



**IMPORTANT! READ THIS FIRST!**

Installation of shock absorbers or other suspension components requires special tools and expert knowledge. Accordingly, installation of all BILSTEIN products must be performed by a professional automotive suspension technician.

When replacing other brands, BILSTEIN shock absorbers or other suspension components 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 install any BILSTEIN product without the necessary special tools, expertise, and chassis hoist, you may subject yourself to the risk of serious bodily injury or death.**

BILSTEIN shock absorbers are gas-filled and are highly pressurized.

- Never place any BILSTEIN shock absorbers in a vise or use a clamp on any BILSTEIN shock absorber.
- Never apply heat near any BILSTEIN shock absorber.
- 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 shock absorber piston rod and seal.
- All mounting fasteners for shock absorbers and other suspension components must be securely tightened before tension is placed on the suspension system, unless otherwise specified in the manufacturer's service manual or in this instruction.

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. Or, if applicable, adaptive headlights must be checked and recalibrated to comply with the vehicle manufacturer's specifications.
- If applicable, any/all Advanced Driver Assistance Systems (ADAS) must be checked and recalibrated to comply with the vehicle manufacturer's specifications.

***CAUTION for COILOVER TYPE SUSPENSIONS!!!***

**If disassembling a coilover type suspension, refer to the vehicle manufacturer's service manual for proper procedures. The coil spring is preloaded and must be compressed with a spring compressor to release load before the upper mount is disassembled. Failure to follow the vehicle manufacturer's procedures may cause serious injury or death, and may damage the vehicle.**

***IMPORTANT!!!***

**This BILSTEIN product may or may not be compatible with non-BILSTEIN aftermarket products and/or vehicle modifications. It is the responsibility of the professional automotive suspension technician performing the installation to identify any non-OEM components and/or modifications on the vehicle that may interact with the suspension system. These must be evaluated for any potential physical static or dynamic interference with and/or effect on the function of this BILSTEIN product.**



## B8 6112/6100 37" Package Protection/ Heavy Load kit

This B8 6112/6100 37" Package Protection/ Heavy Load kit is intended for vehicles with 150-200lbs of additional weight on the front and/or 400-500lbs of additional weight on the rear over stock. Additionally, this kit can be used if upgrading to 37" tires – the inclusion of a jounce spacer will limit up travel and provide the necessary clearance between the tire and metal fender. However, this kit will not prevent tire rubbing on chassis and body mount components. This mounting instruction is an addendum to the original B8 6112/6100 shock module mounting instructions that were supplied. All steps listed in the original B8 6112/6100 shock module mounting instructions still apply.

If substantial additional weight is added to your vehicle (e.g. heavy bumper and winch), and this results in a loss of ride height, the supplied spring seat adapters may be utilized to restore the vehicle to its intended ride height. Subsequently, it is essential that you also use the supplied jounce bumper spacers to ensure sufficient spring travel is available preventing coil bind. It is also critical to verify the shock absorber module length at ride height does not exceed the values listed in Figure 4 for the front and Figure 5 for the rear.

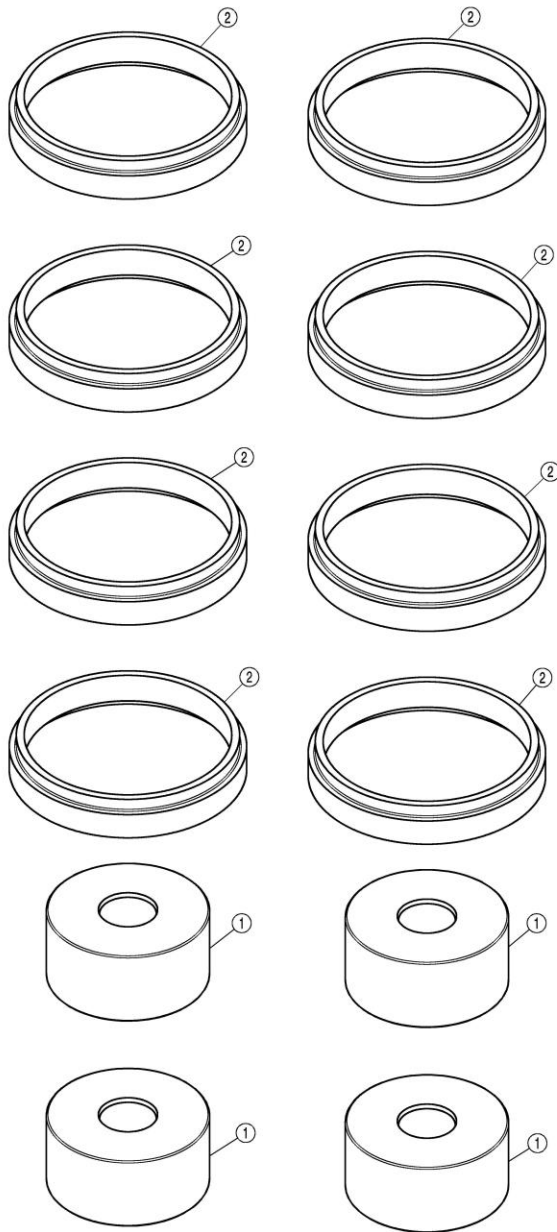
### Refer to steps A to I for both front and rear installation:

