



350 S. St. Charles St. Jasper, In. 47546
Ph. 812.482.2932 Fax 812.634.6632

www.ridetech.com

Part # 12060298
64-69 Lincoln Air Suspension System

Front Components:

- | | | |
|---|----------|--|
| 1 | 12060999 | CoolRide Kit |
| 1 | 12060601 | Single Adjustable Shocks w/ Bolt on shock brackets |
| 1 | 12061499 | Lower StrongArms |

Rear Components:

- | | | |
|---|----------|---|
| 1 | 12075401 | Single Adjustable Rear Shockwaves w/ Lowering Block Kit |
|---|----------|---|



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Part # 12060999
61-69 Lincoln Front CoolRide
For Use w/ Lower StrongArms

Components:

2	90006873	224c Air spring
2	90000694	Upper air spring mount
2	90000683	Upper mounting plate
2	90000682	Upper mounting plate spacer
1	90000684	Driver side brake line tab
1	90000685	Passenger side brake line tab

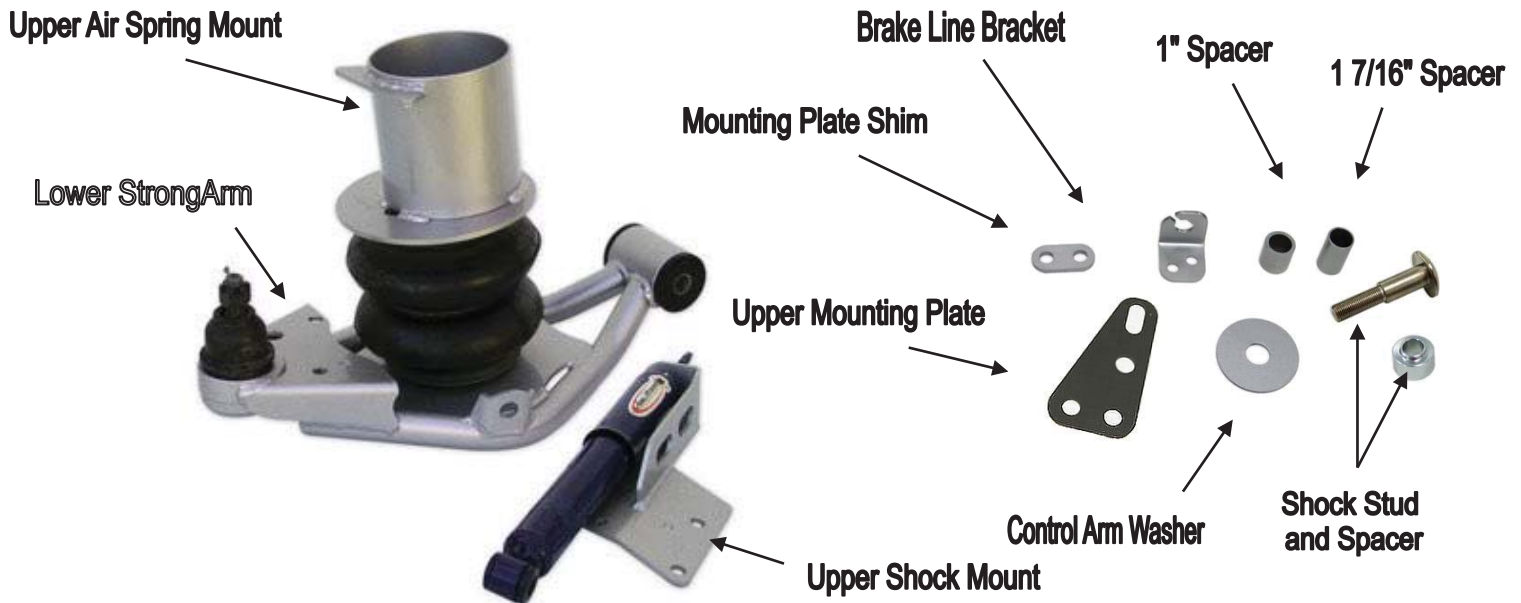
Hardware:

