# Quadratec® 3.5" Coil Suspension Lift Kit

Installation Manual: for 2007-Current Wrangler (JK)

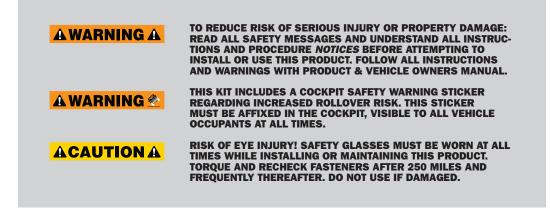
#16400.0X4X





#### PARTS LIST:

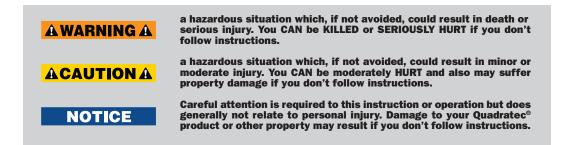
Front Coil Springs - QTY 2 Rear Coil Springs - QTY 2 2" Front Bump Stop Spacers - QTY 2 2" Rear Bump Stop Spacers - QTY 2 Front Track Bar Bracket - QTY 1 Rear Track Bar Bracket - QTY 1 Rear Track Bar Bracket Brace - QTY 1 Rear Sway Bar Links – 2 Brake Line Drop Brackets - QTY 4 E-Brake Drop Bracket - QTY 1 Full Kit Hardware Listed Inside Booklet





#### A Few Words About Product Safety:

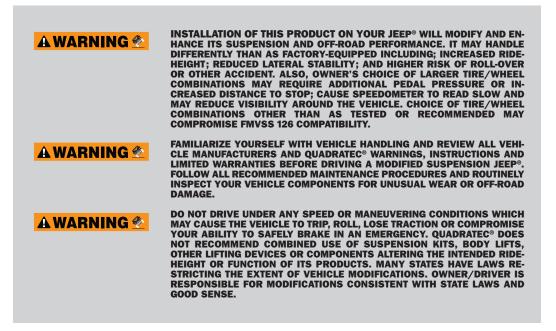
Your Ouadratec Suspension product is intended to enhance the utility and enjoyment of your off road capable vehicle. Before installation, please review the following safety information and installation recommendations. Throughout these instructions important safety information is generally preceded by one of three signal words indicating the relative risk of injury, property damage or adverse consequence. **The signal words mean:** 



#### **Before You Begin Installation:**

Congratulations on your purchase of the Quadratec 3.5" Coil Spring Lift Kit for 2007-Current JK Wrangler Vehicles. When unpacking, check to make sure all parts are included and not damaged due to shipping. If any part is missing or broken, please call Customer Service at 800-745-6037 as soon as possible.

#### **IMPORTANT PRODUCT SAFETY TIPS**





#### **IMPORTANT PRODUCT SAFETY TIPS**

**ACAUTION A** 

QUADRATEC® RECOMMENDS PROFESSIONAL INSTALLATION OF THIS PRODUCT.



#### 3.5" KIT PARTS LIST:

Front Coil Springs - QTY 2 Rear Coil Springs - QTY 2 2" Front Bump Stop Spacers - QTY 2 10mm Button Head Bolts - QTY 2 %" SAE Washers - QTY 2 10mm Locknuts - QTY 2 2" Rear Bump Stop Spacers - QTY 2 %" x 1 Fine Thread Bolts - QTY 4 %" SAE Washers - QTY 8 %" Fine Thread Locknuts - QTY 4 Front Track Bar Bracket - QTY 1 1/6" x 2½" Fine Thread Bolts - QTY 2 %" SAE Washers - QTY 2 3/6" Fine Thread Locknuts - QTY 2 %" x 3 Coarse Thread Bolt - OTY 1 %" SAE Washers - QTY 2 %" Coarse Thread Locknut - QTY 1 Rear Track Bar Bracket - QTY 1 1/2" x 11/4" Fine Thread Bolt - OTY 1 1/2" SAE Washer - QTY 1 1/2" Fine Thread Locknut - QTY 1  $\frac{1}{16}$ " x 1 Fine Thread Bolt - QTY 1 %" SAE Washer - QTY 1 %" Fine Thread Locknut - QTY 1

