

E4-WM5-Y578A00

MOUNTING INSTRUCTION



IMPORTANT! READ THIS FIRST!

Installation of shock absorbers requires special tools and expert knowledge. Accordingly, installation of all BILSTEIN products must be performed by a qualified suspension specialist.

When replacing other brands, BILSTEIN shock absorbers should always be installed as a set. All BILSTEIN products must only be used for the specific, intended application as indicated in the application guide. **Any use of any BILSTEIN product other than for its intended use may result in serious bodily injury or death.**

Always use a chassis hoist for the installation of BILSTEIN products and make certain that the raised vehicle is securely attached to the hoist and/or supported to prevent the vehicle from slipping, falling, or moving during the installation process.

If you choose to install any BILSTEIN product without the necessary special tools, expertise or chassis hoist, you may subject yourself to the risk of serious bodily injury or death. If you elect not to use a chassis hoist, at least make sure the vehicle is on level ground, that all tires on the ground during installation are blocked to prevent movement, that at least two tires are on the ground at all times, and that adequately secured safety stands (jack stands) are used to support the chassis. **NEVER** get under the vehicle until you have checked to make sure all of these steps are performed.

BILSTEIN suspension products are gas-filled and are highly pressurized.

- Never place any BILSTEIN product in a vise or use a clamp on any BILSTEIN product.
- Never apply heat near any BILSTEIN product.
- Never attempt to open or repair any BILSTEIN product, in order to prevent **serious bodily injury or death.**

Any attempt to misuse, misapply, modify, or tamper with any BILSTEIN suspension product voids any warranty and **may result in serious bodily injury or death.**

While installing any BILSTEIN product:

- Do not use impact tools for loosening or tightening fasteners, because this may destroy the screw threads.
- Self-locking fasteners must only be used **once!**
- Reuse original equipment components only if they are in good condition, otherwise replace them with new components.
- Never remove the slight film of oil on the piston rod and seal.
- All mounting fasteners for shocks and struts must be securely tightened before tension is placed on the suspension system.

After installing any BILSTEIN product:

- The suspension caster and camber must be checked and/or adjusted to comply with the vehicle manufacturer's specifications.
- The (load dependent) brake compensator and the anti-lock brake system must be checked and/or reset to comply with the vehicle manufacturer's specifications.
- The headlight aim must be checked and adjusted.

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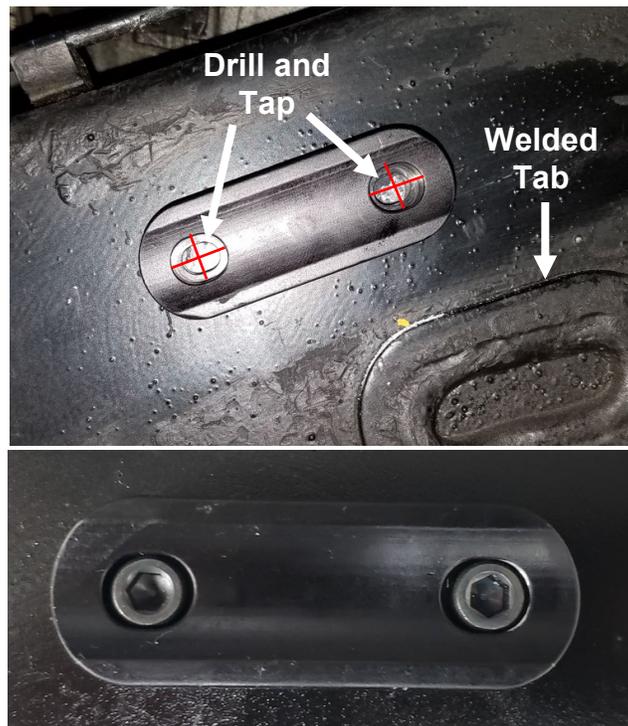
BILSTEIN 5160 Series Reservoir Shock Absorbers are designed to fit your vehicle's original shock mounts with no modifications. With the exception of the remote reservoir/bracket placement, the 5160 Series shocks are installed in the same manner as a standard replacement shock.

RESERVOIR MOUNT BRACKET BASE INSTALLATION

The reservoirs are intended to be mounted in front of the coil spring directly to the frame rail. Two holes will need to be drilled and tapped in order to mount the reservoir. Follow the below procedure in order to mount the reservoir mount bracket base.

1. Directly in front of the coil spring, mark 2 hole locations approximately 45mm (1.75") down from the top of the frame rail 45mm (1.75") apart. Center the 2 hole locations in the middle of the frame rail from front to back. Take note of the welded tab on the frame rail and be sure the reservoir clamp will clear this before drilling holes. See Figure 4 for approximate reservoir placement.

Figure 1



2. Using a punch and hammer, punch the 2 hole marks.
3. Using a # 7 (0.201 in. or 5mm) metal drill bit, drill the 2 holes in the frame rail.
4. Tap both holes with a 1/4"-20 tap.
5. Mount the base bracket with the 2, 1/4"-20 x 3/4 in. bolts.
TORQUE BOTH BOLTS TO 14 N·m (10 ft-lbs)
6. Repeat this on the opposite side of the vehicle.

