



**2005 - 2007 FORD F-250/350 SUPER DUTY 4WD
FTS52002BK FRONT DUAL SHOCK SYSTEM**

FTS52002BK		Dual Shock Kit
Qty	Part #	Description
1	FT30167BK	Upper Hoop Driver
1	FT30168BK	Upper Hoop Pass.
2	FT30159BK	Lower Bracket Front
1	FT30179BK	Driver Lower Rear Shk Mnt
1	FT30180BK	Pass Lower Rear Shk Mnt
1	FT30332	Hdwr Sub-Assembly Kit
1	FT30163BK	Sway Bar Rlc. Brkt Drv.
1	FT30164BK	Sway Bar Rlc Brkt Pass
2	FT30170	Sway Bar End Link
1	FT30185BK	Driver Side Bump Stop
1	FT30186BK	Pass. Side Bump Stop
2	FT30219	Sway Bar Drop (all engines)
1	FT30181	Hardware Kit

FT30332		Hdwr Sub-Assembly Kit
Qty	Part #	Description
4	43142751081	7/16"-14 x 2 3/4" Bolt
4	43000005081	7/16" SAE Flat Washer
8	43140003052	7/16"-14 Nylock Nut
2	FT30187	Brake Line Bracket
4	FTS98003	3/4" Heim Joint
8	FTS43	Heim Mis-Alignments
2	FT30182	Sway Bar Nut Tab
2	FT57-1	Large Washer
2	FT30203	Shock Mount Spacer
2	FT30201	Frame Nut Tab
1	FTAS12	Sticker
1	FTREGCARD	Registration Card
2	FT52002i	Instruction Sheet

FT30181 Hardware Kit		Location
Qty	Description	
8	1/2"-13 x 3" Hex Bolt	Shock Bolts
16	1/2" SAE Flat Washer	
8	1/2"-13 Nylock Nut	
2	5/8"-11 x 3" Hex Bolt	Frnt Lower Mount
4	5/8" SAE Flat Washer	
2	5/8"-11 Nylock Nut	
4	8mm-1.25 x 30mm	Frnt Lower Mount
4	8mm Flat Washer	
2	1/2"-13 x 5" Bolt	Rr Lwr Mnt w/ Sway Bar Link
6	1/2" SAE Flat Washer	
4	1/2" Split Washer	
2	1/2"-13 x 3" Bolt	Sway Bar to Link
6	1/2" SAE Flat Washer	
2	1/2" Nylock Nut	
4	3/8"-16 x 1 1/2" Bolt	Sway Bar Frame Bracket
8	3/8" SAE Flat Washer	
4	3/8"-16 Nylock Nut	
4	7/16"-14 x 1 1/2" Bolt	
8	7/16" SAE Flat Washer	
4	7/16"-14 Nylock Nut	
4	7/16"-14 x 2 3/4" Bolt	Sway Bar Spacer (all engines)
4	7/16" SAE Flat Washer	
8	7/16"-14 Nylock Nut	
4	3/4" -16 RH Jam Nut	Sway Bar Link
4	3/8"-16 x 1 1/2" Bolt	Hoop
8	3/8" SAE Flat Washer	
4	3/8"-16 Nylock Nut	
6	1/2"-13 x 1 1/2" Bolt	Hoop To Frame & Bucket
10	1/2" SAE Flat Washer	
4	1/2" Nylock Nut	
2	1/4"-20 x 3/4" Bolt	Brake Line Bracket
4	1/4" SAE Flat Washer	
2	1/4"-20 Nylock Nut	
2	Adel Clamp	
1	Loc Tight	
4	Zip Ties	



2005 - 2007 FORD F-250/350 SUPER DUTY 4WD FTS52002 FRONT DUAL SHOCK SYSTEM

CHECK PARTS INCLUDED IN THIS KIT TO THE PARTS LIST ABOVE BEFORE BEGINNING INSTALLATION OF THE KIT. IF ANY PIECES ARE MISSING, CONTACT FABTECH AT 909-597-7800

READ ALL INSTRUCTIONS THOROUGHLY FROM START TO FINISH BEFORE BEGINNING INSTALLATION.

THIS KIT MUST BE INSTALLED WITH FABTECH FRONT SHOCKS, NOT INCLUDED WITH THIS KIT.

THIS IS DESIGNED TO BE INSTALLED ALONG WITH FABTECH'S 6", 8", OR 10" COIL SPRING LIFT SYSTEMS.

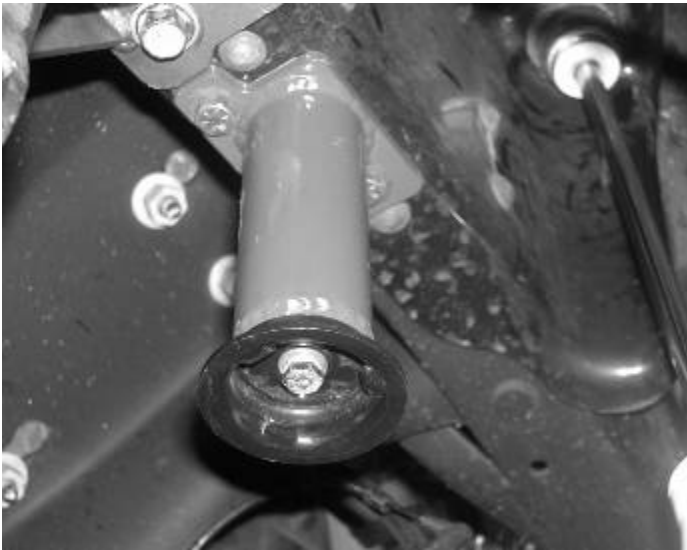
WHEN INSTALLING THIS KIT WITH A 10" SUSPENSION KIT, YOU MUST RUN FABTECH DIRT LOGIC SHOCKS. ADDITIONAL PARTS FOR 10"KIT ARE INCLUDED IN WITH THE DIRT LOGIC SHOCKS

TOOL LIST:

- **Floor Jack (s)**
- **Jack Stands**
- **Assorted Metric & S. A. E. Wrenches & Sockets**
- **Air Hammer**
- **Drill With 3/8" + 1 / 2 " Bit**
- **Die grinder w/ a cut off wheel**