- A. Remove the B8 6112/6100 shock module from the vehicle.
- B. Using an appropriate spring compressor, compress the spring until it can be rotated freely by hand. Then disassemble the shock and spring unit.
- C. Note the lower bushing orientation relative to the studs and pin on the upper mount (important for reassembly).
- D. Install the supplied spring seat adapter(s) (BOM item #2 – Figure 1) followed by the supplied spring seat and spring seat isolator onto the Bilstein shock body as shown in Figure 3. Orient the spring seat adapter(s), spring seat, and spring seat isolator in the direction shown. Ensure that the groove inside the spring seat/spring seat adapter fits over the circlip or spring seat adapter on the shock body [see page 4 and 5 (DETAIL A and B)]. **Improper installation will cause permanent damage to the shock.**
  - **NOTE:** Only use the spring seat adapters if substantial additional weight is added to your vehicle. Depending on the added weight, one or both spring seat adapters may be used. Max of 2 spring seat adapters per corner as needed.
  - **NOTE:** Each 10mm spring seat adapter will increase the module length by 10mm (~0.4"). One 10mm adapter lifts the front ~0.6" and one 10mm adapter lifts the rear ~0.4".
- E. Using an appropriate spring compressor, compress the appropriate spring and assemble it with the Bilstein shock. **For 6100s, use the OEM coil spring. For 6112s, use the Bilstein supplied coil spring.** Ensure that the coil spring is installed in the direction shown only. Refer to Figure 6 and 7.
- F. Install the OEM jounce bumper and the supplied jounce spacer (BOM item #1 – Figure 1) followed by OEM top hat assembly (which includes the OEM top mount plate and OEM top mount spring isolator) over the threaded stem on the Bilstein shock and on top of the spring. Refer to Figure 6 and 7.
  - **NOTE:** The jounce spacer must be used regardless of tire size if using the spring seat adapters – this will ensure sufficient spring travel is available and prevent coil bind.
- G. Continue with the remaining installation steps per the original B8 6112/6100 shock module mounting instructions.

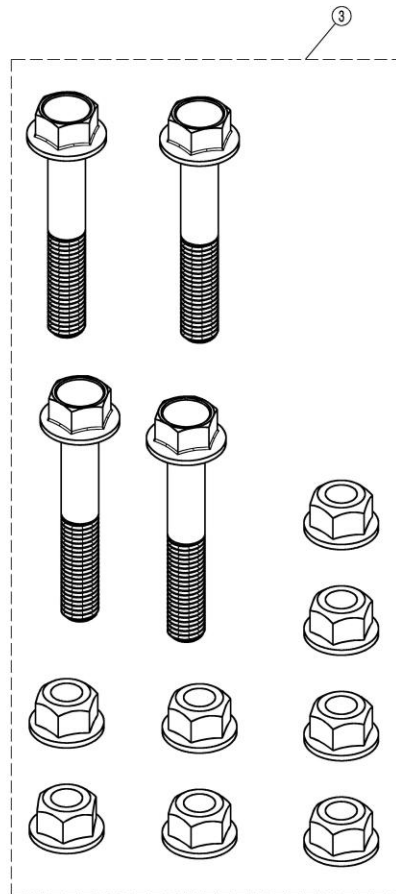
# E-WM05-0000134AA MOUNTING INSTRUCTION



- H. This kit contains new mounting hardware (BOM item #3 – Figure 1) which includes new flange lock nuts for the upper stem (1 per damper) as well as new T-bar bolts with corresponding flange lock nuts (Front damper only – 2 of each per damper).
- I. If being used as a heavy load kit (using the spring seat adapters), verify the shock length measurement at ride height that is depicted in Figure 4 and 5 is less than the specified measurement.