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SHOCK AND RESERVOIR INSTALLATION

1. Remove the existing front shocks from the vehicle following all procedures in the vehicle manufacturer's service manual.
2. Mount both front shocks being sure to use the correct shock on the driver and passenger side.

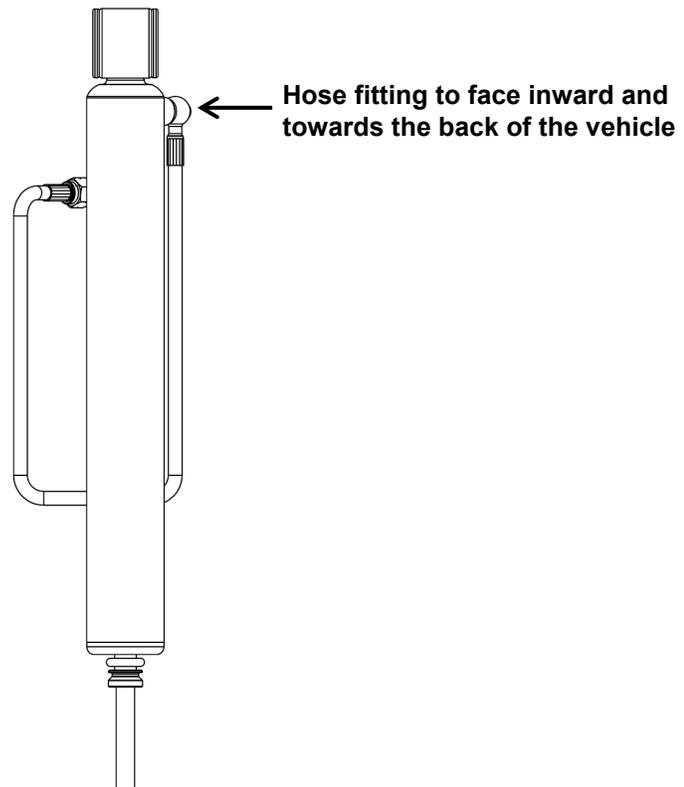
Driver side Part No. **25-277005**

Passenger side Part No. **25-277012**

3. When installing the top of the shock, clock the hose and mount so the hose fitting is facing inward towards the engine of the vehicle, Figure 2. If the shock is not clocked correctly, the hose will not clear and could cause damage to the shock. This is also necessary to ensure proper hose routing.

TORQUE ALL FASTENERS TO VEHICLE MANUFACTURER'S SPECIFICATION.