4	99371006	3/8" x 1 1/2" USS bolt	Upper plate
2	99371005	3/8" x 1 1/4" USS bolt	Upper plate
12	99373003	3/8" SAE flat washer	Upper plate & air spring
8	99373005	3/8" lock washer	Upper plate & air spring
4	99372004	3/8" USS nut	Upper plate
2	99435002	7/16" x 8" stud	Upper air spring mount (Cut off to 6 3/4" long)
2	99433002	7/16" SAE flat washer	Upper air spring mount
2	99432001	7/16" USS Nylok nut	Upper air spring mount
4	99372002	3/8" USS Nylok nut	Air spring to upper mount
2	99371001	3/8" x 3/4" USS bolt	Air spring to lower arm

DO NOT USED PETROLEUM BASED GREASE ON THE POLY BUSHINGS

STRONGARMS

Installation Instructions for ARF10900-LCA



1. Raise the vehicle to a safe and comfortable working height. Support the vehicle by the frame so that the suspension can hang freely.
2. Remove the coil spring, lower control arm and shock absorber. Refer to factory service manual for disassembly procedures.
3. The inner fender well shield next to the upper control arm and the factory brake line frame bracket must also be removed.



4. Remove the factory upper shock mount. The front of it is held in with two rivets that must be ground down and pushed out. In its place install the upper air spring mounting plate & shim. The shim will go under the front side of the plate and is secured with two 3/8" x 1 1/2" bolts, flat washers, nuts and lock washers. The rear side of the plate will be secured with one 3/8" x 1 1/4" bolt flat washer and lock washer.

5. Apply thread sealant to a straight air line fitting and screw it into the top of the air spring. Fasten the air spring to the upper mount using two 3/8" Nylok nuts and flat washers.



6. Thread the 7/16" x 6 3/4" stud into the nut in the bottom of the bracket.
7. Raise the assembly into the coil spring pocket with the stud protruding through the upper plate. The wings on the side of the bracket will rest against the flat side of the coil spring retainer.
8. Secure the assembly with a 7/16" Nylok nut and flat washer. **Note:** The air line must also be routed at this time.



9. Bolt the lower StongArm to the frame using the 3/4" x 8" bolt and the two spacers supplied. Install the 1" spacer to the front side of the bushing and the 1 7/16" spacer to the rear. A large washer will go between the bushing and the spacers.
10. Attach the lower arm to the spindle and strut rod. Two 1/2" x 1 1/2" bolts and lock washers are supplied for the strut rod.
11. Fasten the air spring to the lower arm using a 3/8" x 3/4" bolt, flat washer and lock washer.



12. Raise the lower arm with a jack. Mark the frame where the lower shock tab contacts it. This must be cut out to allow clearance. Grind all edges smooth when finished.
13. Install the new brake line bracket with using the factory bolts and clip.
14. Check air spring clearance through full suspension travel. **Allowing the air spring to rub will result in failure and is not a warrantable situation.**
15. Ride height on this air spring is approximately 5" tall, but will vary to driver preference.



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Part # 12061499
61-69 Lincoln Lower StrongArms
For Use w/ CoolRide

Components:

1	90000690	Driver side arm
1	90000691	Passenger side arm
2	90000923	Ball joint – Proforged # 101-10151
4	90001084	Poly bushing half
2	90000687	Inner bushing sleeve
4	90000686	Lower control arm washer
2	90000688	Control arm spacer (Front 1")
2	90000689	Control arm spacer (Rear 1 7/16")
2	90001092	Tube of Lithium grease

Hardware:

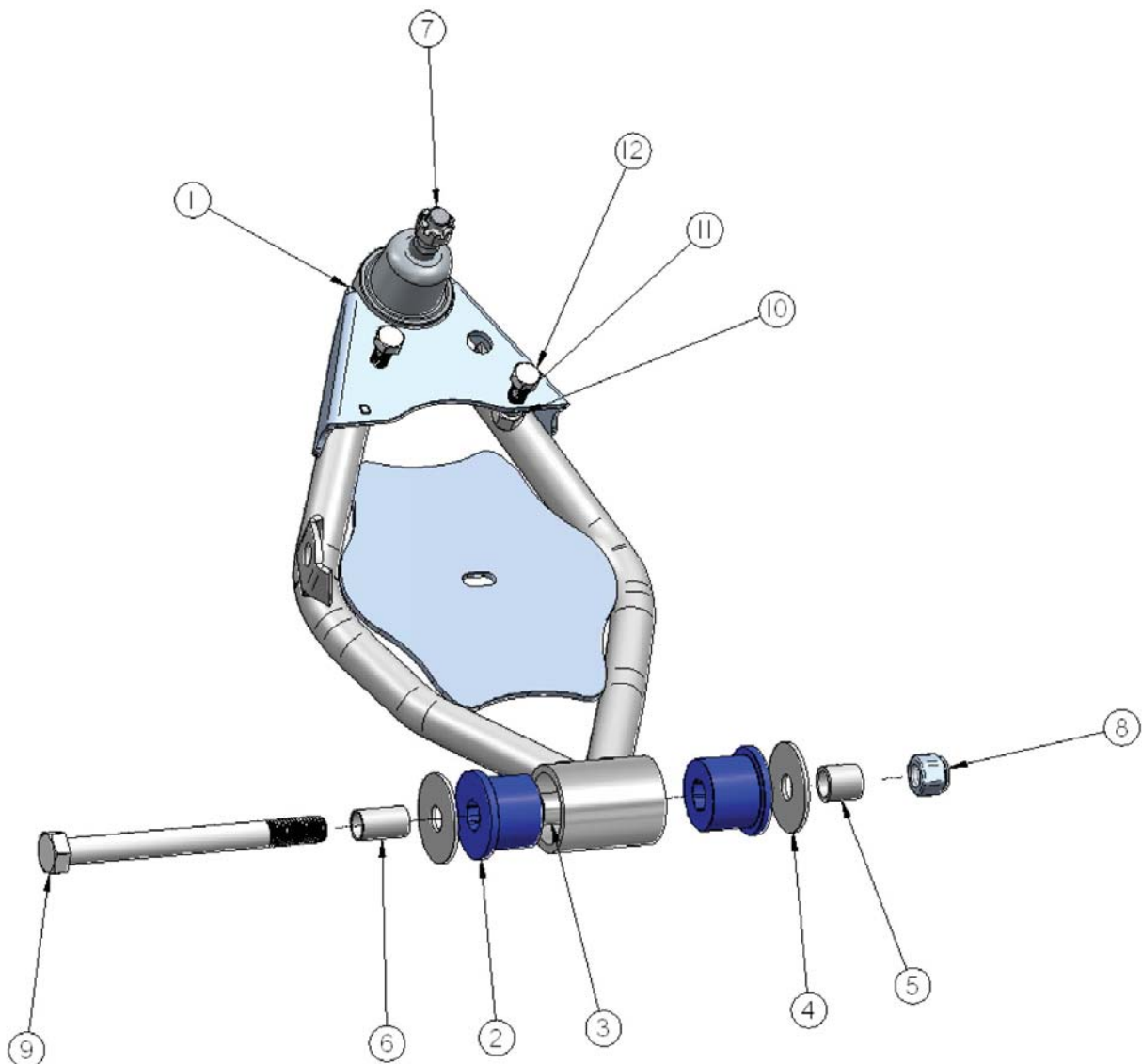
2	99751001	3/4"-16 x 8" bolt	Lower StrongArm to frame
2	99752001	3/4"-16 Nylok nut	Lower StrongArm to frame
4	99501002	1/2"-13 X 1 1/2" bolt	Strut rod to lower arm
4	99502001	1/2"-13 Nylok nut	Strut rod to lower arm
4	99503002	1/2" lock washer	Strut rod to lower arm

DO NOT USED PETROLEUM BASED GREASE ON THE POLY BUSHINGS

1. Remove the OEM control arms, by detaching from the spindle, frame, & strut rod.
2. Bolt the control arm in place using the diagram on Page 2 as a reference for bushing spacer locations. Tighten the bushing hardware enough to eliminate any gaps, but still able to move by hand. Torque the strut rod hardware to 75 ft-lbs.
3. Insert the ball joint into the spindle. Torque the castle nut to 80 ft-lbs and tighten the nut to align the cotter pin hole. With the hole aligned, install the cotter pin.
4. Refer to the air spring/ shock instructions for the remainder of the install.