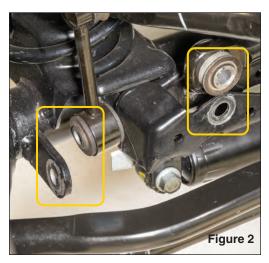
%" x 3 Fine Thread Bolt - QTY 1 %" SAE Washers - QTY 2 %" Fine Thread Locknut - QTY 1 Crush Sleeve Rear Track Bar Bracket Brace - QTY 1 5/6" Coarse Thread Bolts - QTY 3 %" Extra Thick Flat Washers - QTY 3 %" Grade 8 Lock Washers - QTY 3 Rear Sway Bar Links – 2 1/2" x 21/2" Coarse Thread Button Head Bolts - QTY 4 1/2" SAE Washers - QTY 4 1/2" USS Washers - QTY 4 1/2" Coarse Thread Locknut - QTY 4 Hourglass Bushings - QTY 4 1¼" Long Sleeves - QTY 4 Brake Line Drop Brackets - QTY 4 1/4" x 1 Fine Thread Bolts - QTY 4 1/4" SAE Washers - QTY 8 <sup>1</sup>/<sub>4</sub>" Fine Thread Locknuts - OTY 4 E-Brake Drop Bracket - OTY 1 1/4" x 1 Fine Thread Bolts - OTY 2 1/4" SAE Washers - QTY 4 1/4" Fine Thread Locknuts - QTY 2 Cam Bolts - QTY 4

#### **REQUIRED TOOLS:** Safety Glasses Hand Drill %4" Drill Bit <sup>15</sup>/<sub>32</sub>" Drill Bit %" Drill Bit 32" Allen Wrench %" Allen Wrench 1/6" Socket 1/2" Socket %" Socket 10, 15, 16, 18, 19, 21mm Sockets %" Socket %" Open End Wrench 1/2" Open End Wrench %" Open End Wrench %" Open End Wrench 18mm Open End Wrench 19mm Open End Wrench %" Open End Wrench Locking Pliers (I.E. Vise Grips) **Diagonal Wire Cutters** Paint Pen or Marker Hammer Punch



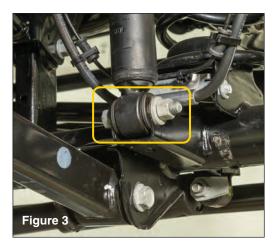


**Caution:** Park the vehicle on flat, level ground and set emergency brake. Put on safety glasses. Raise the front of the vehicle and support frame rails using jack stands. Do not lower the axle at

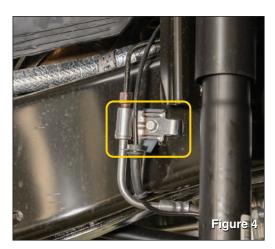


this time. Remove front tires/wheels. Disconnect the front sway bar end links using a 18mm socket and open end wrench. Disconnect front track bar using a 21mm socket. (see FIG 1 & 2)

#### **ACAUTION A** PARK THE VEHICLE ON FLAT, LEVEL GROUND AND SET EMERGENCY BRAKE. ALWAYS SUPPORT FRAME RAILS USING JACK STANDS.



Disconnect the bottom end of the front shocks using an 18mm socket and open end wrench. (see FIG 3)



Disconnect brake line bracket from frame using a 10mm socket. (see FIG 4)



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On 2011 and newer models disconnect the ABS lines from brake line bracket (see FIG 5)



Using locking pliers, separate the bracket from brake line (FIGS 6 & 7).



Remove bracket using a 10mm socket and discard (see FIG 7).



Remove original equipment front shock absorbers. Locate the shocks fasteners as shown.



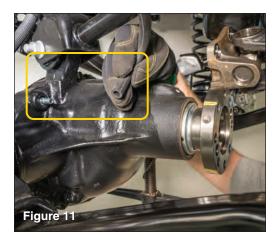
**The Trusted Source** 



Disconnect the top end of the front shocks using two 5/8" open end wrenches. (see FIG 9)



Mark the front drive shaft position with a paint marker and remove 4 bolts using a 15mm socket. (see FIG 10)



Disconnect axle vent line. (see FIG 11)



Gently lower axle housing towards the ground and remove original coil springs. (see FIG 12)