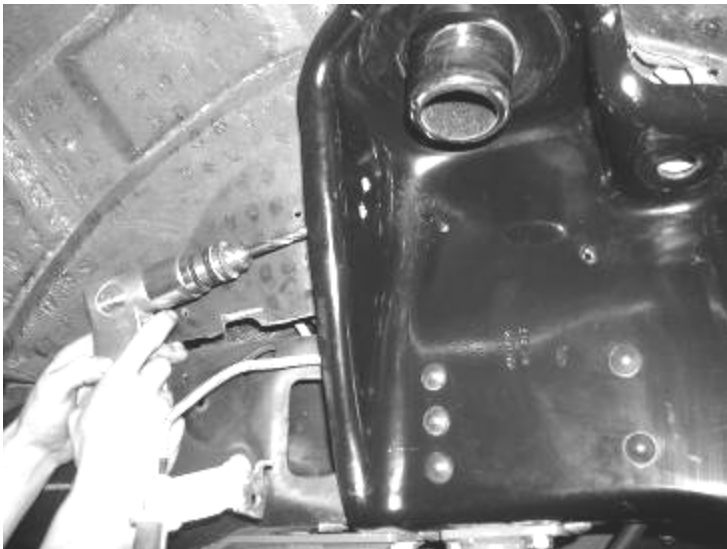
INSTRUCTIONS:

1. Disconnect the negative terminal on the battery. Jack up the front end of the truck and support the front axle with jack stands. **NEVER WORK UNDER AN UNSUPPORTED VEHICLE.** Remove the front tires.
2. Working from both sides of the truck, remove the front sway bar from the truck and save the sway bar and the U-shaped frame mounts with bushings. Discard the end links. You will also need to discard the Fabtech sway bar frame drop included with the suspension kits. Take note on how the sway bar is mounted before removing it. It will be re-installed in a different position later in the install.
3. Locate the brake line and ABS line mounts on the lower coil perch. Disconnect both lines from the front and back of the coil perch and save the hardware. Disconnect the ABS sensors at the connection point at the bottom of the inner wheel well and from the mounting bracket on the radius arm / or four link bracket.
4. Working from both sides of the truck, support the front axle with two floor jacks and remove the front shocks from the truck and discard along with hardware. Carefully lower the jacks enough to remove the coil springs. Save the isolators. If removing Fabtech coils that have been driven on prior to the installation of this kit, mark them driver and passenger, they will be re-installed. If removing factory coils, discard them.
5. Locate and remove the factory front bump stops and save. These can be removed by pulling the bump stop from the cup. If adding this kit to a truck already equipped with a Fabtech lift, remove the factory mounting cup from the Fabtech Bump Stop extensions (FT30143 and FT30144) and save the hardware. If the truck is stock, remove the cup from the frame and save with the hardware. Locate FT30185 and FT30186 front bump stop drop brackets provided with this kit and install in the same location. Attach the factory bump stop cup to the new bracket using the previously removed 5/16" x 1 1/4" bolt, flat washer, and split washer. Press the factory bump stop back into the cup. **SEE PHOTO ON NEXT PAGE.**



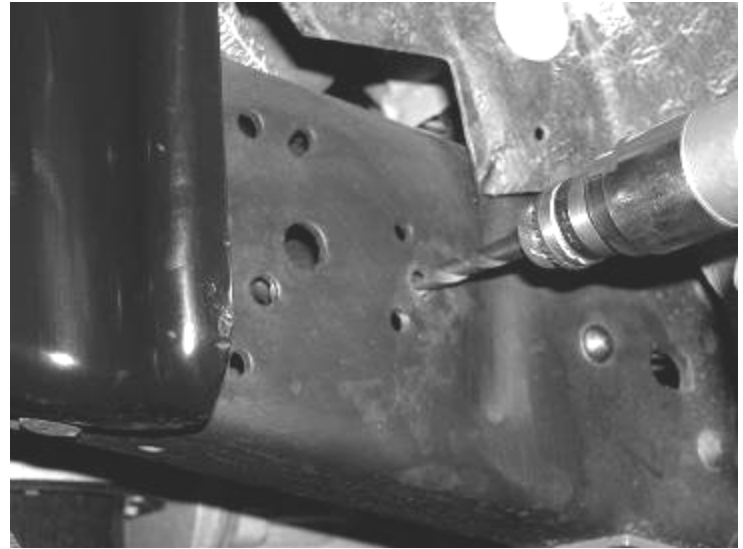
picture shown without bump stop

6. Locate the upper brake line bracket that is mounted to the coil spring bucket (FT30154), remove and save it and discard the hardware. With a drill and 3/8" drill bit, drill out the two holes where the brake line bracket was originally. SEE PHOTO BELOW



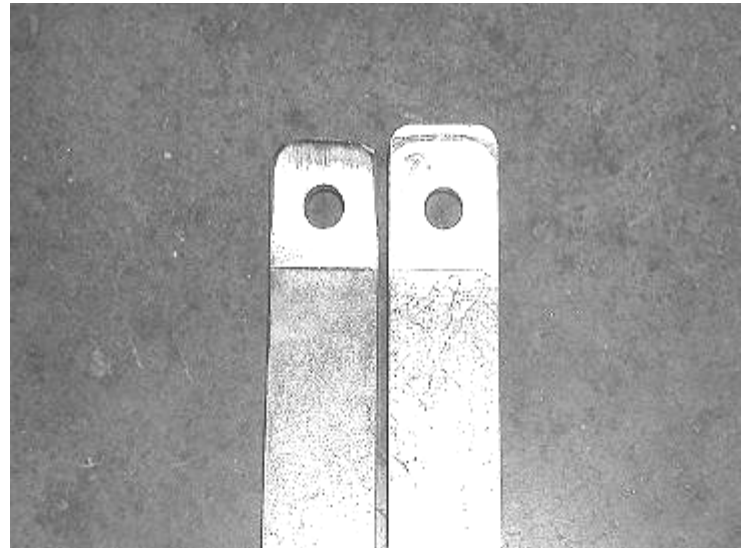
7. Working from the driver side, locate FT30167 shock hoop. Place the hoop inside the coil bucket and install the 3/8" x 1 1/2" bolts, SAE flat washers, and nylock nuts. Have the bolt going through the hoop first so the head of the bolt is facing the coil spring. Finger tighten at this time. Next, use a supplied 1/2" x 1 1/2" bolt, SAE flat washer, FT57-1 large washer, and nylock nut to bolt hoop where the factory shock was. Place the bolt with a SAE washer through the bottom of the hoop going upwards through the coil bucket. The FT58-1 washer will go on top of the coil bucket followed by a flat washer and nylock nut. Finger tighten at this time.
8. With the hoop in place on the bucket, you will see three factory holes in the frame where the rear leg of the hoop is. With a drill and a 1/2" drill bit, drill the middle factory hole out to accommodate the new 1/2" hardware. Install a supplied 1/2" x 1 1/2" bolt, SAE flat washers, and nylock nut.