Bill of Materials		
Item #	Part Description	Quantity
1	Jounce Spacer	4
2	Spring Seat Adapter; 10mm	8
3	Mount Parts kit	1



**Figure 1**

# E-WM05-0000134AA MOUNTING INSTRUCTION



## IMPORTANT:

### PLACE CIRCLIP IN APPROPRIATE GROOVE TO ADJUST RIDE HEIGHT.

Use appropriate tools to move the circlip. Ensure that the circlip is fully seated in the groove after moving it (you should be able to rotate it manually in the groove). Install the spring seat/spring seat adaptor in the direction shown only. The circlip must fit completely in the groove inside the spring seat/spring seat adaptor (DETAIL A and B). **Improper installation will cause permanent damage to the shock!**

Front Damper Shown, applies to the rear damper as well:

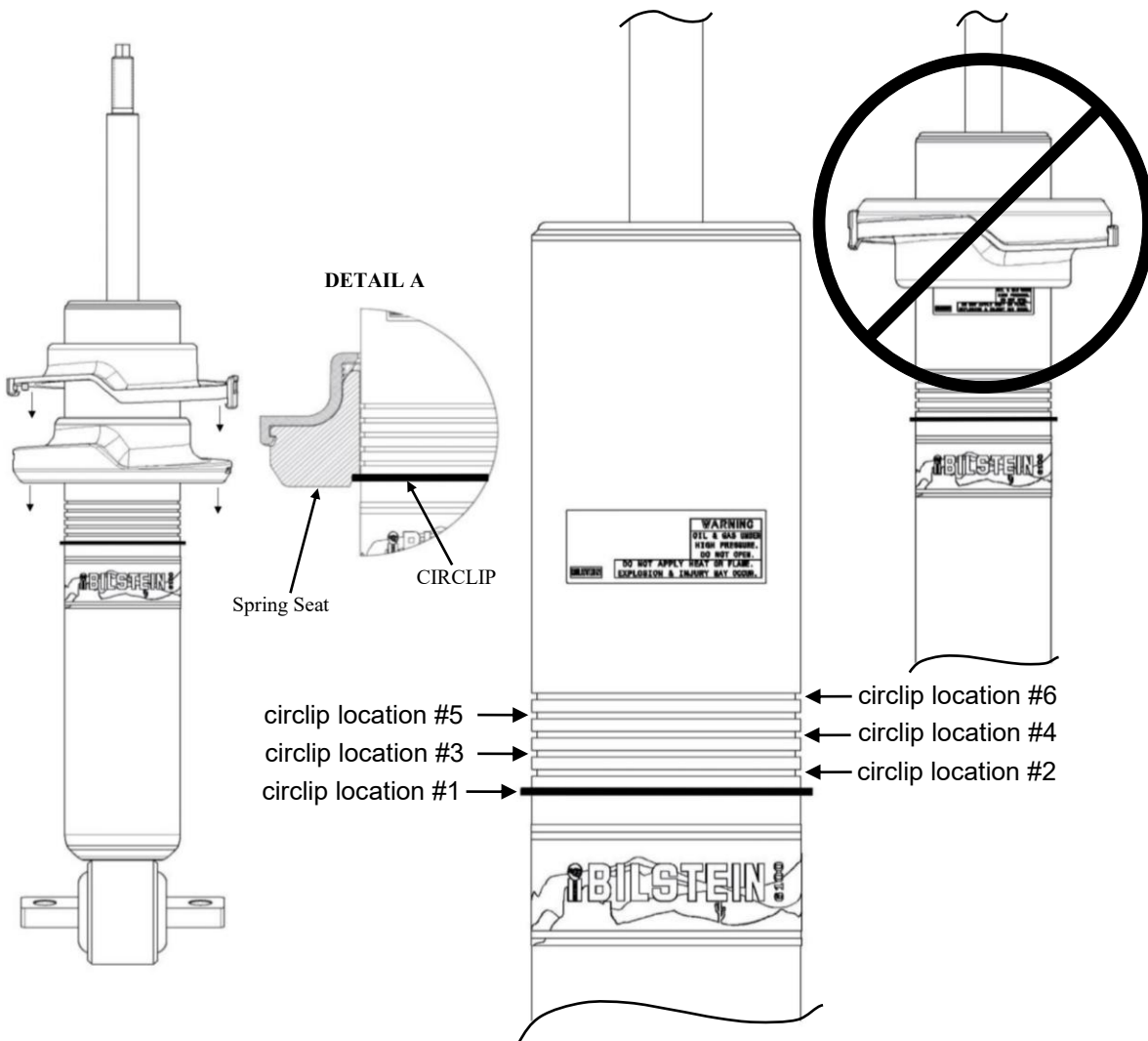
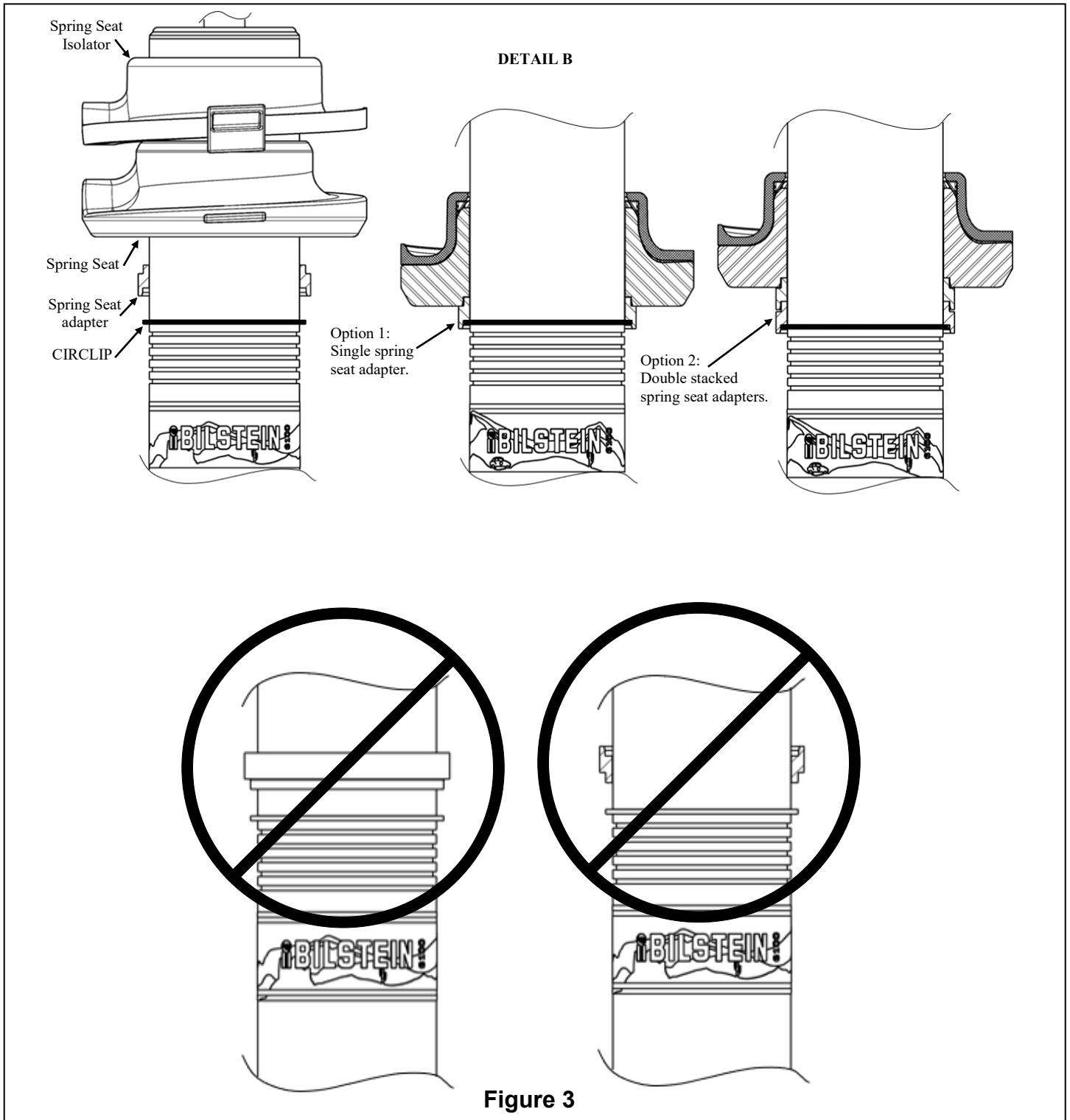