**ACAUTION A** THE COIL SPRINGS MAY BE UNDER TENSION. REMOVE CAREFULLY.

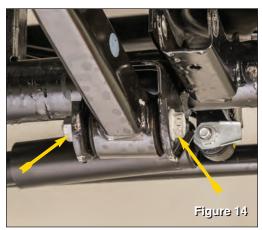


**The Trusted Source** 

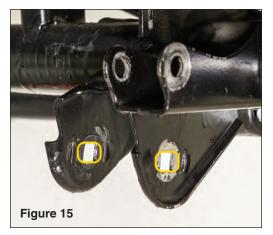




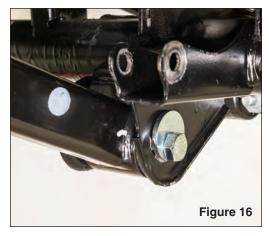
Using a 19mm open end wrench and 18mm socket remove front sway bar end links and discard. Your original equipment rear swaybar endlinks will be used in their place. (see FIG 13)



Locate front lower axle housing control arm mounting bolt and remove using a 21mm socket and open end wrench. (see FIG 14)



Using a punch and hammer, remove the knock-outs on either side of mounting hole surfaces, transforming each hole into a slot. (see FIG 15)

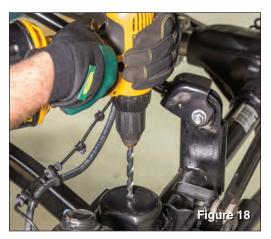


On each side, install new cam bolts and tighten to 125 ft lbs. (see FIG 16).





For '07-'10 model years only: Using a 7/16" open end wrench and socket, install brake line drop brackets and separate ABS line from top of brake line using ¼" fine thread bolts, washers and locknuts as shown. (see FIG 17)



Locate the new front bump stop in the kit. Using the bump stop as a template, mark the center of the bump stop pad located on the front axle. Consider drilling pilot holes. Carefully drill the bump stop pad using a  $^{25}/_{64}$ " drill bit. (see FIG 18)



With axle in drop position, place bump stop in coil springs, and position the new coil springs. (see FIG 19 & 20)



Attach bump stop to axle using the 10mm button head bolts and one washer under the 10mm nut, as shown (see FIG 19 & 20). Perform this on both sides of the vehicle.





Locate front axle housing track bar mount and drill-out the two outer holes to 7/16". (see FIG 21)



Install front track bar bracket using OEM bolt loosely at this time along with 7/16" x 2 1/2" fine thread bolts, washers and locknuts using 5/6" socket and open end wrench. (see FIG 22)

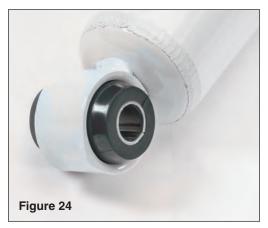


Assemble your new front shocks as shown in FIG 23a, 23b & 23c. Install the shock boots and secure with zip-ties. Clip off zip-tie tail.



Assemble the shock top bushings exactly as shown (see FIG 23).





Press in the bottom end bushings as shown (see FIG 24).



As shown in FIG 25, Install the top end of the new front shocks using a 9/16" open end wrench. Using factory hardware, re-attach bottom end of shock and torque to 56 ft lbs.

Re-attach the driveshaft and torque to 81 ft. lbs. Also re-attach the axle vent line at this time.

Finally, raise the axle using a floor jack so the full weight of vehicle is on the new coil springs.

NOTICE: Your original rear sway bar links will be relocated to the front and will need to be torqued to 60 ft lbs. This can be done with the vehicle on the ground.

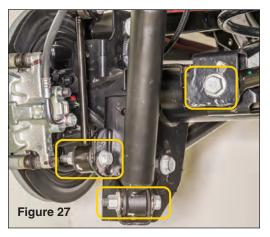
Install wheels/tires and torque to 105 ft lbs. Finally, remove jack stands and lower vehicle onto the ground.



Re-attach track bar using a 7/8" socket and open end wrench with 9/16" x 3" coarse thread bolt, washers and locknut and torque to 111 ft lbs. (see FIG 26)

After you relocate the rear swaybar links to the front, the installation work on the front end of the vehicle will be complete.