Finger tighten only at this time. SEE PHOTO IN NEXT COLUMN



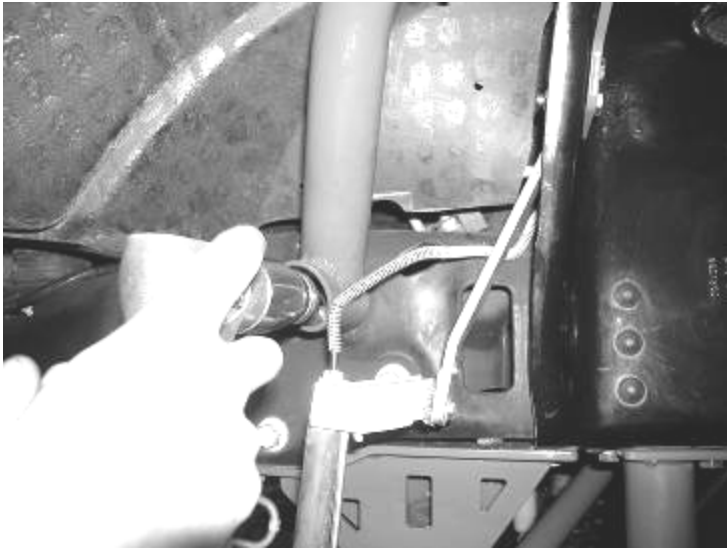
Picture Shown Without Dual Shock Hoop

9. Locate FT30154 brake line bracket. It will be necessary to grind off an 1/8" of material off of the top of the tab to clear the new hardware that is in the original brake line bracket location. The top of the tab has one hole. Mark the bracket accordingly and using an angle grinder, remove the material from the bracket. SEE PHOTO BELOW



10. Remove the previously installed 3/8" nylock nut and washer from the lower bolt on the coil bucket where the hoop is mounted and install the modified FT30154 brake line drop bracket. Torque the 3/8" hardware to 40lbs.
11. Torque the 1/2" bolt that is in the factory shock mount to 50 lbs. then torque the 1/2" bolt that is through the rear leg of the hoop to 70lbs.
12. The frame will need to have a hole drilled to mount the front leg of the hoop. Mark the position of the front hole on the hoop with a center punch. Make sure there are no lines or wires behind the frame and drill a 1/4" pilot hole, followed by a 1/2" hole. Insert one of the 1/2" x 1 1/2" bolts through the hoop and frame with a 1/2" SAE flat washer, split washer

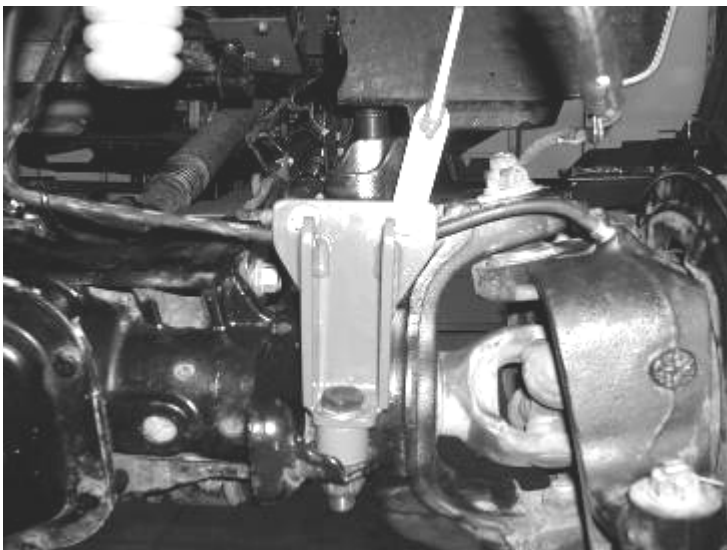
and FT30201 nut tab on the inside of the frame. Torque to 70 ft./lbs. SEE PHOTO ON NEXT PAGE



FOLLOW STEPS THIRTEEN AND FOURTEEN FOR TRUCKS WITH THE 6" & 8" LIFTS

FOLLOW STEPS FIFTEEN AND SIXTEEN FOR TRUCKS WITH A 10" LIFT

13. Locate FT30159 Lower Front Shock Mount, FT30203 Shock Mount Spacer and FT30187 Brake line Bracket. Place the shock spacer on top of the factory sway bar mount first. Then using the supplied 5/8"-11 x 3" bolt, SAE flat washers, and nylock nut, attach the bracket to the factory lower sway bar mount on the axle with bolt facing down going through the new mount. Leave loose. Using the supplied 8mm-1.25x30mm bolts and flat washers attach the new shock mount along with the brake line bracket back to the front of the coil perch. The brake line bracket will mount on the outer bolt. SEE PHOTO BELOW

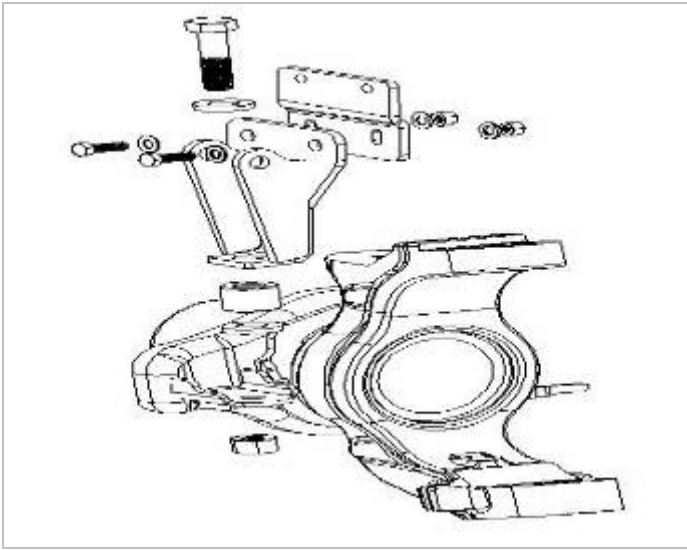


14. Locate FT30179 Lower Rear Shock Mount. Position the shock mount into the factory lower shock mount on the axle. The plastic mounts that hold the ABS lines needs to be flipped over so that the line will mount on above the new shock mount. Using the original 6mm hardware attach the shock mount along with the ABS line mount back to the rear of the coil perch. Leave loose at this time. SEE PHOTO BELOW.

