



559-734-7451 800-367-5480 FAX 559-734-7460

INSTALLATION INSTRUCTIONS

6224 Air Spring Kit For 4" Lift Kit(4" front 2" rear) 2003+ Dodge 2500/3500 2WD & 4WD 2006+ 1500 Mega Cab 2WD & 4WD

Thank you for purchasing a quality Hellwig Product.

**PLEASE READ THIS INSTRUCTION SHEET COMPLETELY BEFORE STARTING
YOUR INSTALLATION**

IMPORTANT NOTES

***DO NOT INFLATE AIR SPRING ASSEMBLY UNLESS IT HAS BEEN
PROPERLY INSTALLED ON VEHICLE.***

DO NOT INFLATE AIR SPRINGS OVER 100 PSI

**A MINIMUM OF 5-10 PSI MUST BE MAINTAINED IN AIR SPRINGS
AFTER INSTALLATION FOR WARRANTY TO BE VALID. FAILURE TO
KEEP MINIMUM PRESSURE IN AIR SPRINGS WILL VOID WARRANTY.**

**THIS UNIT IS DESIGNED TO INCREASE THE LEVEL LOAD CARRYING
CAPACITY OF YOUR VEHICLE. NEVER LOAD THE VEHICLE THIS
UNIT IS INSTALLED ON BEYOND THE MANUFACTURER'S MAXIMUM
GROSS VEHICLE WEIGHT RATING.**

OVERINFLATION AND IMPROPER USE MAY RESULT IN PERSONAL



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BEFORE STARTING YOUR PROJECT

WHEN LIFTING A VEHICLE WITH A JACK, BE SURE TO SET THE PARKING BRAKE AND USE SAFETY STANDS.

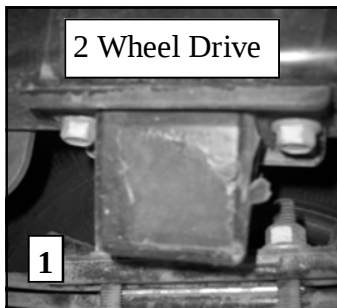
ENSURE THAT THE INSTALLATION OF COMPONENTS WILL NOT CRUSH OR DAMAGE FUEL AND BRAKE LINES OR ELECTRICAL HARNESSSES.

BEFORE DRILLING ANY HOLES, ENSURE THAT ALL ELECTRICAL WIRES, FUEL LINES, BRAKE LINES, BRAKE HOSES AND ANY OTHER COMPONENTS ARE MOVED OR PROTECTED TO AVOID DAMAGE FROM DRILLING ANY HOLES .

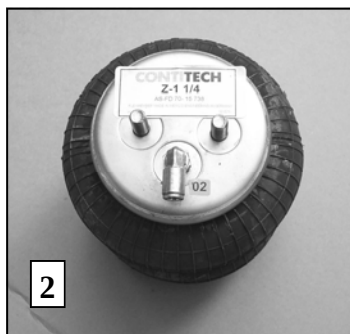
DO NOT ATTEMPT ANY MODIFICATIONS TO THE VEHICLE OTHER THAN THOSE OUTLINED IN THIS INSTRUCTION SHEET. IF ANY INTERFERENCE WITH THE GAS TANK, FUEL LINES, BRAKE LINES, EXHAUST PIPE, ETC. EXISTS, STOP YOUR INSTALLATION AND CALL HELLWIG PRODUCTS FOR TECHNICAL HELP.

IF WHEELS ARE REMOVED FOR INSTALLATION OF KIT, CHECK MANUFACTURERS SPECIFICATIONS FOR PROPER LUG NUT TORQUE BEFORE REINSTALLING WHEELS.

WHEN CUTTING AIR BRAKE TUBING A SQUARE CUT IS REQUIRED OR LEAKAGE MAY RESULT.



1. Park vehicle securely and set parking brake and chock wheels. Remove factory bump stops from vehicle by removing nuts from studs using a 15mm wrench or socket

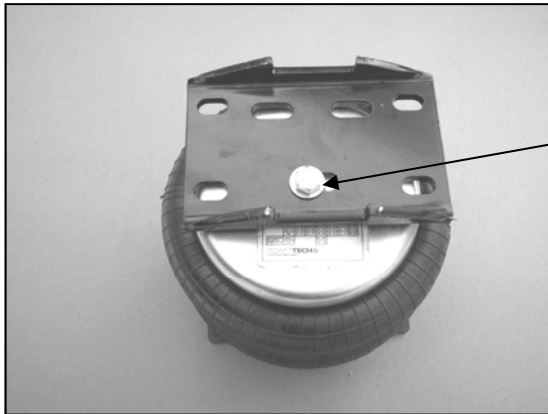


2. Install elbow fitting in port of air spring. Torque fitting to approximately 20 ft-lb. Make sure that fitting is oriented as shown in photo.



