.
- 73. This process enables the fog light plugs to reach fog lights fitted to the bar.

(THIS EXTENDING OF THE FOG LIGHT LOOMS ONLY APPLIES IF YOUR BUMPER HAS INBOARD FOG LIGHTS)

74. Using cable ties, secure all wiring.



75. To wire up indicators from bar to vehicle indicators, a loom must be fitted which is supplied in fitting kit.

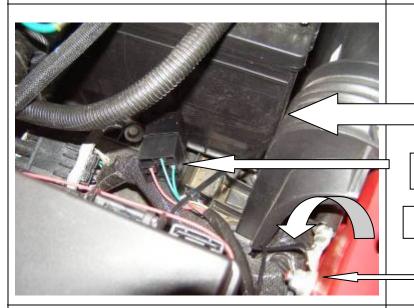


76. Photo on left shows engine layout on a right drive vehicle.

Positive red wire is fitted to battery after all wiring is completed

Earth cable is fitted to body stud.

Feed loom along inner guard



77. Fasten earth wire (black) to side of vehicle body stud

BATTERY

Cable tie relays to vehicle wiring loom

EARTH WIRE

BODY STUD



78. Feed loom under bracket and down between washer bottle and engine bay brace.





- 79. Feed loom down until LHS indicator spliced wiring is in position to be attached to vehicle indicator.
- 80. From the bar loom, fit the yellow wire/black trace to vehicle indicator loom white wire/green trace securing with a scotch lok.
- 81. To wire up the bar indicator, scotch lok yellow to yellow, black to black.
- 82. After securing wiring, run loom along inside vehicle crossmember to the RHS of vehicle, secure to vehicle loom using cable ties.



- 83. To wire the indicators to the RHS of vehicle, green wire/black trace from bar loom to white wire/brown trace from vehicle indicator, secure using scotch lok.
- 84. Lastly to wire bar indicators to bar loom ,black to black, green to yellow, secure using scotch lok.



TAPED LHS LOOM



TAPED RHS LOOM



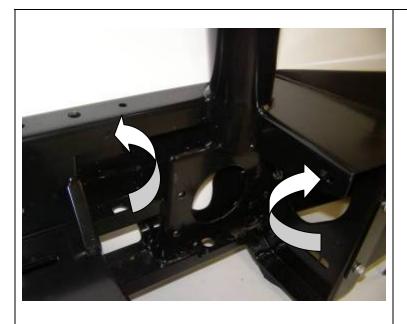
Bolt number plate to number plate bracket using 6mm hardware.



Number Plate in up position during winching



85. Position for HiLift jack to be operated from.



86. The cover pan is secured to bar using 6mm hardware.



87.Arrows indicate 2 holes on each side of bar