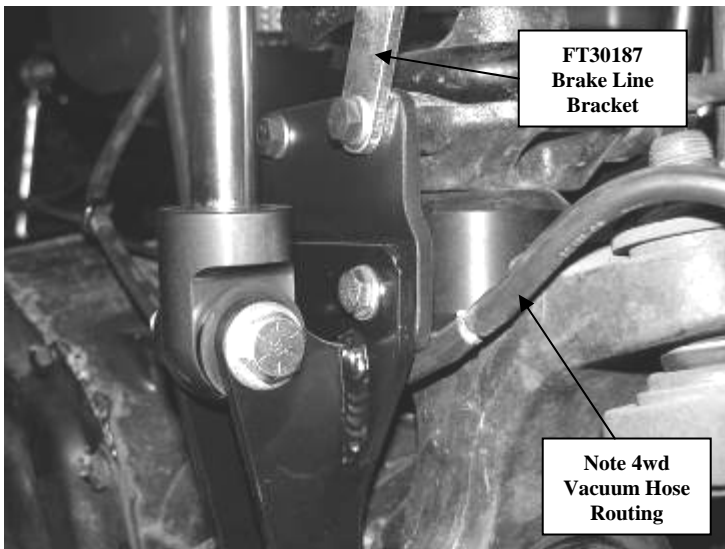
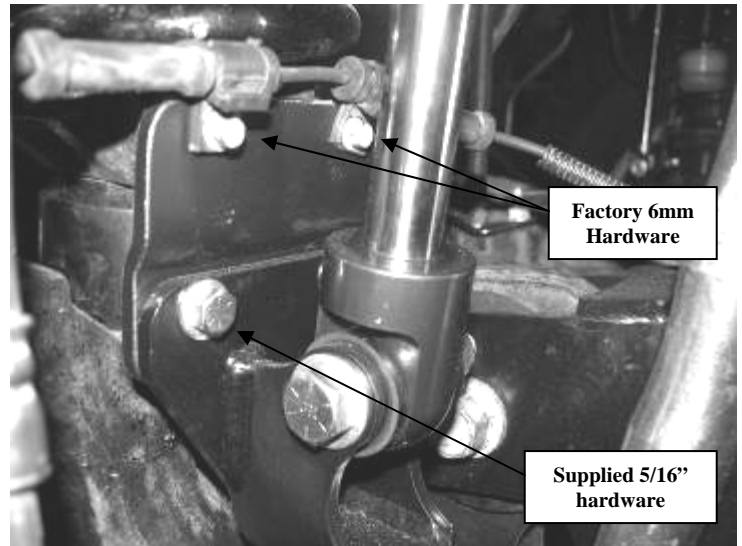
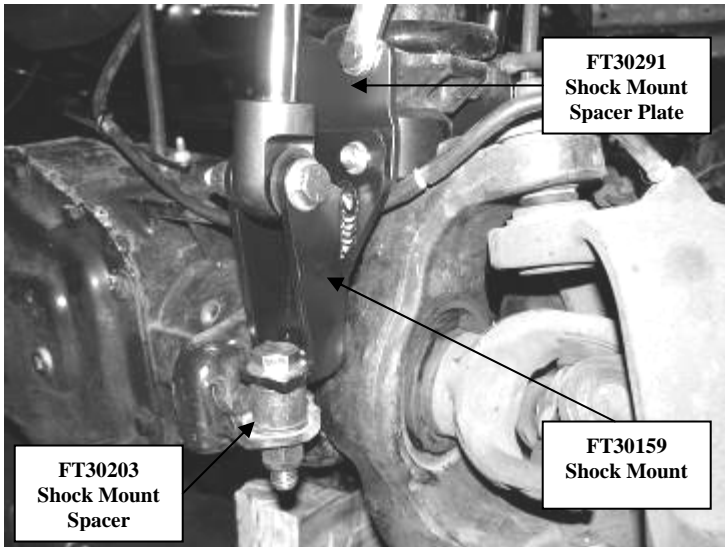
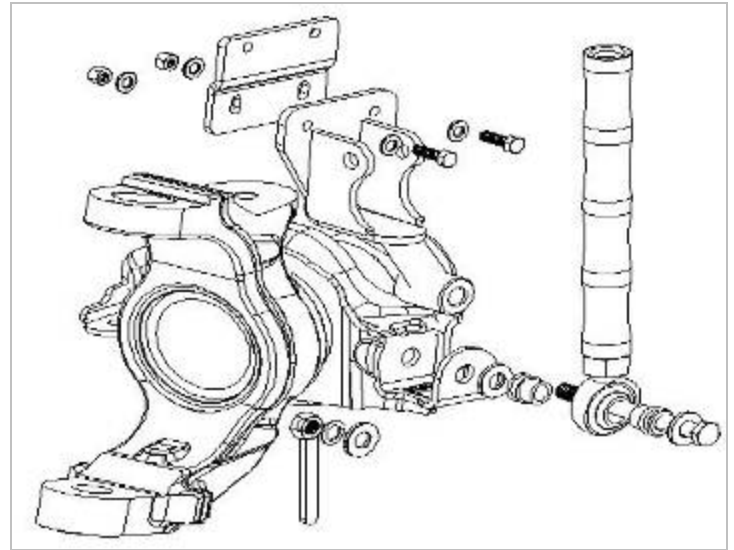


Picture shows coils already installed for proper ABS placement

15. Locate FT30159 Lower Front Shock Mount, FT30203 Shock Mount Spacer and FT30187 Brake line Bracket. Place the shock spacer on top of the factory sway bar mount first. Then using the supplied 5/8"-11 x 3" bolt, SAE flat washers, and nylock nut, attach the bracket to the factory lower sway bar mount on the axle with bolt facing down going through the new mount. Leave loose. Locate FT30291 Brake Line Bracket and hardware that is supplied with the Dirt Logic Shocks. Using the supplied 8mm-1.25x30mm bolts and flat washers, attach the new brackets to the factory coil perch along with the brake line bracket back to the front of the coil perch. The brake line bracket will mount on the outer bolt. Use the supplied 5/16" hardware and attach the shock mount to the line bracket. Leave Loose. SEE DIAGRAM BELOW AND ON LAST PAGE AND PHOTO



flipped over so that the line will mount above the new line bracket. Use the supplied 5/16" hardware and attach the shock mount to the line bracket. Leave loose at this time. SEE DIAGRAM ON LAST PAGE AND PHOTO IN NEXT COLUMN



