

# Read and understand all instructions and warnings prior to installation of product and operation of vehicle.

Zone Offroad Products recommends this system be installed by a professional technician. In addition to these instructions, professional knowledge of disassembly/ reassembly procedures and post installation checks must be known. Minimum tool requirements include the following: Assorted metric and standard wrenches, hammer, hydraulic floor jack and a set of jack stands. See the "Special Tools Required" section for additional tools needed to complete this installation properly and safely.

# >> PRODUCT SAFETY WARNING

Certain Zone Suspension Products are intended to improve off-road performance. Modifying your vehicle for off-road use may result in the vehicle handling differently than a factory equipped vehicle. Extreme care must be used to prevent loss of control or vehicle rollover. Failure to drive your modified vehicle safely may result in serious injury or death. Zone Offroad Products does not recommend the combined use of suspension lifts, body lifts, or other lifting devices.

You should never operate your modified vehicle under the influence of alcohol or drugs. Always drive your modified vehicle at reduced speeds to ensure your ability to control your vehicle under all driving conditions.

Always wear your seat belt.

## >>> TECHNICAL SUPPORT

www.zoneoffroad.com may have additional information about this product including the latest instructions, videos, photos, etc.

Send an e-mail to *tech-zone@ridefox.com* detailing your issue for a quick response.

**888.998.ZONE** Call to speak directly with Zone tech support.

## >> Pre-Installation Notes

- 1. Special literature required: OE Service Manual for model/year of vehicle. Refer to manual for proper disassembly/reassembly procedures of OE and related components.
- 2. Adhere to recommendations when replacement fasteners, retainers and keepers are called out in the OE manual.
- 3. Larger rim and tire combinations may increase leverage on suspension, steering, and related components. When selecting combinations larger than OE, consider the additional stress you could be inducing on the OE and related components.
- 4. Post suspension system vehicles may experience drive line vibrations. Angles may require tuning, slider on shaft may require replacement, shafts may need to be lengthened or trued, and U-joints may need to be replaced.
- 5. Secure and properly block vehicle prior to installation of Zone Offroad Products. Always wear safety glasses when using power tools.
- 6. If installation is to be performed without a hoist, Zone Offroad Products recommends rear alterations first.
- 7. Due to payload options and initial ride height variances, the amount of lift is a base figure. Final ride height dimensions may vary in accordance to original vehicle attitude. Always measure the attitude prior to beginning installation.

# **Difficulty Level**

easy 1 (2) 3 4 5 difficult

Estimated installation: 2-3 hours

# **Tire/Wheel Fitment**

Non-Rubicon Models

35x12.50 tire 17x9, 4.5" max backspacing

#### **Rubicon Models**

37x12.50 tire 17x9, 4.5" max backspacing

|              | *Important* Verif                 | y you have all of | the kit components before beginning installation. |
|--------------|-----------------------------------|-------------------|---|
| Kit Contents |                                   | 8                 | 5/16" SAE washer - clear zinc                     |
| Qty          | Part                              | 1                 | 1/4"-20 x 3/4: hex bolt                           |
| 2            | Front Coil Spring                 | 1                 | 1/4"-20 prevailing torque nut                     |
| 2            | Rear Coil Spring                  | 2                 | 1/4" SAE flat washer                              |
| 2            | 3" Front Bump Stop Extension      | 1                 | Cable clamp                                       |
| 2            | 3" Rear Bump Stop Extension       |                   |   |
| 2            | Front Sway Bar Link               | 1                 | Bolt Pack - Rear Sway Bar Links                   |
| 2            | Rear Sway Bar Link                | 2                 | 12mm-1.75 x 60mm bolt                             |
| 8            | Sway Bar Link Hourglass Bushings  | 2                 | 12mm-1.75 prevailing torque nut                   |
| 8            | Sway Bar Link Sleeves             | 4                 | 1/2" SAE washer                                   |
| 1            | Rear Track Bar Bracket            |                   |   |
| 1            | Track Bar Bracket Sleeve          | 1                 | Bolt Pack Front Sway Bar Links                    |
|              |                                   | 2                 | 12mm-1.75 x 70mm bolt class 10.9 clear zinc       |
|              | Bolt Pack - Front Bump Stop       | 2                 | 12mm-1.75 prevailing torque nut clear zinc        |
| 2            | 3/8"-16 x 3-3/4" Bolt             | 4                 | 1/2" SAE flat washer clear zinc                   |
| 2            | 3/8"-16 Serrated Edge Flanged Nut |                   |   |
| 2            | 3/8" SAE Flat Washer              | 1                 | Bolt Pack #1052 - 2024 JL 14mm Front Sway Bar     |
|              |                                   | 2                 | 14mm-2.00 x 70mm Bolt - Class 8.8 - Clear Zinc    |
| Qty          | Part                              | 2                 | 14mm-2.00 Prevailing Torque Nut - Clear Zinc      |
| 1            | Bolt Pack - Rear Components       | 4                 | 14mm Flat Washer - Clear Zinc                     |
| 4            | 5/16"-18 x 3/4"                   | 2                 | .75 x .083 x 1.375 Sleeve                         |
| 4            | 5/16"-18 prevailing torque nut    | 2                 | ./3 A .003 A 1.3/3 SIEEVE                         |
| 4            | 3/10 -16 prevailing torque flut   |                   |   |
|              |                                   |                   |   |



