

RideCONTROL™

Kit 59533

***Chevrolet Colorado
and GMC Canyon***

2- and 4-Wheel Drive



INSTALLATION GUIDE

For maximum effectiveness and safety, please read these instructions completely before proceeding with installation.

Failure to read these instructions can result in an incorrect installation.



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Introduction

The purpose of this publication is to assist with the installation and maintenance of the RideControl air spring kit. The air springs used in RideControl kits are designed and manufactured like a tire. The air springs have layers of rubber and cords that control the bag's growth and funnel it into one direction. The bags do not require a coil spring for control. RideControl kits utilize a sleeve style air bag that provides up to 2,000 pounds (907kg) of load-leveling support. Each sleeve is rated at a maximum of 100 PSI (7BAR).

It is important to read and understand the entire installation guide before beginning installation or performing any maintenance, service or repair. The information here includes a hardware list, tool list, step-by-step installation information, maintenance tips and safety information.

Air Lift Company reserves the right to make changes and improvements to its products and publications at any time. Contact Air Lift Company at **(800) 248-0892** or visit us online at **www.airliftcompany.com** for the latest version of this manual.

NOTATION EXPLANATION

Hazard notations appear in various locations in this publication. Information which is highlighted by one of these notations must be observed to help minimize risk of personal injury or possible improper installation which may render the vehicle unsafe. Notes are used to help emphasize areas of procedural importance and provide helpful suggestions. The following definitions explain the use of these notations as they appear throughout this guide.



DANGER

INDICATES IMMEDIATE HAZARDS WHICH WILL RESULT IN SEVERE PERSONAL INJURY OR DEATH.



WARNING

INDICATES HAZARDS OR UNSAFE PRACTICES WHICH COULD RESULT IN SEVERE PERSONAL INJURY OR DEATH.