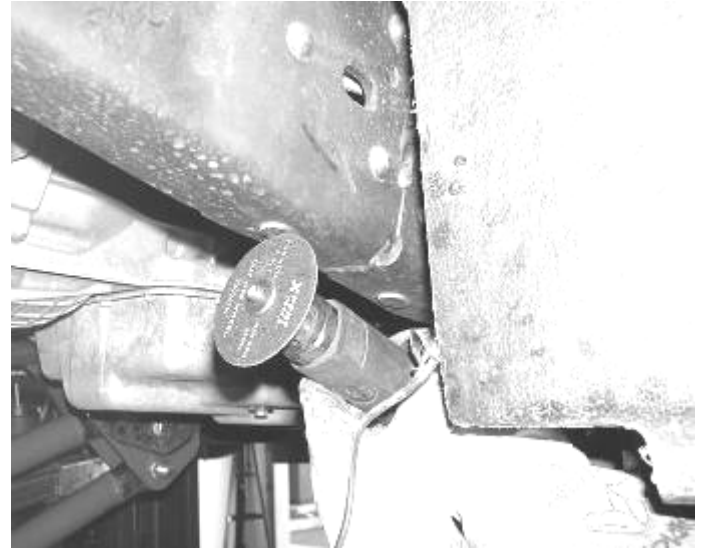
16. Locate FT30179 Lower Rear Shock Mount. Position the shock mount into the factory lower shock mount on the axle. Locate FT30291 Brake Line Bracket and hardware that is supplied with the Dirt Logic Shocks. Using the original 6mm hardware, attach the new bracket along with the ABS line mounts to the back of the factory coil perch. The plastic mounts that hold the ABS lines needs to be

17. Locate FT30170 Billet sway bar end links. Attach one FTS98003 heim joint and one Jam nut to each end of the end links. You will want to thread the jam nuts all the way down the heim joints and the heims all the way into the billet end links.

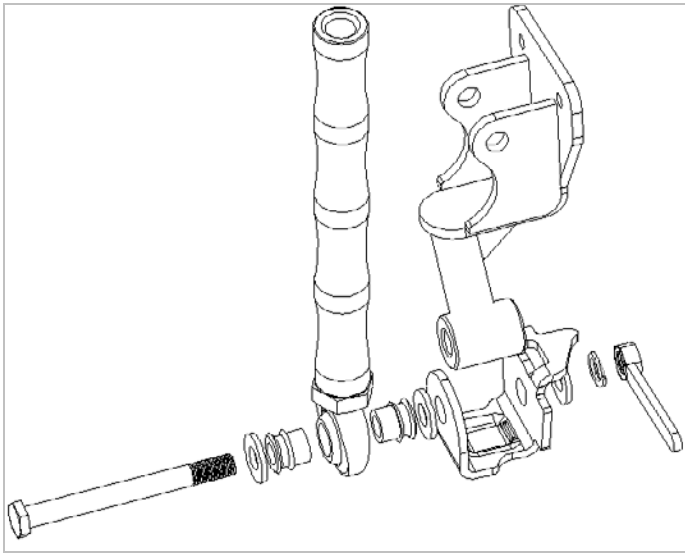
18. Position one end of the end link with two of the supplied FT43 mis-alignments against the rear lower shock mount. Using the supplied 1/2" -13 x 5" bolt, flat washers, split washer, and FT30182 nut tab and attach the end link to the factory lower shock mount. The split and flat washer will mount against the nut tab on the inside of the mount. Now go through and torque all the hardware on the lower shock mounts. Torque the 6mm & 8mm hardware to 10 lbs. Toque the 5/16" hardware to 15bs, the 1/2" hardware to 75 lbs, and the 5/8" hardware to 110. SEE PHOTO AND DIAGRAM ON NEXT PAGE.



Driver side shown above



cutting the face of the rivet



Passenger side shown



Removal of rivet with an air hammer

19. Locate the two rivets that are on the bottom section of the frame. The first rivet is 10" back from the bottom of the shock hoop. The second rivet is another 4" back from the first. Using die grinder with a cut off-wheel, cut an X in the face of the rivet. Next use an air hammer to remove the remainder of the rivets off the bottom side of the frame. SEE PHOTO IN NEXT COLUMN.

FOLLOW STEP 20 & 21 ON DIESEL TRUCKS

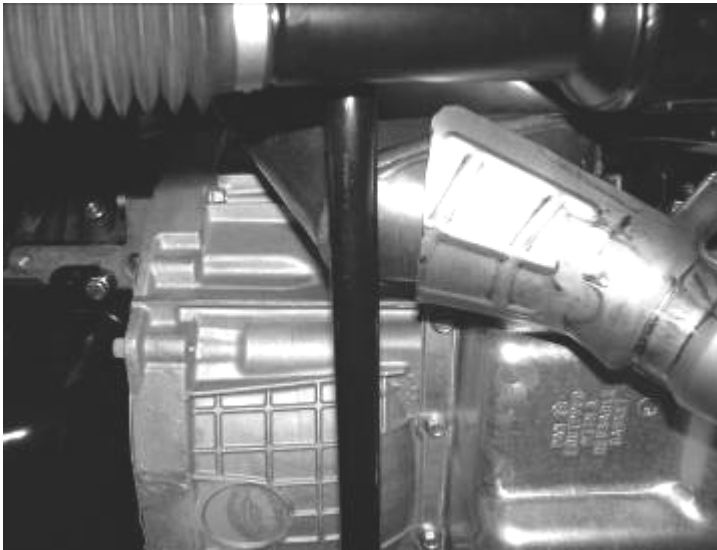
FOLLOW STEPS 22 & 23 ON GAS TRUCKS

FOLLOW STEP 23 FOR ALL TRUCKS WITH 10" LIFT

20. Locate FT30163 (driver side) FT30164 (pass. side) Sway bar frame mount. Using the supplied 7/16"-14 x 1 1/2"bolts, flat washers, and nylock nuts, attach the bracket to the frame. Torque the bolts to 70lbs.
21. Locate the factory sway bar and sway bar frame mounts. Attach the sway bar to the previously installed frame brackets using the 3/8"-16 x 1 1/2"bolts, flat washers, and nylock nuts as shown in the photo below. Do not connect the end links at this time. Torque the bolts 40 lbs. SEE PHOTO ON NEXT PAGE



22. Using a die grinder with a cut-off wheel, cut a 2" half moon section of the heat shield from the catalytic converter. SEE PHOTO BELOW.