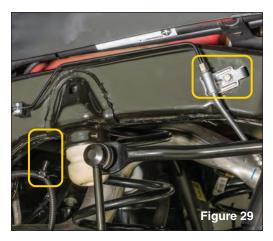


Moving to the rear of the vehicle: Raise rear end and properly support using jack stands. Disconnect the rear track bar bracket from axle using 21mm socket, remove rear lower shock bolts and sway bar end links using a 18mm socket and open end wrench (FIG 27).



Now disconnect the top end shock bolts shown above using a 16mm socket. (see FIG 28).

**ACAUTION A** Always support frame rails using jack stands.



Disconnect ABS line from frame and disconnect brake line from frame using a 10mm socket. (see FIG 29)



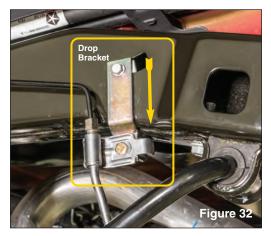
Disconnect axle housing vent line. (see FIG 30)



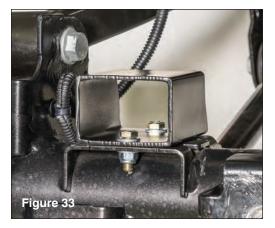
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Safely lower the rear axle in order to remove the original rear springs. Install the new coil springs in position. Gently raise axle to hold new springs in place. Remove factory emergency brake cable retainer using a 10mm socket. Install the supplied drop bracket using ¼" x 1 fine



thread bolts, washers and locknut. (see FIG 31) Install brake line drop brackets using the original bolt to the frame, and the supplied ¼" fine thread bolts, washers and locknuts as shown with a 7/16" socket and open end wrench. (see FIG 32)

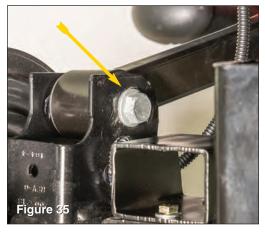


Install new bump stops with 5/16" fine thread bolts, washers and locknuts as shown using ½" socket and open end wrench. (see FIG 33)



Using a 19mm open end wrench and 18mm socket remove rear sway bar end links and after rear work is complete, relocate these to the front of vehicle. (see FIG 34 & FIG 1)





Locate rear upper axle housing control arm mounting bolt and remove using a 21mm socket and open end wrench. (see FIG 35)



Using a punch and hammer, remove the knock-outs on either side of mounting hole surfaces, transforming each hole into a slot. as performed in FIG 15. Install new cam bolts and tighten to 125 ft lbs. (see FIG 36 & 15)

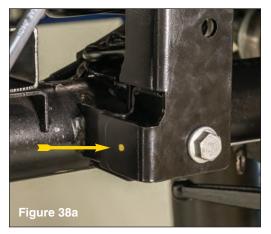


Place supplied rear track bar bracket over axle housing. Install OEM bolt and crush sleeve, but do not tighten at this time. Carefully drill a hole through the track bar bracket into axle housing bracket as shown using a <sup>15</sup>/<sub>32</sub>" drill bit. Consider drilling pilot holes. (see FIG 37)

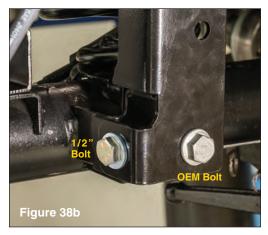


Install supplied 7/16" fine thread bolt, and washer into the hole you have just drilled. Secure from the underside with the supplied locknut, do not tighten at this time. (see FIG 37b)

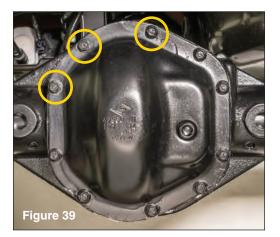




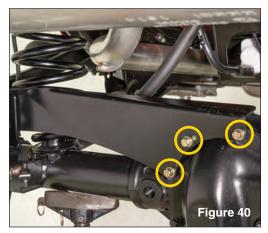
Mark location on the center of the new bracket face with paint marker as shown (see FIG 27). Consider drilling a pilot hole. It will be necessary to carefully drill through the drivers side of the new bracket and the axle housing mount using a 17/32" drill bit.



Install supplied  $\frac{1}{2}$ " x  $1^{1}/_{4}$ " fine thread bolt, washer and locknut loosely at this time. Tighten OEM track bar bolt followed by the  $\frac{7}{16}$ " and  $\frac{1}{2}$ " bolts.