## INSTALLATION INSTRUCTIONS

- 1. Park the vehicle on a clean, flat surface and block the rear wheels for safety.
- 2. Disconnect the front track bar from the axle. Save mounting bolt. Figure 1



Figure 1

- 3. Raise the front of the vehicle and support the frame with jack stands behind the front lower control arm pockets.
- 4. Remove the wheels.
- 5. Disconnect the sway bar links from the sway bar and axle using an 18mm socket and wrench. Save hardware.
- 6. Disconnect the brake line brackets from the lower control arms to allow enough slack for coil spring removal.



Figure 2

- 7. Rubicon Models Disconnect the locker wire harness from the axle.
- 8. Disconnect the axle disconnect wire harness from the axle including the 2 harness clips.
- 9. Disconnect the front driveshaft from the axle to prevent binding during coil spring removal.
- 10. With the front axle supported remove the front shocks saving all hardware.

### **STEP 13 Note**

To gain access to the bump stop nut on the driver side, temorarily remove the brake line bracket from the rear of the spring bucket.

The hardware needed for the front and rear bump stop extension installations is located in hardware pack 843.

#### **STEP 14 Note**

The upper shocks bushings are designed to compress as they are installed. Get one side started in the pocket and walk the shock up into the mount bushing pushing up and moving it back and forth against the stepped spacers.

#### **STEP 15 Note**

Hardware for front sway bar links is located in bolt pack 843.

- 11. Lower the front axle taking care to not over extend any wiring or hoses and remove the coil springs from the vehicle.
- 12. Place a provided front round bump stop spacer inside one of the Zone front coils springs. Install the spring and bump stop in the vehicle. Make sure the spring is seated properly in the axle mount.
- 13. Attach the bump stop extension to the axle through factory hole in the bump stop pad using a 3/8" x 3-3/4" bolt, nut and washer. Torque bolt to approximately 29 ft-lbs. Repeat the spring spacer/bump stop installation of the other side of the vehicle.
- 14. Raise the axle with a jack enough to install the new shocks with the factory hardware. The Nitro shocks will be installed body down, Fox shocks install with the body up. Use the supplied longer sleeve and nylon spacers on each side of the bushing on the upper mount and the shorter sleeve at the axle. Torque the upper bolts to 74 ft-lbs and the lower bolts to 81 ft-lbs.
- 15. Install the bushings and sleeves into the sway bar links. Install the supplied links with the offset in towards the sway bar from the axle mount. Use the provided hardware for the sway bar with the bolt going outside in and the factory bolts at the axle. Torque bolts to 40 ft-lbs. Figure 3
- 16. 2024 Models only: Use 14mm hardware located in bolt pack 1052, 3/4" ID hourglass bushings and 0.75"x.083"x1.375" sleeves to attach new link to sway bar. Use smaller ID bushings for the lower mount and larger ID bushings for the upper mount.



Figure 3

- Re-install the locker wire harness if equipped as well as the axle disconnect wire harness.
- 18. With the front axle still support with a jack, remove the driver's side lower control arm bolt at the axle. The perforated sections can be removed most easily with a carbide burr or rotary grinding tool. Remove only the rear portion of the cam slot .
- 19. When the perforated sections are removed from the lower control arm mount, reinstall the control arm to the axle with cams on factory bolt. Rotate the cams so that the bolt is as far towards the rear of the slot as possible. Just snug the cam hardware so that the cam washers are retained within the stops. Final cam bolt torque will be completed with the weight of the vehicle on the suspension. Figure



Figure 4

- 20. Repeat cam washer installation on the passenger side.
- 21. Re-attach the brake line brackets to the lower control arms. Slightly bend the brackets for adequate slack if necessary.
- 22. Reattach driveshaft with OE bolts and threadlocker. Torque to 89 ft-lbs.
- 23. Install the wheels and torque lug nuts to 130 ft-lbs. Lower the front of the vehicle to the ground.
- 24. Reattach the front track bar to the axle with the factory hardware. Have an assistant turn the steering wheel to aid in aligning the track bar bolt. Torque the track bar bolt to 52 ft-lbs plus 155 degrees.
- 25. Torque the front lower control arm bolt to 103 ft-lbs plus 145 degrees.

# >>> REAR INSTALLATION

- 26. Block the front wheels for safety.
- 27. Disconnect the rear track bar from the axle -21mm. Save hardware. Figure 5



Figure 5

- 28. Raise the rear of the vehicle and support the frame with jack stands in front of the lower control arm mounts.
- 29. Remove the wheels.