Picture shown w/sway bar installed and heat shield cut

23. Locate FT30219 Sway bar frame spacer and place between FT30163 (driver side) FT30164 (pass. side) Sway bar frame mounts on the frame. Using the supplied 7/16"-14 x 2 3/4" hardware attach to the frame. SEE PHOTO IN NEXT COLUMN

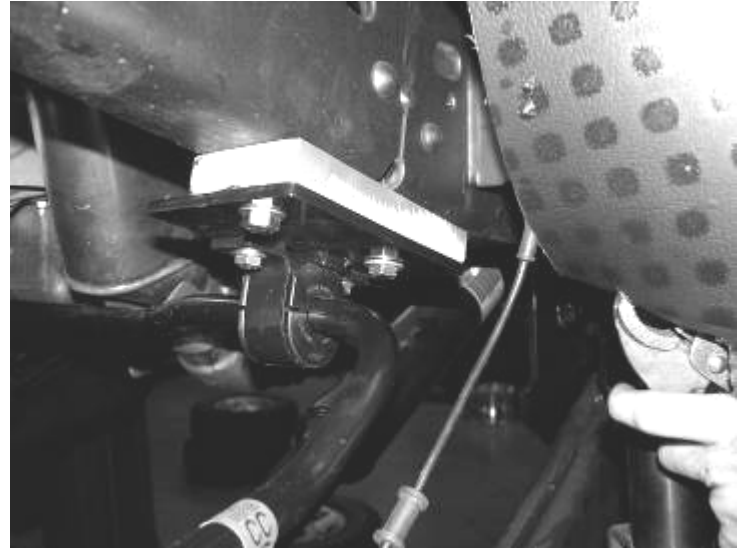


Photo shown w/sway bar attached

RESUME INSTALL **ON ALL ENGINES & KITS**

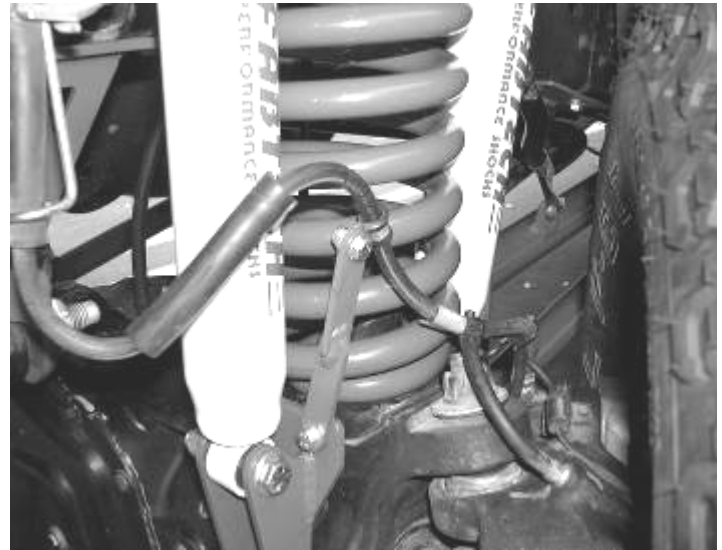
24. Locate the factory sway bar and sway bar frame mounts. Attach the sway bar to the previously installed frame brackets using the 3/8"-16 x 1 1/2" bolts, flat washers, and nylock nuts as shown in the photo below. Do not connect the end links at this time. Torque the bolts 40 lbs.
25. Repeat steps seven through twenty-two on the passenger side of the truck.
26. Locate the front coils and install them accordingly. Make sure to have the isolators on the top of the coils prior to putting them on the truck. SEE PHOTO BELOW



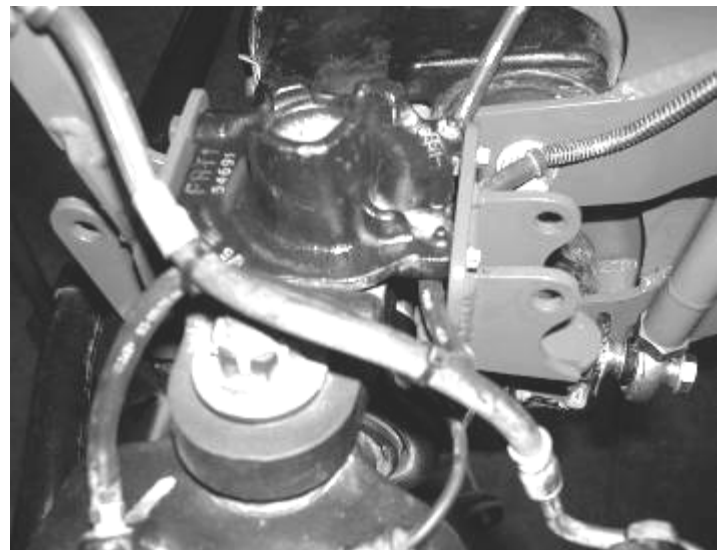
27. Using the floor jacks, raise the front axle enough to compress the front coils approx. 1". Locate the correct front shocks and install onto the truck use the supplied ½"-13 x 3" bolts, flat washers, and nylock nuts. Torque the bolts to 70lbs. If you are installing Fabtech Performance shocks, the white body of the shock must be mounted down with shafts of the shocks mounted at the hoop. If installing Fabtech Dirt Logic shocks, The body of the shock mounts on the hoop and the shafts mount on the lower brackets.
28. The factory brake line bracket will need to be removed and discarded. Carefully pry the tab open so the brake line can be removed from the bracket. Next, you will need to separate the vacuum line for the Automatic Locking Hubs for the 4wd system and remove it from the loop bracket on the differential and brake line bracket. SEE PHOTO BELOW.