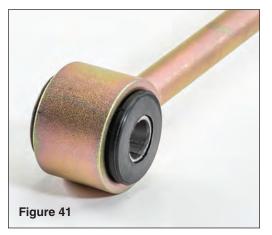


Locate the 3 differential cover bolts that will be removed for track bar brace installation. (see FIG 39)

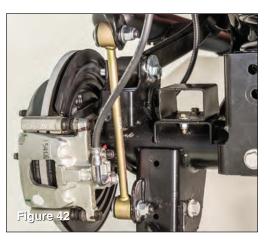


Loosely install brace with supplied  $\frac{5}{16}$ " coarse thread bolts, thick washers and lock washers using a  $\frac{1}{2}$ " socket. (see FIG 40)





Assemble new rear extended sway bar links using supplied bushings and sleeves. (see FIG 41)



Install new links with supplied ½" button head bolts, larger washers under head of bolt, small washers under nut and locknut using a 5/16" allen wrench and 19mm socket. (see FIG 42)

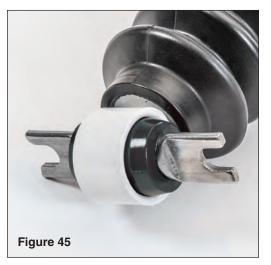


Assemble your new rear shocks as shown in FIG 43, 44 & 45. Install the shock boots and secure with zip-ties. Clip off zip-tie tail. (see FIG 43).

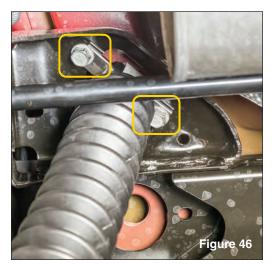


Assemble the shock bottom bushings exactly as shown (see FIG 44).





Push the mounting plate with bushing through the top eyelet of the rear shocks (see FIG 45).



Install the top end of the new rear shocks using a 16mm socket.



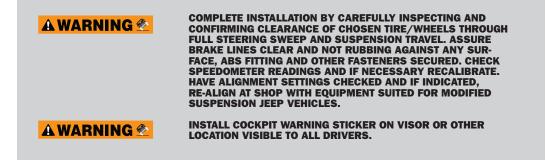
Finally, raise the axle using a floor jack so the full weight of vehicle is on the new coil springs.

Using factory hardware, re-attach bottom end of shocks and torque to 56 ft lbs. Install wheels/tires and torque to 105 ft lbs. Finally, remove jack stands and lower vehicle onto the ground.

Re-attach track bar using the included 9/16" x 3" bolt, washer and locknut in upper mounting hole for 3.5" lifts and torque to 111 ft lbs. (see FIG 47)

This completes the installation work on the rear end of the vehicle.







FALLINE TO DRIVE THIS VEHICLE SAFELY MAY RESULT IN SERIOUS WILLIY OR DAMAGE. This keep'n has been modified to evaluation is supportation and off-road partormance. It may handle differently than as factory-equipped including: increased indo-height; reduced Jatani stability: and higher risk of reliable or a view or accident. Also, weren's sinise of larger tire/wheel cambinations may require additional pedal pressure or increased eitstrace to stop; cause specedemeter to reid as factory wildly additional pedal pressure or increased eitstrace to a fur, wheel cambinations other than as texted or ecommanded may compromise FMVSS 126 compatibility:

Do not time under any speed or interevening conditions which may cause the vehicle to thip, rull, lease traction or compromise your addity to safely brake in an energency. Quadrattee" does not recommend combined use of suspension kits, body Bits, other Hiting devices or components altering the intereder direbuild for function of its products. Many states have laws restoleting the extend of vehicle madifications. Overse/Driver is respirable for modifications consistent with state laws and good sense.

Familiarize yourself with vehicle handling and review all vehicle manufacturers and Quadratac<sup>®</sup> warnings, instructions and limited warranties before driving this modified suspension leap<sup>®</sup>. Follow recommended maintenance procedures and routlinely inspect your vehicle components for unusual wear or off-road damage.

PLEASE DRIVE SAFELY AND ALWAYS FASTEN SEAT BELTS.

Install cockpit warning sticker on visor or other location visible to all drivers and occupants.