Figure 2

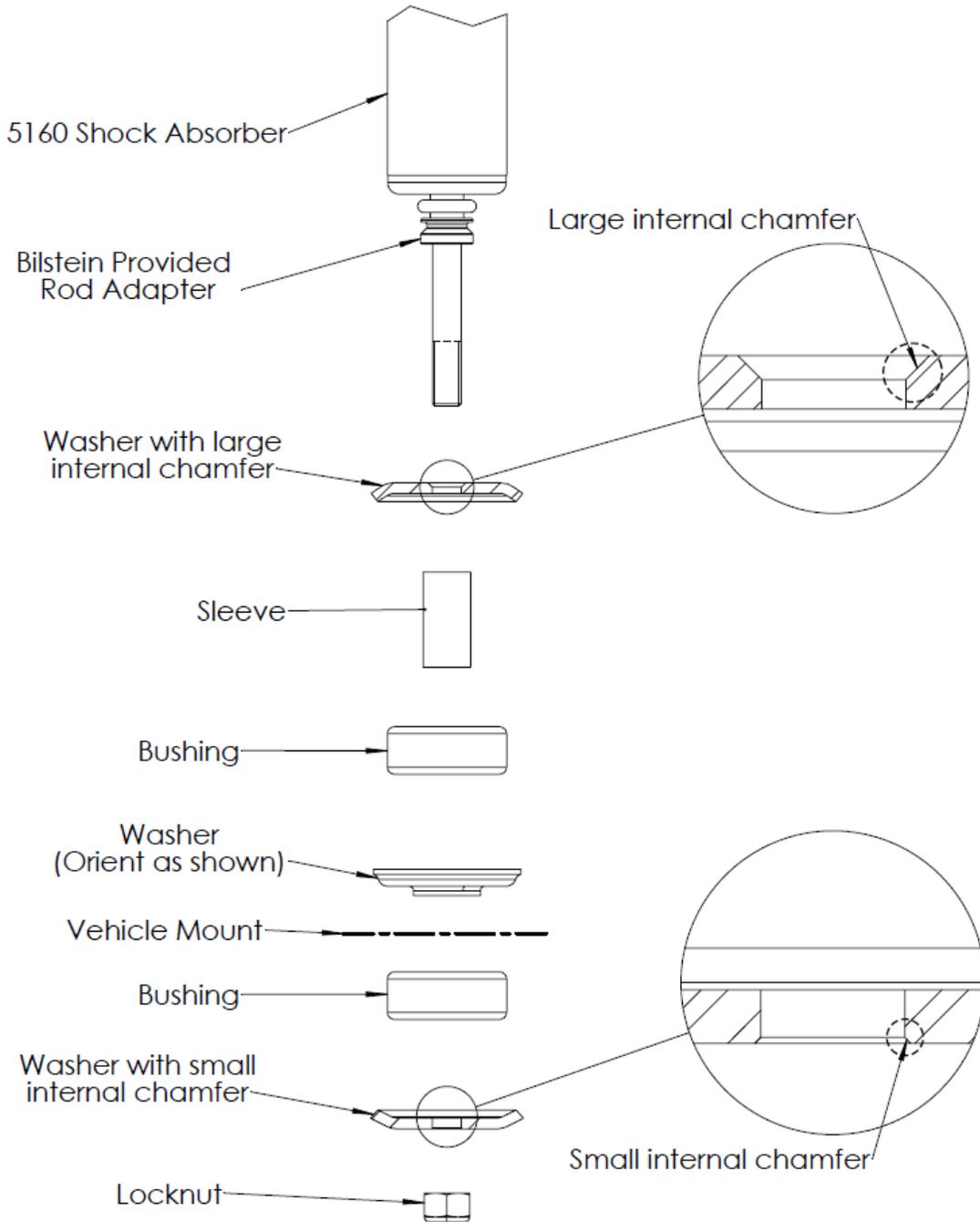


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4. For the lower mount, refer to Figure 3 below for proper bushing and washer order and orientation. Torque nut until the washers bottom out on the sleeve.

Figure 3

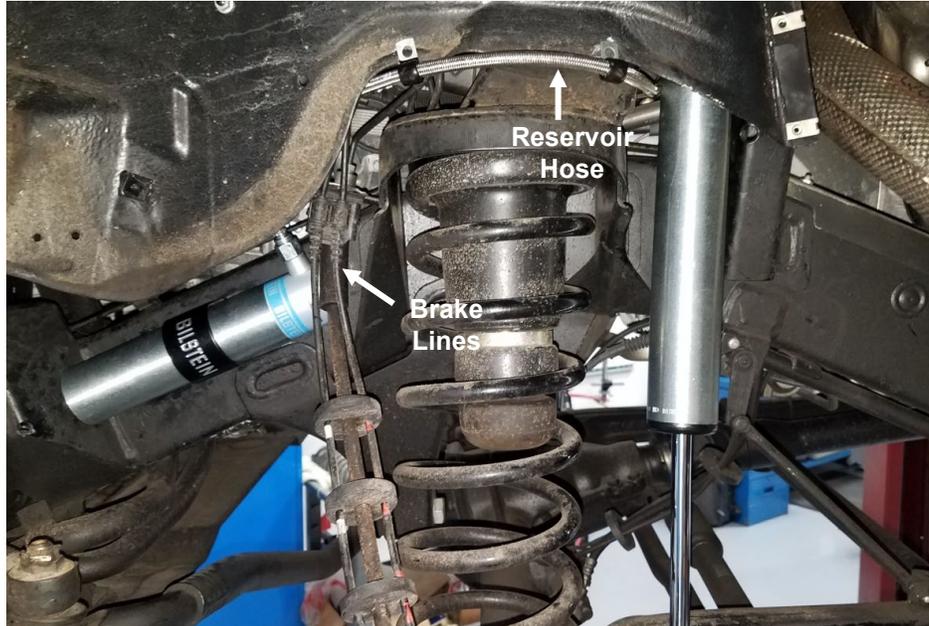


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5. Route the reservoir and hose as pictured in Figure 4.

Figure 4



6. Route the hose around the top of the spring bucket, in front of the brake lines and down towards the frame rail as shown in Figure 4.
7. Place the reservoir clamp bracket on the reservoir tube as shown above. Using the 3 stainless steel 1/4"-20 x 1 in. bolts, mount the reservoir tube to the base bracket. Make sure to clock the reservoir tube so that the hose is not putting a lot of pressure on the brake lines.

TORQUE RESERVOIR BRACKET PINCH BOLTS TO 8 N·m (6 ft-lbs)

8. Take the hose loop clamp and place it around the hose as shown below in Figure 5 (closer to the shock body than the reservoir).

Figure 5



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9. Attach the hose loop clamp to the fender panel above the spring bucket using the provided self-tapping screws, Figure 6.

Figure 6



10. Carefully check for any possible dynamic interference between the reservoirs and any other components on the vehicle, then make any necessary adjustments to the reservoir positions. The reservoir mounting locations depicted herein are appropriate for this application; however, some aftermarket components such as tires and/or lift kit combinations may create interference problems. It is the responsibility of the installer to determine if the reservoir is mounted appropriately and if there is any potential for interference.