STRONGARMS

Item #	Description	Qty.
1.	Driver side arm	1
2.	Poly bushing half	2
3.	Inner bushing sleeve	1
4.	Large washer	2
5.	Control arm spacer (Front 1")	1
6.	Control arm spacer (Rear 1 7/16")	1
7.	Ball joint	1
8.	Aluminum bearing spacer	4
9.	3/4"-16 x 8" bolt	1
10.	1/2"-13 Nylok nut	2
11.	1/2" lock washer	2
12.	1/2"-13 X 1 1/2" bolt	2





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Part # 12060601

61-69 Lincoln Front HQ Series Shock Kit

For Use w/ CoolRide and Lower StrongArms

Shock:

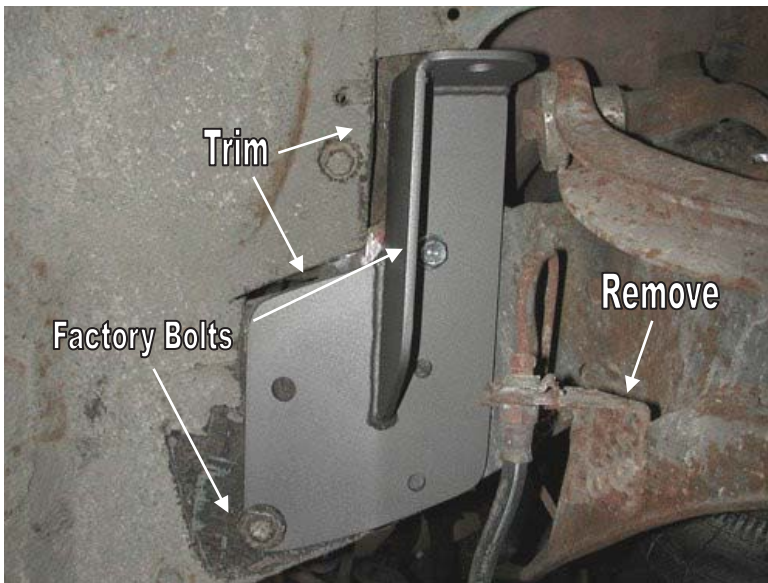
- | | | |
|---|------------|---------------------------------------|
| 2 | 986-10-042 | 4.75" Stroke Stud Top Shock Cartridge |
| 2 | 70011138 | 3/4" ID Shock Bushing |
| 2 | 90002102 | 1/2" ID Inner Sleeve |

Components:

- | | | |
|---|----------|----------------------------------|
| 4 | 70011140 | Stem Bushings |
| 4 | 70011141 | Stem Washers |
| 2 | 90001619 | Cantilever Pin Bolt Kit |
| 1 | 90002320 | Driver side upper shock mount |
| 1 | 90002321 | Passenger side upper shock mount |

Hardware:

- | | | | |
|---|----------|-----------------------------|-------------------|
| 8 | 99373007 | 3/8" x 1" self-tapping bolt | Upper shock mount |
| 4 | 99372006 | 3/8"- 24 Thin Jam Nut | Upper Shock Stud |



1. Bolt the upper shock mount to the subframe using four 3/8" x 1" self tapping bolts. The bracket will locate off of the factory bolt shown in the picture. Drill the holes with a 5/16" bit.