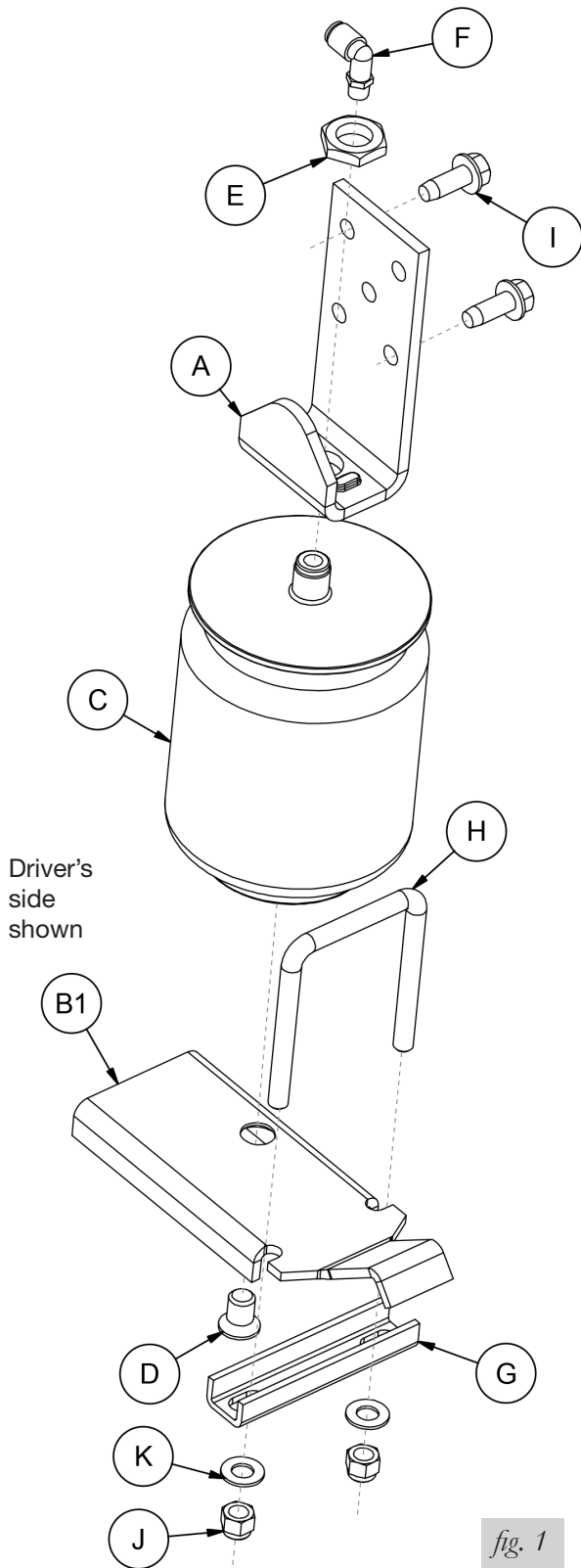
CAUTION

INDICATES HAZARDS OR UNSAFE PRACTICES WHICH COULD RESULT IN DAMAGE TO THE MACHINE OR MINOR PERSONAL INJURY.

NOTE

Indicates a procedure, practice or hint which is important to highlight.

Installation Diagram



HARDWARE LIST

| Item | Part # | Description..... | Qty |
|------|--------|-------------------------------|-----|
| A | 07800 | Upper bracket..... | 2 |
| B1 | 03909 | Left-hand lower bracket..... | 1 |
| B2 | 03858 | Right-hand lower bracket..... | 1 |
| C | 58482 | Air spring..... | 2 |
| D | 17178 | 1/2" flathead screw..... | 2 |
| E | 18454 | 3/4" nylon jam nut..... | 2 |
| F | 21837 | 90-degree swivel fitting..... | 2 |
| G | 01426 | Clamp bar..... | 2 |
| H | 10469 | U-bolt..... | 2 |
| I | 17129 | 3/8" self-tapping screw..... | 4 |
| J | 18435 | 3/8" Nylon lock nut..... | 4 |
| K | 18444 | 3/8" flat washer..... | 4 |
| AA* | 20086 | Air line assembly..... | 1 |
| BB* | 10466 | Zip tie..... | 6 |
| CC* | 21230 | Valve cap..... | 2 |
| DD* | 18501 | 5/16" flat washer..... | 2 |
| EE* | 21234 | Rubber washer..... | 2 |
| FF* | 18411 | Star washer..... | 2 |
| GG* | 21233 | 5/16" hex nut..... | 4 |
| HH* | 34924 | Heat shield kit..... | 1 |

TOOLS LIST

| Description | Qty |
|--|-----|
| 1/2", 9/16" and 3/4" open-end or box wrenches..... | 1 |
| Adjustable wrench | 1 |
| Safety glasses..... | 1 |
| Ratchet w/ 3/8", 9/16" and 1/2" deep well sockets..... | 1 |
| 5/16" drill bit (very sharp)..... | 1 |
| Heavy duty drill | 1 |
| Torque wrench | 1 |
| Floor jack | 1 |
| Safety stands | 2 |

Installing the RideControl System

⚠ DANGER

COMPRESSED AIR CAN CAUSE INJURY AND DAMAGE TO THE VEHICLE AND PARTS IF IT IS NOT HANDLED PROPERLY. FOR YOUR SAFETY, DO NOT TRY TO INFLATE THE AIR SPRINGS UNTIL THEY HAVE BEEN PROPERLY SECURED TO THE VEHICLE.

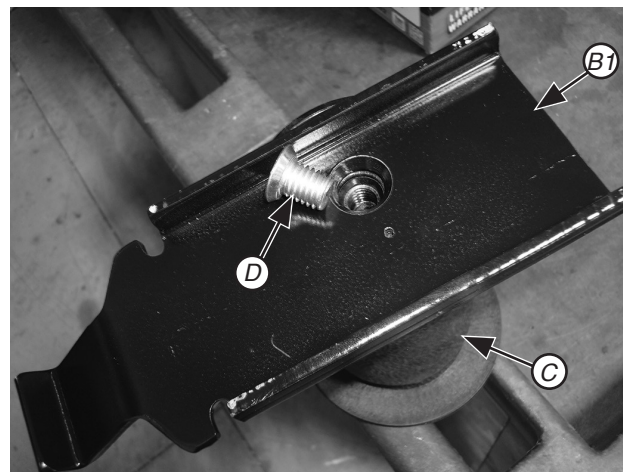
IMPORTANT: Failure to maintain correct minimum pressure (or pressure proportional to the load), bottoming out, overextension, or rubbing against another component will void the warranty.