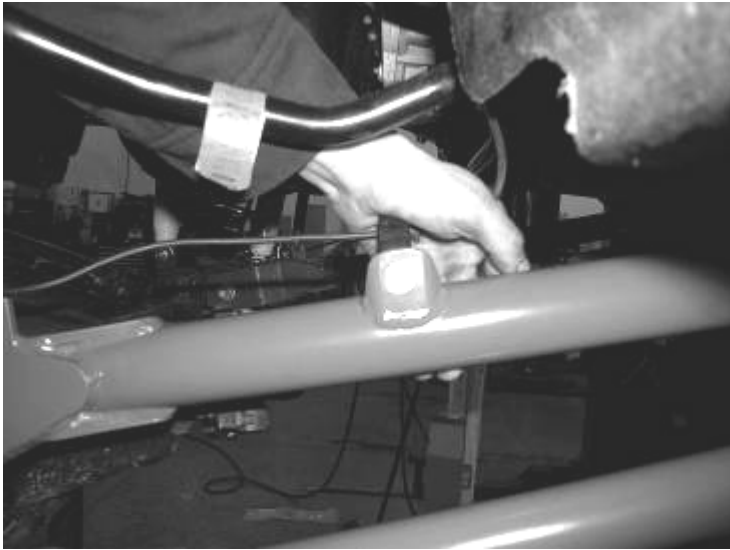
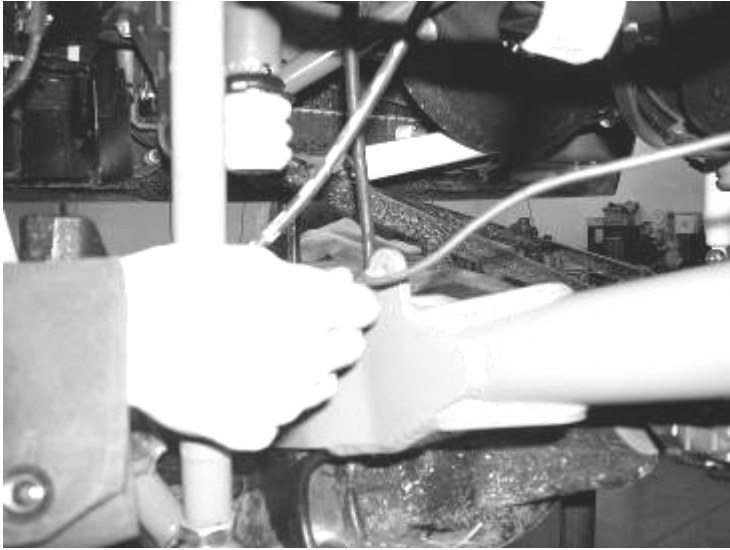
29. Locate the supplied adel clamp, ¼" –20 x ¾" bolt, washers, and nylock nut. Place the clamp around the brake hose and attach it to the FT30187 Brake Line Bracket. The FT30187 bracket will need to be as close to the coil as possible without making contact with it. This is done for maximum tire clearance. Route the 4wd vacuum line from the knuckle up to the brake line and down and behind the lower rear shock mount. Use the supplied zip ties and connect the vacuum line to the brake line. SEE PHOTOS IN NEXT COLUMN



Completed picture used to show brake line routing



30. Route the ABS lines up the Radius / 4 Link arm and push the first ABS plastic clip into the tab at the front of the arm. Continue the line up to the next point where the factory tab is bolted to the arm that was removed from the stock radius arms. Make sure that the bracket is mounted up and with the opening facing outwards. When running the 4 link arm kit, the factory ABS bracket must be slightly bent inwards to clear the sway bar. Make sure to have some slack in the lines at all the connection points. The rubber sleeves on the lines are adjustable. If they need to be moved, use WD40 or a Silicone spray to lubricate the line so it will slide without damaging the line. Run the line the rest of the way up the arm and up to the fender well connection point. Make sure to run the line below the sway bar. SEE PHOTOS ON NEXT PAGE

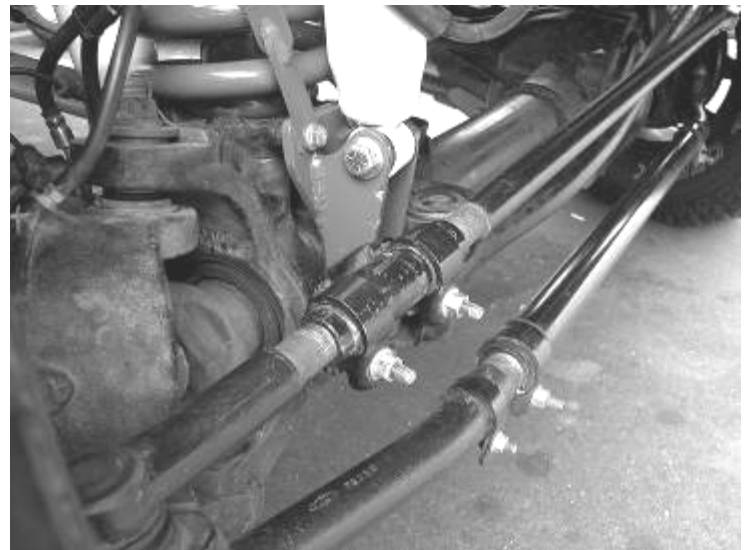


31. Locate the supplied 1/2"-13 x 3" bolts, SAE flat washers, split washers, nylock nuts, and mis-alignments and connect the sway bar end links to the sway bar. The end link mounts on the inside of the sway bar. SEE PHOTO IN NEXT COLUMN.



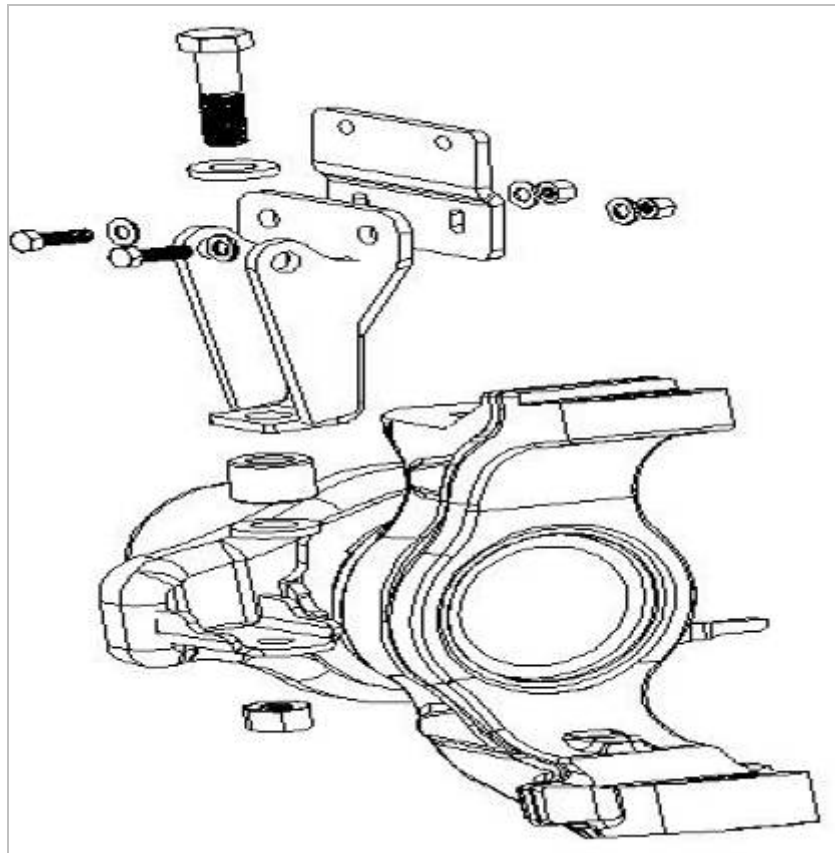
Passenger Side Shown Off Truck.

