

#### Note

Please review the product instructions prior to attempting installation to ensure installer is equipped with all tools and capabilities necessary to complete the product installation. We recommend thoroughly reading the instructions at least twice prior to attempting Installation.

Before beginning disassembly of the vehicle, check the "What's Included" section of the instructions to ensure you've received all parts necessary to complete installation. Further, verify that the parts received are PROPER TO YOUR application (year range, motor, etc.) to avoid potential down-time in correcting potential discrepancies. Any discrepancies will be handled by Carli Suspension and the correcting products will be shipped UPS Ground.

## **Lifetime Product Warranty**

Carli Suspension provides a limited lifetime product warranty against defects in workmanship and materials from date of purchase to the original purchaser for all products produced by Carli Suspension. Parts not manufactured by, but made to Carli Suspension's specifications by third party manufacturers will carry a warranty through their respective manufacturer. (i.e. King Shocks, Bilstein Shocks, Fox Shocks). Deaver Leaf Spring's warranty will be processed by Carli Suspension.

Proof of purchase (from the original purchaser only) will be required to process any warranty claims. Carli Suspension products must be purchased for the listed Retail Price reflected by the price listed on the Carli Suspension Website at the time of purchase. Carli Suspension reserves the right to refuse warranty claims made by any customer refusing or unable to present proof of purchase, or presenting proof of purchase reflecting a price lower than Carli Suspension's Retail Price at the time the item was purchased.

Carli Suspension's Limited Lifetime Warranty excludes the following parts which are subject to wear: Track Bar Bushings, Track Bar Heim Joints, Limit Straps, Control Arm Bushings, Radius Arm Bushings, Shock Bushings, Sway Bar End Link Heim Joints, Shock Seals, Shock Bearings, and Corrosion on Shock Shafts or Bodies. These items will be warranted for a period of 60 days from the date of purchase only if determined to be installed properly signifying manufacturing defect. Carli Suspension cannot warrant a product's cosmetic finish due to the varying extreme elements that may be encountered.

Any alterations, modifications, or improper installation, of the product will void this warranty. Products should be inspected for defect upon receipt and approved before installation. Any defect in NEW product will be warranted if returned before installation in its original packaging. Carli Suspension's obligation under this warranty is limited to the repair or replacement of the defective product only. All costs of removal, installation or reinstallation, freight charges, incidental or consequential damage are expressly excluded from this warranty.

Carli Suspension is not responsible for damages and/or warranty of other vehicle parts related or non-related to the installed Carli Suspension product. This warranty shall not apply to any product that has been subjected to accident, negligence, alteration, abuse or misuse as determined by Carli Suspension. Carli Suspension reserves the right to refuse warranty claims if produced parts are combined and/or substituted with other aftermarket suspension products. Combination and/or substitution of other aftermarket suspension components may cause premature wear and/or product failure. Carli Suspension reserves the right to change/alter product without obligation to update any previously purchased products.

### Parts Checklist

- □ (Qty. 2) Fabricated Shackles Preinstalled with:
  - □ (Qty. 4) AP-LSB1 Bushing
  - □ (Qty. 2) MP-DSHACKLE-CRUSH Crush Sleeve
  - □ (Qty. 2) AP-ZERK-1/4-90

# Instructions - CS-DSHACKLE-13

•

## Instructions

- 1. Loosen all leaf spring bolts with the truck at ride height.
- Front is a 1-3/16" Socket
- Rear Spring to Shackle is 15/16"
- Rear Shackle to Frame Hanger is 1-1/16" Socket
- 2. Jack the truck up by the frame rail and place the rear axle and on jack-stands.
- 3. Lower the truck down so it's at ride height on the jack stands with the wheels/tires off the ground.
- 4. Remove the wheels/tires.
- 5. Unbolt the lower rear Shock mounts and remove the shocks from them.
- 6. Disconnect the axle vent-tube from the driver's side upper frame rail.



- 7. Remove the nuts from the front leaf spring to frame bolt and rear shackle to hanger bolt.
- 8. Place a third jack stand under the pinion to support the driveline while you work.
- 9. Remove the U-Bolts
- 10. Jack the truck up until the leaf springs separate from the axle seats.
- 11. Working with an assistant (or two), lift up the front of the leaf spring to unload the bolt and remove it to free the front of the spring.
- 12. Manipulate the rear to unload the shackle to hanger bolt and remove it. This will free up the spring pack with the shackle still loosely attached (nut should be removed, but bolt in place as the frame blocks you from removing it.)
- 13. Push the rear of the spring pack up to dislodge the shackle and forward to clear the shackle from the frame hanger.
- 14. Shift it over enough to clear the bolt from the frame and remove the stock shackle.
- 15. Grease the inside of the frame hanger that will make contact with the bushing faces, then grease the shackle bushings and crush sleeve.





- 16. Install the shackle onto the leaf springs with the factory bolt. The Carli Logo plate will face the rear, the zerk fitting will face the leaf spring. The bolt will install from the INSIDE-OUT. The head of the bolt should face the frame. If you flip the bolt, the threads will contact the frame as the shackle moves.
- 17. Shift the spring pack up ensuring the shackle is above the hanger and put the front leaf-spring bolt in; put the nut on hand-tight.
- 18. Manipulate the pack and get the rear shackle to frame hanger bolt in and thread the nuts on both shackle bolts hand-tight.
- 19. Use your grease gun to grease the zerk fittings while the rear is at full droop and the bolt is loose. Don't over-do this as it'll unseat the bushings, a few pumps in each will do.



- 20. Lower the rear end onto the axle seats and re-install your U-Bolts.
- Torque incrementally ensuring even tension to 110lb.ft. in a cross pattern.
- 21. Remove the pinion jack-stand.
- 22. Reattach the rear shocks to the lower mounts and torque to 100lb.ft.
- 23. Reattach the axle vent to the hole in the Driver's Side Frame Rail.
- 24. Lower the weight of the vehicle onto the springs until the rear end is fully supported by the suspension.
- 25. Torque Front leaf spring bolt to 250lb.ft.
- 26. Torque BOTH rear shackle bolts to 160lb.ft.
- 27. Reinstall the Wheels and tires and torque to 140lb.ft.