ASSEMBLING THE AIR SPRING ASSEMBLY

1. Install the fittings (F) to the top of the air springs (C). Tighten fitting one-and-a-half turns past finger-tight (fig. 2).

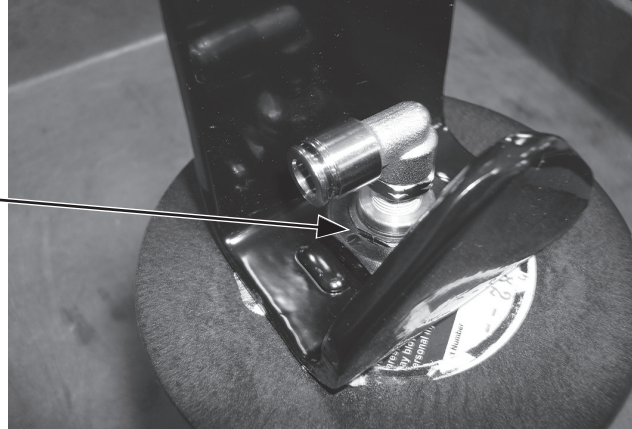
*fig. 2*

2. For the left-hand assembly, install the lower bracket (B1) onto the air spring (C) with the 1/2" flat head screw (D) and leave loose at this time (fig. 3).

*fig. 3*

3. With the long portion of the upper bracket to the left side of the fitting and with the fitting facing you (fig. 4), set the upper bracket (A) onto the top of the air spring (C) by inserting the fitting through the upper bracket hole. With the flat edge toward the bracket, insert the nylon jam nut (E) over the fitting and thread it onto the upper post of the air spring. There are two tabs in the upper bracket that the flats of the nylon jam nut will fit into. Make sure these are lined up, and hand-tighten the upper bracket to the air spring (fig. 4). Use no more than 4 lb.-ft. (5Nm) to seat the bracket to the air spring (do not over-tighten).

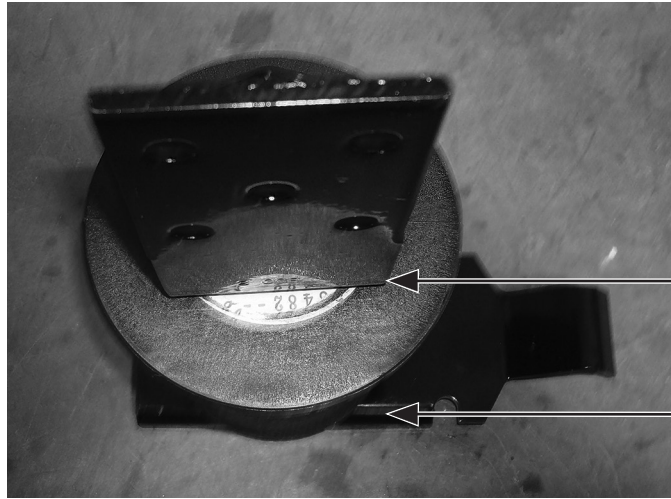
Nylon jam nut must have the flat on the nut facing down, indexed between the tabs in the upper bracket.

*fig. 4*

4. For the right-side assembly, repeat steps 2 and 3, but make sure the fitting points are in the opposite direction as the first one assembled (fig. 5).

*fig. 5*

5. Make sure the lower bracket and the upper bracket are parallel to each other and the fittings are pointing in the opposite direction of the tab or "finger" on the lower bracket, and tighten the lower bracket screw (D) to no more than 15 lb.-ft. (20Nm) (figs. 6 & 7). Figure 7 shows the left- and right-hand assemblies ready to install.