## **STEP 30 Note**

Hardware for parking bracke and TPMS ECU is located in bolt pack 835

- 30. Disconnect the sway bar links from the axle; save hardware.
- 31. Disconnect brake line brackets from the frame; save bolts.
- 32. Rubicon Models: Disconnect the locker wire harness from the differential.
- 33. Remove the two bolts holding the TPMS ECU to the rear crossmember. Relocate the sensor to the passenger side upper coil mount using 1/4" hardware.



Figure 6

- 34. Attach the passenger side parking brake cable with the provided wide cable clamp to the rightmost stud where the TPMS ECU was removed. This is done to prevent the cable from getting caught on the studs through suspension travel.
- 35. Remove the rearmost fender liner to gain access to the upper shock bolt.



Figure 7

- 36. Support the axle with a jack and remove the rear shocks from the vehicle 18mm save hardware
- 37. Lower the axle using care not to over extend any lines and remove the rear springs.
- 38. Install the new rear springs with factory isolator on top of the coil spring. There is a nub on the coil isolator that lines up with a hole in the frame.
- 39. Raise the axle to slightly compress the spring.

- 40. Install the provided bump stop spacers on the axle using the existing holes in the axle bump stop pad. Fasten the bump stop to the axle with 5/16" bolts, nuts and 5/16" washers. Torque bolts to 20 ft-lbs.
- 41. Install the hourglass bushings and sleeves into the provied rear sway bar links. Install the sway bar links using the factory axle hardware and provided 12mm hardware at the sway bar. The links should be installed so the links offset in towards the axle from the sway bar. Torque hardware to 40 ft-lbs.
- 42. Install the new shocks with the factory hardware. Use the supplied longer sleeve and nylon spacers on each side of the upper mount and shorter sleeve on the lower mount. Tighten upper hardware to 81 ft-lbs and lower mounting hardware to 74 ft-lbs.
- 43. Reattach the brake lines to the frame with the factory hardware. Tighten bolt securely.
- 44. Reinstall the rearmost fender liner.
- 45. Locate the rear track bar bracket and temporarily install it onto the OE axle bracket with the new provided 9/16" hardware. The bracket mounts to the rear and outside face of the OE mount.
- 46. Using the bracket as a template, mark the outside holes to be drilled. Remove the bracket and drill a 1/2" holes.



Figure 8

- 47. Reinstall the track bar bracket with the 9/16" hardware along with the provided crush sleeve inside the factory mount. Leave hardware loose.
- 48. Fasten the new bracket to the frame through the outer holes using the provided 7/16" hardware. Torque the 7/16" hardware to 59 ft-lbs. Torque 9/16" hardware to 130 ft-lbs.
- 49. Reinstall wheels and torque to factory specifications. Lower vehicle to ground.
- 50. Install trackbar into the factory axle bracket with the original hardware. Torque bolt to 74 ft-lbs plus 60 degrees.

#### >>> Post-Installation

- 51. Double check all hardware for proper torque..
- 52. Check all fasteners after 500 miles and at regularly scheduled maintenance intervals.

#### **STEP 37 Note**

Hardware for rear bump stops is located in bolt pack 839.

#### **STEP 38 Note**

Hardware for rear sway bar links is located in bolt pack 838/

# Post-Installation Warnings

- 1. Check all fasteners for proper torque. Check to ensure for adequate clearance between all rotating, mobile, fixed, and heated members. Verify clearance between exhaust and brake lines, fuel lines, fuel tank, floor boards and wiring harness. Check steering gear for clearance. Test and inspect brake system.
- 2. Perform steering sweep to ensure front brake hoses have adequate slack and do not contact any rotating, mobile or heated members. Inspect rear brake hoses at full extension for adequate slack. Failure to perform hose check/ replacement may result in component failure.
- 3. Perform head light check and adjustment.
- 4. Re-torque all fasteners after 500 miles. Always inspect fasteners and components during routine servicing.

| Component                    | Torque (FT-LBS)      |
|------------------------------|----------------------|
| Front Bump Stop              | 29                   |
| Front Upper Shock Hardware   | 74                   |
| Front Lower Shock Hardware   | 81                   |
| Front Sway Bar Link Hardware | 50                   |
| Front Track Bar- Axle Side   | 52 plus 155 degrees  |
| Rear Bump Stop Spacer        | 20                   |
| Rear Sway Bar Link Hardware  | 55                   |
| Rear Upper Shock Hardware    | 81                   |
| Rear Lower Shock Hardware    | 74                   |
| Rear Track Bar Bracket 9/16" | 130                  |
| Rear Track Bar Bracket 7/16" | 59                   |
| Rear Track Bar- Axle Side    | 74 plus 60 degrees   |
| Lug Nuts                     | 130                  |
| Front Lower Control Arm Bolt | 103 plus 145 degrees |
| Front Drive Shaft Flange     | 89                   |