# **NEW! Wheels** for JK







CLEAR POLISHED SILVER FINISH

GUN METAL GRAY

### Quadratec<sup>®</sup> Baja Xtreme<sup>™</sup> Wheels

- > Classic styling with a cool & modern update
- > 8 oversized speed holes w/deep Lug pockets
- > Custom Hub Style ABS Q Logo center caps
- > Aluminum castings with CNC machined surfaces
- > Easy to keep clean with no hidden nooks & crannies
- > Quadratec Warranty: Lifetime Structural/1 Year Finish
- > 4 great finishes: Silver, Satin Black, Gun Metal Gray, Polished

17" x 8" for '07-'15 Wrangler #92615.22XX...from \$139.99 each each sold individually





SATIN BLACK

SILVER FINISH GUN METAL GRAY

### Quadratec<sup>®</sup> Rubicon Xtreme<sup>™</sup> wheels

#### > Classic 5 - Spoke Pattern in 17" x 9"

- > 4.75" back-spacing w/deep Lug pockets
- > Accepts genuine Mopar center caps (sold separately)
- > Aluminum castings with CNC machined surfaces
- > Easy to keep clean with no hidden nooks & crannies
- > Quadratec Warranty: Lifetime Structural/1 Year Finish
- > 3 great finishes: Silver, Satin Black, Gun Metal Gray
- 17" x 9" for '07-'15 Wrangler #92615.23XX...from \$149.99 each each sold individually





#### SATIN BLACK

SILVER FINISH MACHINE FACED

### GUN METAL GRAY

Product Search

Moab Style

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### **Quadratec® Moab Style Wheels**

- > 5 Spoke with classic. clean and strong looks
- > Totally transform the look of your Wrangler!
- > Custom Color matched snap-in center caps
- > Aluminum castings with CNC machined surfaces
- > Easy to keep clean with no hidden nooks & crannies > Quadratec Warranty: Lifetime Structural/1 Year Finish
- > 4 great finishes: Satin Black. Silver. Machine Faced & Gun Metal Grav

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\*FREE SHIPPING!

## **Essentials**<sup>®</sup> NEW! From Quadratec THE RECEIVER HITCH REDEFINED! VERSAHITCH







VersaHitch, plug-n-play hitch wiring & hitch plug.

SAVE \$20.00 with our QuadraPac VersaHitch Kit for '07-'15 Wrangler #12015.1012 ... \$139.97

VERSAHITCH

### **NEW! VersaHitch™ Bike Rack**

- > Optimized for Wrangler, offers unprecedented rigidity and stability
- > Haul your bikes using the two VersaHitch 1.5" receiver ports
- > Dual arms virtually eliminate lurching and wobble of loaded rack
- > Even with bike rack installed you can still tow with 2" receiver\*
- > Soft rubber cradles, hold downs and pedal straps are bike-friendly
- > Unloaded rack folds to allow tailgate access
- > Holds up to 4 bikes, up to 140 lbs total
- > Quadratec Limited 3 Year Limited Warranty

VersaHitch Bike Rack #92034.3000...<sup>\$</sup>199.99 Optional Y-Frame Adapter #92034.1010...\$24.99 \*VersaHitch Extended Ball Mount Kit #92018.0002...<sup>\$</sup>24.99 Required for towing with Bike Rack Installed





ONLINE VIDEO

### **ALL NEW! VersaHitch™** for '07-'15 JK Wrangler > Full function 2" Class II Receiver Hitch > Patented Dual 1.5" Accessory Receiver Tubes

- > Designed & engineered for Custom Accessories
- > Made to provide the ULTIMATE in cargo stability
- > 3500 lb Tow Rating (for 4 door Wrangler)
- > Easy no-drill installation with simple instructions
- > Plug & Play Wiring Harness (Sold Separately)
- > Quadratec Limited 3 Year Limited Warrantv

VersaHitch for '07-'15 Wrangler #12015.1002 ...<sup>\$</sup>119.99 Plug-n-Play Hitch wiring for '07-'15 JK #92015.8001 ...\$24.99 Jeep® Logo Hitch Plug #12019.700 ...\$14.99 Please Note: VersaHitch is NOT compatible with '13-'15 Rubicon models with factory modular STEEL bumpers.

CARRY UP

TO 4 BIKES!

DIIAL IILTRA STABLE RECEIVERS: THE ULTIMATE IN STABILITY!