*fig. 6**fig. 7*

INSTALLING THE ASSEMBLIES

1. Jack up the vehicle and support the axle with safety stands. Remove rear wheels.

NOTE

If you are using a frame contact hoist, it will be necessary to lower the vehicle down so that the axle is in the normal, ride height position (like the wheels were on and the truck was sitting in a parking lot).

2. Set the left- and right-hand assemblies on the leaf spring **behind** the axle so that the “finger” of the lower bracket is over the stock U-bolt (fig. 8).

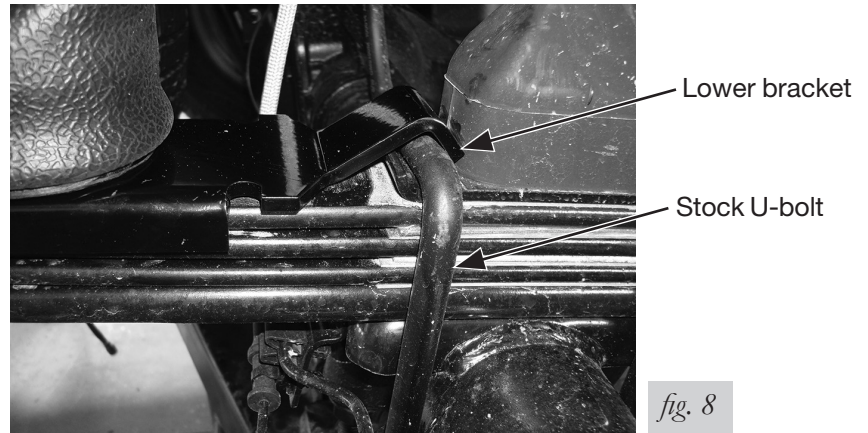


fig. 8

3. Set a U-bolt (H) down through the slots of the lower brackets and around the stock leaf spring. Install a clamp bar (G) over the U-bolt (fig. 9) and cap U-bolt with two 3/8” flat washers (K) and two nylon lock nuts (J). Repeat for the opposite side and torque hardware to 15 lb.-ft. (20Nm).



fig. 9

4. Push the upper bracket (A) against the frame and make sure the short leg of the upper bracket is in contact with the bottom of the frame rail (fig. 10).

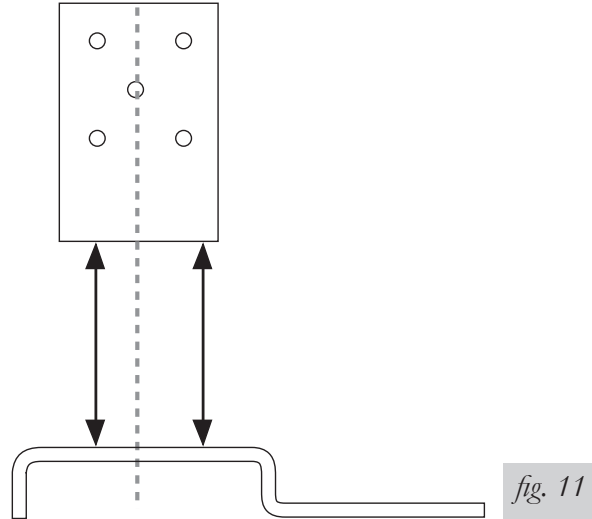
The short leg of the upper bracket must be in contact with the bottom of the frame rail.