32. Locate the adjuster on the drag link and adjust it so the bolts face towards the front of the truck. This is done for clearance of the Passenger front shock bracket. SEE PHOTO BELOW.

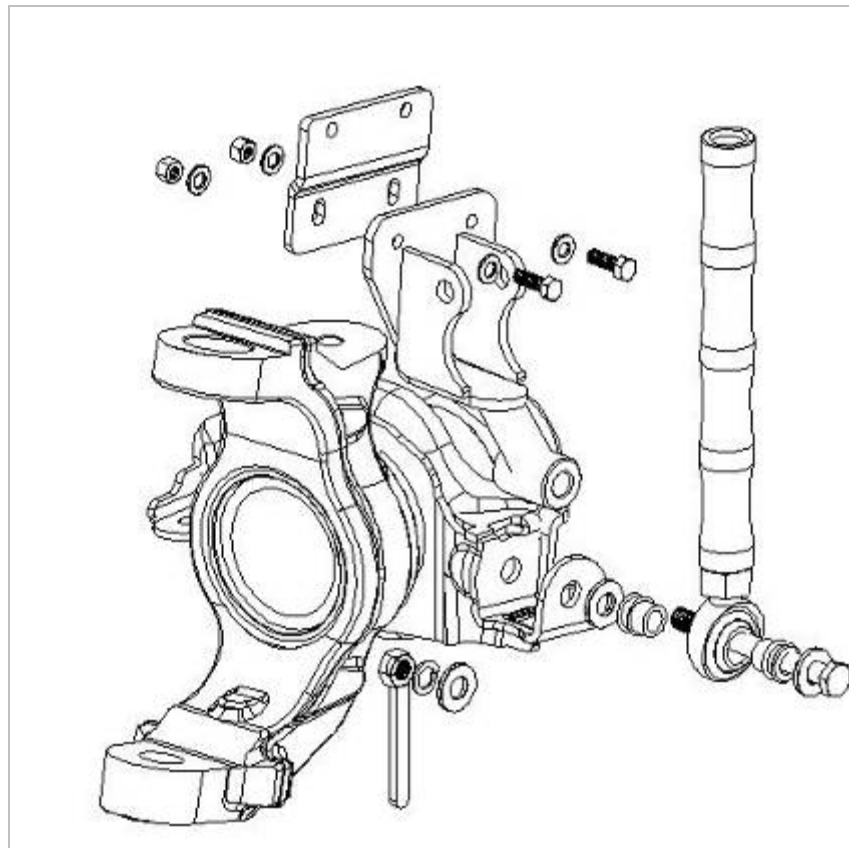


33. Re-install the front tires and set the truck back on the ground. Turning the steering wheel fully in each direction, check for contact between the tires and any newly installed components.

34. Check the front-end alignment and set to the factory specifications.



DIAGRAMS FOR 10" LIFT ONLY



RETORQUE ALL NUTS, BOLTS AND LUGS AFTER 50 MILES AND PERIODICALLY THEREAFTER.
For technical assistance call: 909-597-7800

Product Warranty and Warnings

Fabtech provides a Limited Lifetime Warranty to the original retail purchaser who owns the vehicle, on which the product was originally installed, for defects in workmanship and materials.

The Limited Lifetime Warranty excludes the following Fabtech items; bushings, bump stops, ball joints, tie rod ends, limiting straps, cross shafts, heim joints. These parts are subject to wear and are not considered defective when worn. They are warranted for 60 days from the date of purchase for defects in workmanship.

Take apart shocks are considered a serviceable shock with a one year warranty on leakage only. Service seal kits are available separately for future maintenance. All other shocks are covered under our Limited Lifetime Warranty.

Fabtech does not warrant any product for finish, alterations, modifications and/or installation contrary to Fabtech's instructions. Alterations to the finish of the parts including but not limited to painting, powdercoating, plating and/or welding will void all warranties. Some finish damage may occur to parts during shipping which is considered normal and is not covered under warranty.

Fabtech products are not designed nor intended to be installed on vehicles used in race applications or for racing purposes or for similar activities. (A "RACE" is defined as any contest between two or more vehicles, or any contest of one or more vehicle against the clock, whether or not such contest is for a prize). This warranty does not include coverage for police or taxi vehicles, race vehicles, or vehicles used for government or commercial purposes. Also excluded from this warranty are sales outside of the United States of America.

Installation of most suspension products will raise the center of gravity of the vehicle and will cause the vehicle to handle differently than stock. It may increase the vehicle's susceptibility to a rollover, on road and off road, at all speeds. Extreme care should be taken to operate the vehicle safely at all times to prevent rollover or loss of control resulting in serious injury or death. Fabtech front end Desert Guards may impair the deployment or operation of vehicles equipped with supplemental restraining systems/air bag systems and should not be installed if the vehicle is equipped as so.

Fabtech makes every effort to ensure suspension product compatibility with all vehicles listed in the catalog, but due to unknown auto manufacturers production changes and/or inconsistencies by the auto manufacturer, Fabtech cannot be responsible for 100% compatibility, including the fitment of tire and wheel sizes listed. The Tire and Wheel sizes listed in Fabtech's catalog are only a guideline for street driving with noted fender trimming. Fabtech is not responsible for damages to the vehicle's body or tires.

Fabtech's obligation under this warranty is limited to the repair or replacement, at Fabtech option, of the defective product only. All costs of removal, installation or re-installation, freight charges, incidental or consequential damages are expressly excluded from this warranty. Fabtech is not responsible for damages and/or warranty of other vehicle parts related or non related to the installed Fabtech product. This warranty is expressly in lieu of all other warranties expressed or implied. This warranty shall not apply to any product that has been subject to accident, negligence, alteration, abuse or misuse as determined by Fabtech.

Fabtech suspension components must be installed as a complete system including shocks as shown in our current catalog. All warranties will become void if Fabtech parts are combined and/or substituted with other aftermarket suspension products. Combination and/or substitution of other aftermarket suspension parts may cause premature wear and/or product failure resulting in an accident causing injury or death. Fabtech does not warrant products not manufactured by Fabtech.

Installation of Fabtech product may void the vehicles factory warranty; it is the consumer's responsibility to check with their local vehicle's dealer for warranty disposition before the installation of the product.

It is the responsibility of the distributor and/or the retailer to review all warranties and warnings of Fabtech products with the consumer prior to purchase.

Fabtech reserves the right to supercede, discontinue, change the design, finish, part number and, or application of parts when deemed necessary without written notice. Fabtech is not responsible for misprints or typographical errors within the catalog or price sheet.