### NEW! VersaHitch<sup>™</sup> Cargo Rack

> Unprecedented rigidity and stability with two arms instead of one

- > Dual arms virtually eliminates loaded cargo rack wobble
- > Even with cargo rack installed (folded) you can still tow with 2" receiver\*
- > Can be folded forward (empty) to open tailgate or for towing.
- > Aluminum & steel construction offers excellent strength

VersaHitch Cargo Rack #12033.3000...<sup>\$</sup>249.99 \*VersaHitch Extended Ball Mount Kit #92018.0002...<sup>\$24.99</sup> Required for towing with folded Cargo Rack Installed

DUAL ULTRA STABLE RECEIVERS ON ALL VERSAHITCH ACCESSORIES **PROVIDE THE ULTIMATE IN STABILITY!** 







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### Quadratec® Exclusive Limited Lifetime Warranty

Your Quadratec<sup>®</sup> branded accessories are covered by the following **Limited Warranty** provided exclusively by Quadratec, Inc., 1028 Saunders Lane, West Chester PA 19380.

This Limited Warranty is the only warranty made in connection with your purchase. Quadratec neither assumes nor authorizes any vendor, retailer or other person or entity to assume for it any other obligation or liability in connection with this product or Limited Warranty. This Limited Warranty does not apply and is not cumulative to any accessory or part distributed by Quadratec for which the Manufacturer provides a separate written warranty.

What is Covered: Subject to the terms, exclusions and limitations herein and with respect only to Quadratec branded accessories first sold in the United States, Quadratec warrants to the initial retail purchaser only that your Quadratec accessory shall be free of defects in material and workmanship: for as long as the original purchaser owns the vehicle. The Warranty on bushings and other serviceable wear items (including shock absorbers) is limited to 1 year from date of retail purchase. This Limited Warranty is not assignable and shall terminate upon sale of the vehicle upon which the Quadratec accessory is installed or other transfer third persons.

All other warranties are hereby disclaimed, except to the extent prohibited by applicable law in which case any implied warranty of merchantability or fitness for a particular purpose on this limited to for as long as the original purchaser owns the vehicle. Quadratec reserves the rights to: (a.) require invoice or other proof your accessory is within the terms of this Limited Warranty as a condition of warranty service and, (b.) make future revisions to this product and Limited Warranty without prior notice or obligation to upgrade your product.

#### What is Not Covered:

Your Quadratec Limited Warranty does not cover products or parts Quadratec determines to have been damaged by or subjected to: (a.) installation damage, alteration, modification, combination with other parts, failure to maintain or improper repair or service, (b.) defects or use which pre-dates installation of Quadratec<sup>®</sup> accessory or suspension kit by authorized dealer or shop, (c.) normal wear & tear or gradual reduction in expected performance of vehicle or components, (d.) emissions control or electronic stability systems or components, (e.) cosmetic damage or damage from moisture or water immersion, (f.) fleet, rental or commercial use, (g.) Acts of God, accidents, misuse, negligence, inadequate mounting or impact with vehicle(s), obstacles or other aspects of the environment, (h.) theft, vandalism or other intentional damage. (i.) use in competition or racing.

**Other Exclusions:** Surface finish of exposed suspension components is not covered under this Limited Warranty.

#### Remedy Limited to Repair/Replacement:

The exclusive remedy provided hereunder shall, upon Quadratec inspection and at Quadratec's option, be either repair or replacement of product or parts (new or refurbished) covered under this Limited Warranty. Customers requesting warranty consideration should first contact Quadratec to obtain a RGA number (610-701-3336). All labor, removal, shipping and installation costs are customer's responsibility.

#### Other Limitations - Exclusion of Damages - Your Rights Under State Law:

In consideration of the purchase price paid, neither Quadratec nor any independent Quadratec distributor/licensee are responsible for any time loss, rental costs, or for any incidental, consequential, punitive or other damages you may have or incur in connection with any part or product purchased. Your exclusive remedy hereunder for covered parts is repair/replacement as described above.

This Limited Warranty gives you specific rights. You may also have other rights that vary from state to state. For example, some states do not allow limitations of how long an implied warranty lasts and /or do not allow the exclusion or limitation of incidental or consequential damages, so the limitations and exclusions herein may not apply to you.

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