Note: passenger 's side shown.



fig. 10

5. The upper bracket (A) must be parallel and perpendicular to the lower bracket (B) (fig. 11).



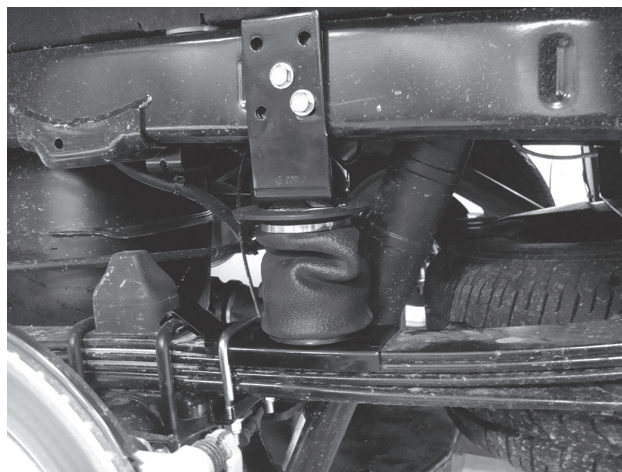
6. With the upper bracket in position, center-punch the frame using two of the lower three holes in the upper bracket as a template (fig. 12). Drill two 5/16" holes through the frame and install two 3/8" self-tapping screws (I). Torque bolts to 15 lb.-ft. (20Nm). Repeat for the other side.



7. Figure 13 shows the driver's (left) side finished installation.

NOTE

Spring has not been inflated yet in photo.



Installing the Air Lines

Choose the locations for the Schrader valves and drill a 5/16" (8mm) hole, if necessary (Fig. 14).

1. Cut the air line in half. Make clean, square cuts with a razor blade or hose cutter (Fig. 15). Do not use scissors or wire cutters.

CAUTION

KEEP AT LEAST 6" (152MM) OF CLEARANCE BETWEEN ALL AIR LINES AND THE EXHAUST SYSTEM. AVOID SHARP BENDS AND EDGES.

2. Use zip ties to secure the air line to fixed points along the chassis. Do not pinch or kink the air line. Leave at least 2" (51mm) of slack in the air line to allow for any movement that might pull on the air line. The minimum bend radius for the air line is 1" (25mm).

3. Install the Schrader valve in the chosen location (Fig. 16).

- A. Inside fuel tank filler door
- B. Inside rear wheel wells
- C. License plate or rear bumper area

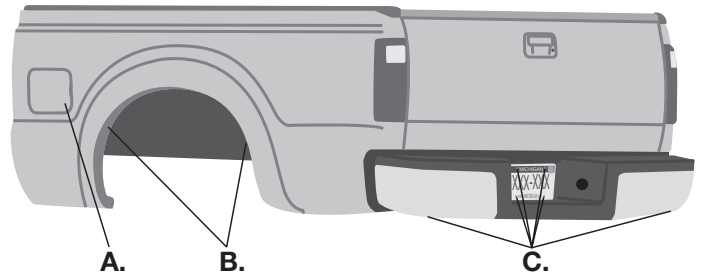


fig. 14

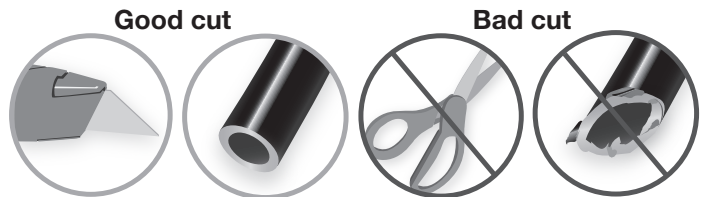


fig. 15

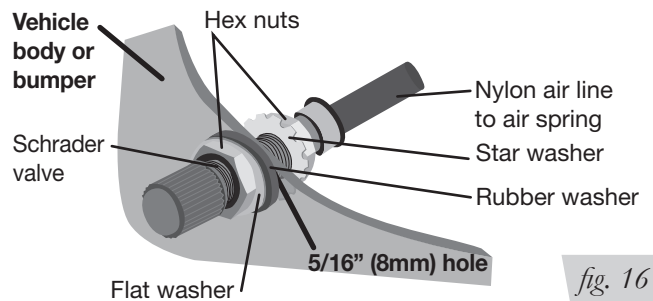


fig. 16

INSTALLING THE HEAT SHIELD

1. Attach the metal heat shield to the exhaust where it is closest to the air spring. Slide the air line thermal sleeve over the air line and place it where the air line is closest to the exhaust. (Fig. 17).