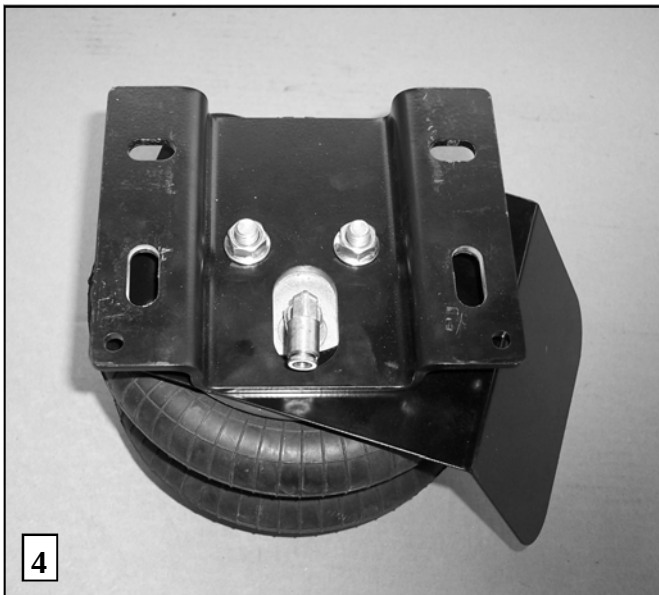
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3



Attach air spring to plate using forward end of slot

3. Lay out base plate as shown in photo. Attach air spring to base plate using 3/8" x 1" bolt as shown in photo. Torque to 20-25 ft-lb.

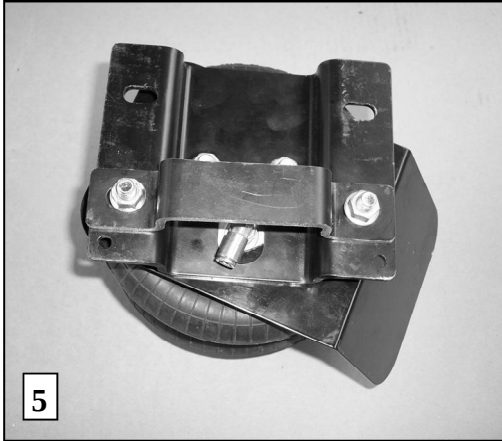


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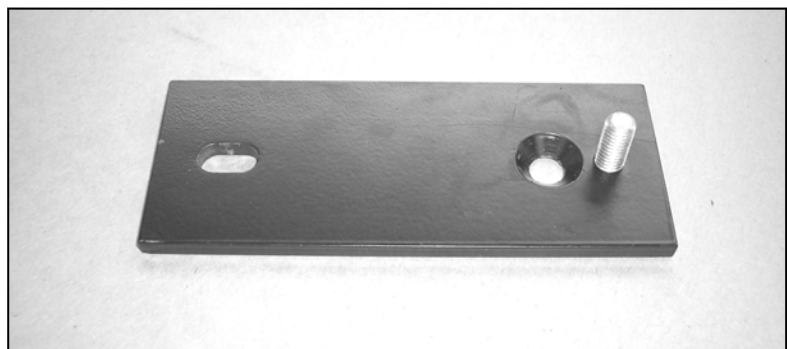
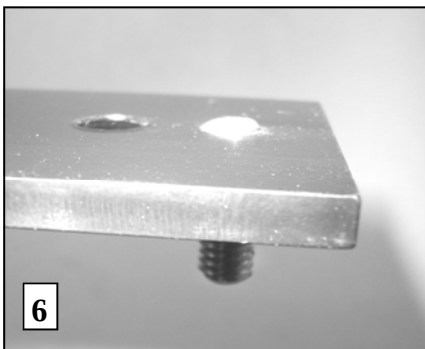
4. Install heat shield and frame bracket as shown. (Passenger side shown. Drivers side heat shield not required) Torque nuts to 20 ft-lb.