2. The inner fender well must be trimmed to allow clearance for the shock mount. **Be careful not to cut anything inside engine bay.**

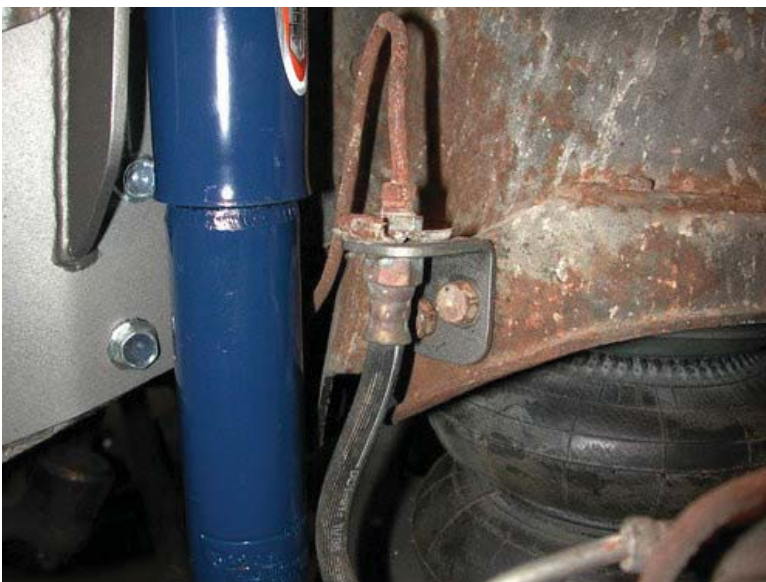
3. Remove the factory brake line bracket.
This picture is of the passenger side.



4. Bolt the top of the shock to the upper mount using the bushings and hardware supplied.

5. Install the 1/2"-20 x 3" flange head bolt through the lower shock eye. Then install the aluminum spacer with the step facing the arm. Slide the bolt through the arm and fasten with the flat washer & nylok nut supplied.

This picture is of the driver side.



6. Install the new brake line bracket with using the factory bolts and clip.

Part # 12075401
64-69 Lincoln Rear Shockwave Kit – Master Single Adjustable

Rear Shockwaves (Includes the following)

2	982-10-806	6" stroke Master Series single adjustable shock
2	24090799	7000 Master Series rolling sleeve assembly
2	90002025	2.7" eyelet
2	90001994	.625" I.D. bearing
4	90001995	Bearing snap ring
4	70009554	Poly bushing kit (Installed in shock body)
2	90000699	(A930) 3/4" x 11/16" bushing sleeve
4	90002043	.500" ID spacer for bearing
2	234-00-153	Locking Ring
2	90000700	(A931) Upper mounting plate
2	90000701	(A932) Lower U-bolt plate
4	99626002	5/8" x 9 1/2" U-bolts
2	90000702	(A933) Aluminum lowering block
2	90000697	(A928) 1 1/2" x 11/16" aluminum washer
2	90000698	(A929) 1 1/2" x 1/2" aluminum washer

Hardware kit:

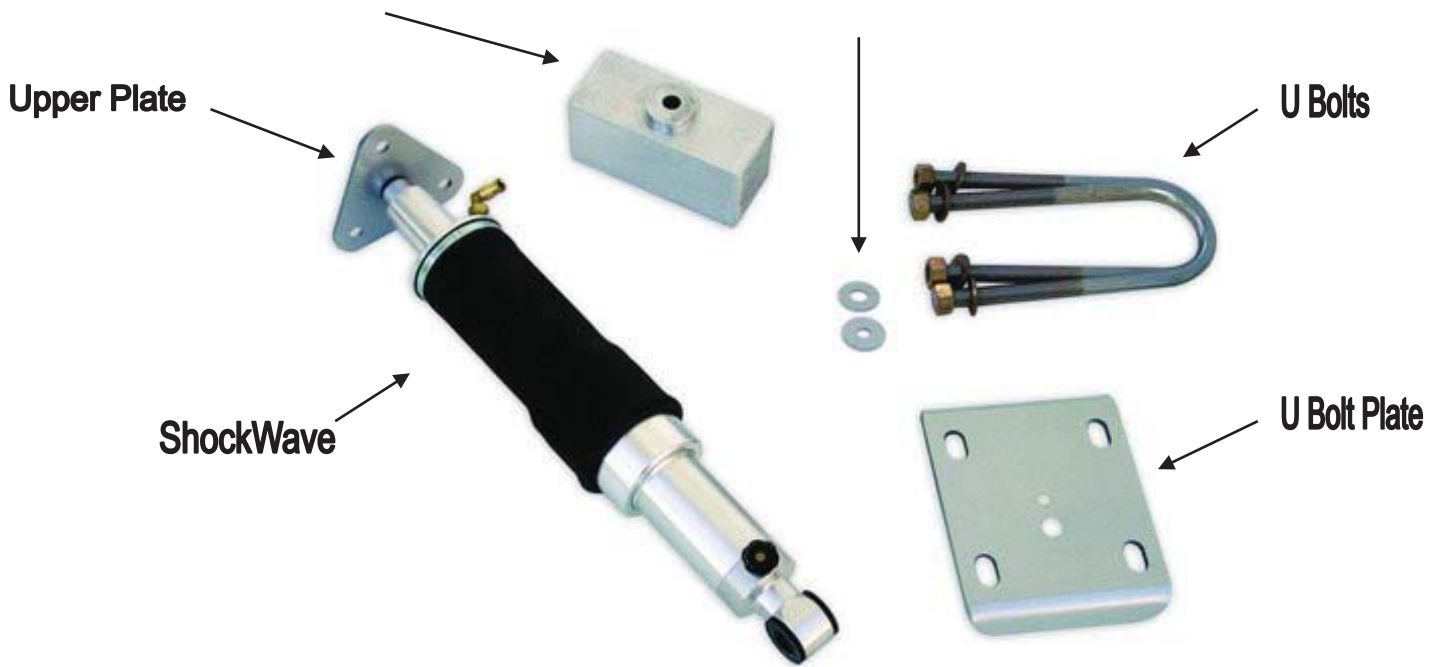
2	99501010	1/2" x 2 1/4" SAE Gr 8 bolt	Upper eyelet to stud adapter
2	99502003	1/2" SAE Nylok nut	Upper eyelet to stud adapter
2	99502002	1/2" SAE Nylok nut	Lower stud
2	99371020	3/8" x 2" SAE Allen bolt	Leaf springs
2	99372005	3/8" SAE Nylok nut	Leaf springs
8	99622010	5/8"-18 Hex Nut	U-Bolts
8	99623010	5/8" Flat Washer	U-Bolts

WARNING: ATTEMPTING TO REMOVE THE AIR FITTING WILL DAMAGE IT AND VOID THE WARRANTY.

Installation Instructions

Lowering Blocks

Aluminum Washers



1. Raise the vehicle to a safe and comfortable working height with the suspension hanging free.
2. Remove the factory shock absorbers and upper mounts.



3. To get maximum drop, the two lower leaf springs must be removed from the pack. Raise the U-bolts clamping the axle to the leaf spring pack. Raise the axle out of the way with a floor jack. Secure it with two jack stands.

4. Using two C clamps secure the top 4 springs. Then remove the bolt in the center of the leaf spring and the straps at either end of the pack. Remove the lower two leaves.



5. Secure the pack with a 3/8" x 2" Allen bolt and Nylok nut. The bolt needs to be dropped in from the top of the pack. Reinstall the straps then remove the clamps.

6. Place the Aluminum lowering block on top of the leaf springs. The Allen head will locate the block. Lower the axle down on top of the block; the step on top of the block will slide into the hole in the bottom of the leaf spring pad on the axle.



7. Hang the U-bolts over the axle. Position the U-bolt plate under the leaf springs so that the smaller hole in the plate aligns with the Allen bolt and nut. Secure the assembly with the four 5/8" nuts and lock washers supplied.