1/2" (13mm) dead air space between shield and exhaust

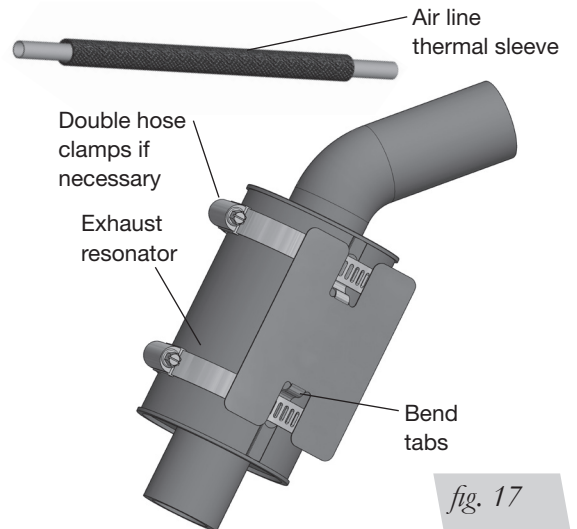
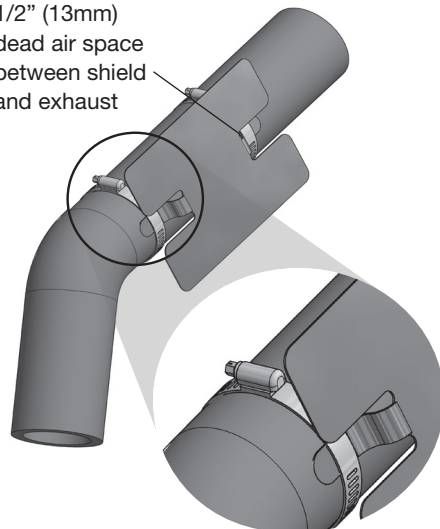


fig. 17

INSTALLATION CHECKLIST

- Clearance test** — Inflate the air springs to 40-60 PSI (2.8-4.1BAR) and make sure there is at least 1/2" (13mm) clearance from anything that might rub against each sleeve. Be sure to check the tire, brakes, frame, shock absorbers and brake cables.
- Leak test before road test** — Inflate the air springs to 40-60 PSI (2.8-4.1BAR) and check all connections for leaks. All leaks must be eliminated before the vehicle is road tested.
- Heat test** — Be sure there is sufficient clearance from heat sources, at least 6" (152mm) for air springs and air lines. If a heat shield was included in the kit, install it. If there is no heat shield, but one is required, call Air Lift customer service at **(800) 248-0892**.
- Fastener test** — Recheck all bolts for proper torque.
- Road test** — The vehicle should be road tested after the preceding tests. Inflate the springs to recommended driving pressures. Drive the vehicle 10 miles (16km) and recheck for clearance, loose fasteners and air leaks.
- Operating instructions** — If professionally installed, the installer should review the operating instructions with the owner. Be sure to provide the owner with all of the paperwork that came with the kit.

Maintenance and Use Guidelines

1. Check air pressure weekly.
2. Always maintain normal ride height. Never inflate beyond 100 PSI (7BAR).
3. If the system develops an air leak, use a soapy water solution to check all air line connections and the inflation valve core before deflating and removing the air spring.

| Minimum Recommended Pressure | Maximum Air Pressure |
|------------------------------|----------------------|
| 5 PSI (.34BAR) | 100 PSI (7BAR) |

CAUTION

FOR SAFETY AND TO PREVENT POSSIBLE DAMAGE TO THE VEHICLE, DO NOT EXCEED MAXIMUM GROSS VEHICLE WEIGHT RATING (GVWR) OR PAYLOAD RATING, AS INDICATED BY THE VEHICLE MANUFACTURER.

CAUTION

ALTHOUGH THE AIR SPRINGS ARE RATED AT A MAXIMUM INFLATION PRESSURE OF 100 PSI (7BAR), THE AIR PRESSURE ACTUALLY NEEDED IS DEPENDENT ON LOAD AND GROSS VEHICLE WEIGHT RATING.