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5. Attach reinforcement strap to frame bracket as shown. Leave loose for adjustment later.



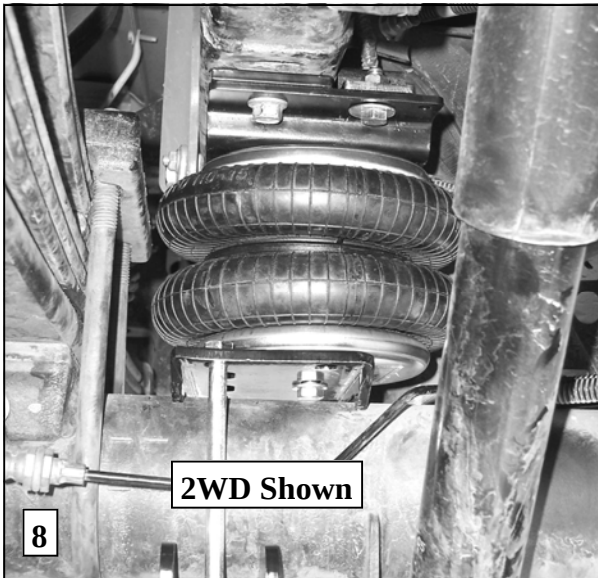
6. Insert 3/8 x 1" stud into adapter plate as shown. Make sure thread is fully engaged into plate. Leave 1/2 thread exposed on back side of plate as shown in photo. Red lock-tite can be added to threads if desired.



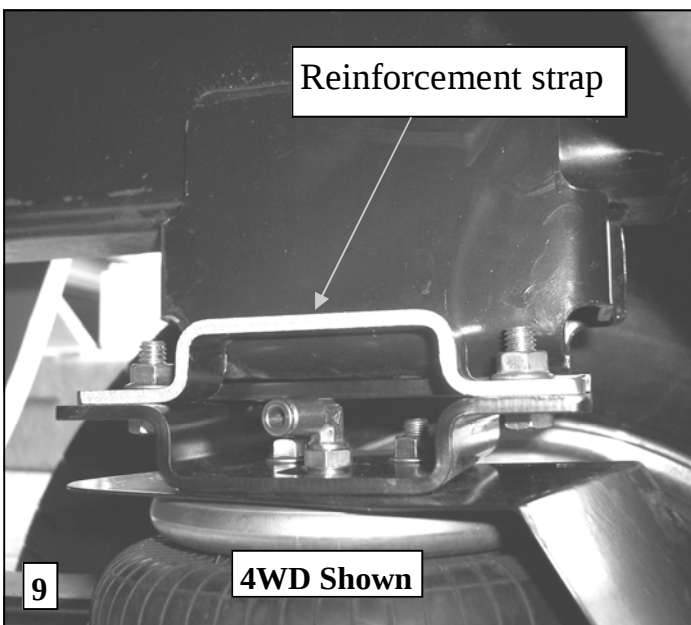
7. Attach adapter plate to frame rail using supplied M10-1.5 X 30 flat head bolt. Align slotted hole with existing hole in frame rail and tighten flat head bolt to 20-25 ft-lb.



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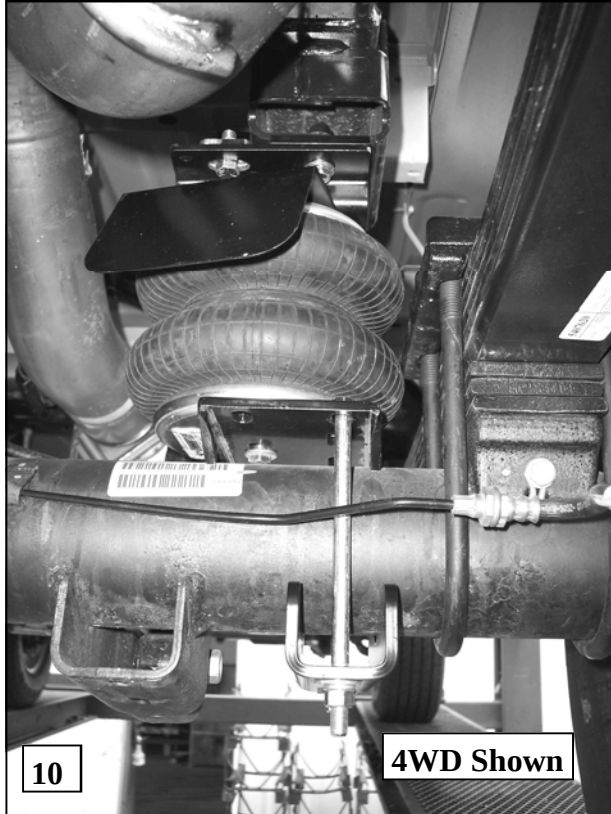
8. Insert assembly between frame rail and axle and attach frame bracket using 3/8" flange nut to stud and supplied M10-1.5 x 30 flange bolt to existing threaded hole in frame. Align bracket and torque bolts to 20-25 ft-lb.