Note: The plate and lowering block will offset the axle to the rear of the vehicle. This will keep the driveshaft from bottoming out and center the tire in the wheel well.



8. The ShockWave must be bolted to the car with the upper mounting bolt running front to rear.



10. Bolt the plate to the factory shock mount holes using the factory bolts.

11. Bolt the Shockwave to the eye to stud adapter using the $\frac{1}{2}$ " x $2\frac{1}{4}$ " bolt and Nylok nut. A .190" thick steel spacer must be installed on either side.

Note: You may need to position the air fitting for clearance. This can be done by holding the bottom of the Shockwave and twisting the bellow.



11. Place the $\frac{1}{8}$ " thick steel washer with the $\frac{11}{16}$ " inside diameter over the factory lower shock stud on the axle. Then slide the Shockwave over the stud.



12. Secure the Shockwave to the stud using the $\frac{1}{8}$ " thick $\frac{1}{2}$ " inside diameter washer and $\frac{1}{2}$ " Nylok nut.

13. Check air spring clearance through full suspension travel.

Allowing the Shockwave to rub will cause failure and is not a warrantable situation.

14. Ride height on this Shockwave is 17.75". This is determined by measuring from the center eye on the bottom up to the upper plate. 4-5 clicks on the valve adjustment will be a good starting point. These settings may vary to driver preference.

Shock adjustment 101- Single Adjustable

Rebound Adjustment:

How to adjust your new shocks.

The rebound adjustment knob is located on the top of the shock absorber protruding from the eyelet.

You must first begin at the ZERO setting, then set the shock to a soft setting of 20.



-Begin with the shocks adjusted to the ZERO rebound position (full stiff). Do this by rotating the rebound adjuster knob clockwise until it stops.



-Now turn the rebound adjuster knob counter clock wise 20 clicks. This sets the shock at 20. (settings 21-24 are typically too soft for street use).

Take the vehicle for a test drive.



-if you are satisfied with the ride quality, do not do anything, you are set!

-if the ride quality is too soft increase the damping effect by rotating the rebound knob clock wise 3 clicks.

Take the vehicle for another test drive.



-if the vehicle is too soft increase the damping effect by rotating the rebound knob clock wise 3 additional clicks.



-If the vehicle is too stiff rotate the rebound adjustment knob counter clock wise 2 clicks and you are set!

Take the vehicle for another test drive and repeat the above steps until the ride quality is satisfactory.

Note:

One end of the vehicle will likely reach the desired setting before the other end. If this happens stop adjusting the satisfied end and keep adjusting the unsatisfied end until the overall ride quality is satisfactory.

The care and feeding of your new ShockWaves

1. Although the ShockWave has an internal bumpstop, **DO NOT DRIVE THE VEHICLE DEFLATED RESTING ON THIS BUMPSTOP. DAMAGE WILL RESULT.** The internal bumpstop will be damaged, the shock bushings will be damaged, and the vehicle shock mounting points may be damaged to the point of failure. **This is a non warrantable situation.**
2. Do not drive the vehicle overinflated or "topped out". Over a period of time the shock valving will be damaged, possibly to the point of failure. **This is a non warrantable situation!** If you need to raise your vehicle higher than the ShockWave allows, you will need a longer unit.
3. The ShockWave is designed to give a great ride quality and to raise and lower the vehicle. **IT IS NOT MADE TO HOP OR JUMP!** If you want to hop or jump, hydraulics are a better choice. This abuse will result in bent piston rods, broken shock mounts, and destroyed bushings. **This is a non warrantable situation.**
3. Do not let the ShockWave bellows rub on anything. Failure will result. **This is a non warrantable situation.**
4. The ShockWave product has been field tested on numerous vehicles as well as subjected to many different stress tests to ensure that there are no leakage or durability problems. Failures have been nearly nonexistent unless abused as described above. If the Shockwave units are installed properly and are not abused, they will last many, many years. **ShockWave units that are returned with broken mounts, bent piston rods, destroyed bumpstops or bushings, or abrasions on the bellows will not be warrantied.**