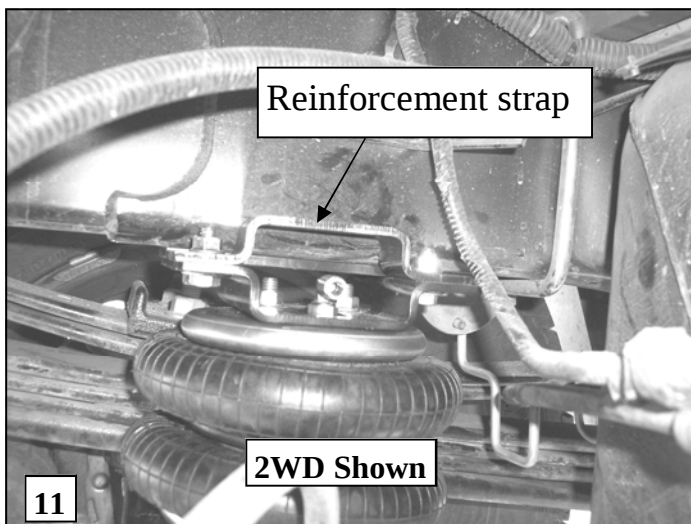
9. Slide reinforcement strap firmly against frame rail and tighten fasteners to 25 ft-lb. Make sure reinforcement strap fits flush with rail after tightening bolts.



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10. Insert cap screws into slots in axle bracket as shown and attach saddle using supplied washers, lock washer and nuts. Tighten to 20-25 ft-lb.



11. Check your installation to ensure that all fasteners are tight and that the assembly and all fasteners clear brake and fuel lines, emergency brake cables, fuel tanks, wiring harnesses, etc. Make sure that heat shield is positioned for maximum protection of air spring.



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12. Complete passenger and driver's side installation of air spring assembly.
13. Select a location for the air inflation valves. The location can be on the bumper or body of the vehicle where an air chuck can be used to inflate the air springs. Select a location where the valve will not be damaged or interfere with the operation of other components.
14. Cut air brake lines to length and connect air lines to fittings by pushing the air line into the air fittings as far as possible. **WHEN CUTTING AIR BRAKE TUBING, A SQUARE CUT IS REQUIRED AND THE HOSE END MUST NOT BE DEFORMED OR LEAKAGE MAY RESULT. IF DEFORMATION OF THE HOSE END OCCURS, THE HOSE END MUST BE REWORKED SO THAT IT IS ROUND.** Engagement of the sealing O-ring will be felt when the air line has been inserted properly into the fitting. Fittings may be disconnected if required by pushing down on the outer ring while pulling firmly on the air line. Route air lines away from exhaust pipes or any other sources of heat and ensure that the air lines are protected from sharp edges. A length of heat shielding is provided to protect the air line as it exits the passenger side air spring.
15. Inflate air springs to 40 psi and check for leaks. A soapy water solution can be used to find slow leaks.
16. When satisfied with integrity of the system, adjust air pressure to desired level. The air springs can be inflated to any level between 10 and 100 psi. **DO NOT** run the air springs empty or warranty will be void. **MINIMUM** air spring pressure is 5 psi. Failure to keep air in the air springs will void the warranty. For best **RIDE** use only enough air pressure as required to level the vehicle. If a firmer ride is desired, more pressure can be used.
17. Check air pressure in the system regularly to ensure system performance and maintenance of warranty. Just like tires, the air pressure in the system will vary due to temperature changes. For your air spring system to function properly it must be checked on a regular basis.

ATTENTION INSTALLER: BE SURE THAT THE CUSTOMER RECEIVES THIS INSTRUCTION SHEET, ALL IMPORTANT NOTE CARDS AND THE WARRANTY FORM.