Figure 2

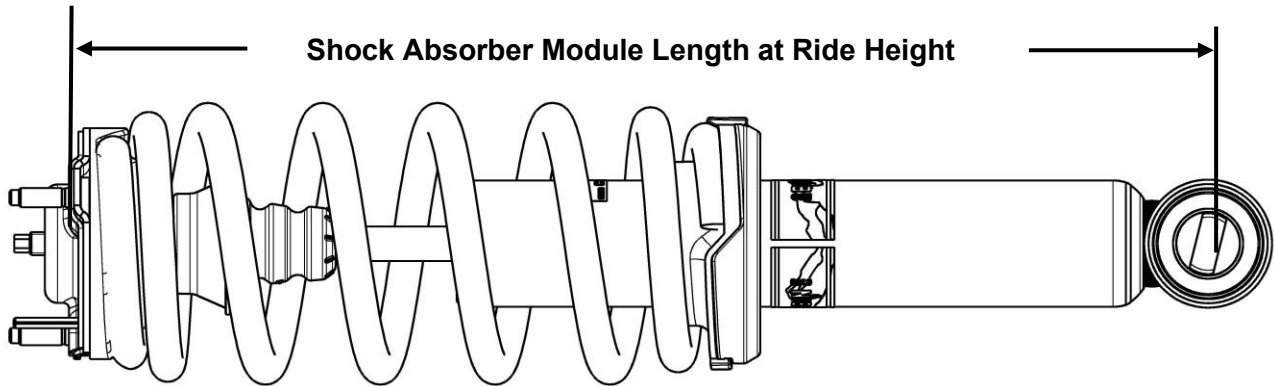
# E-WM05-0000134AA MOUNTING INSTRUCTION



# E-WM05-0000134AA MOUNTING INSTRUCTION

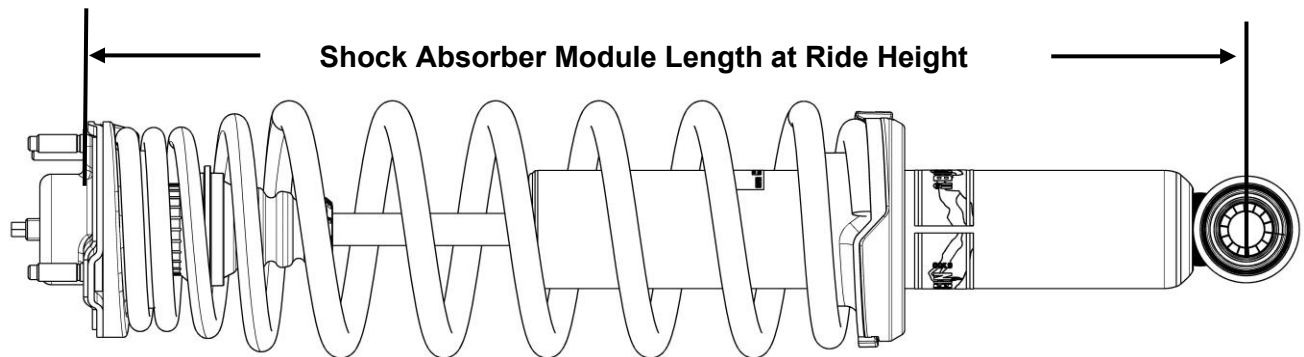


For the **Fronts**, verify the shock absorber module length specified in Figure 4 below is **less than or equal to 22 5/8" (575mm)**. If the resultant shock absorber module length is greater than 22 5/8" (575mm), a lower circlip location or one less spring seat adapter should be used.



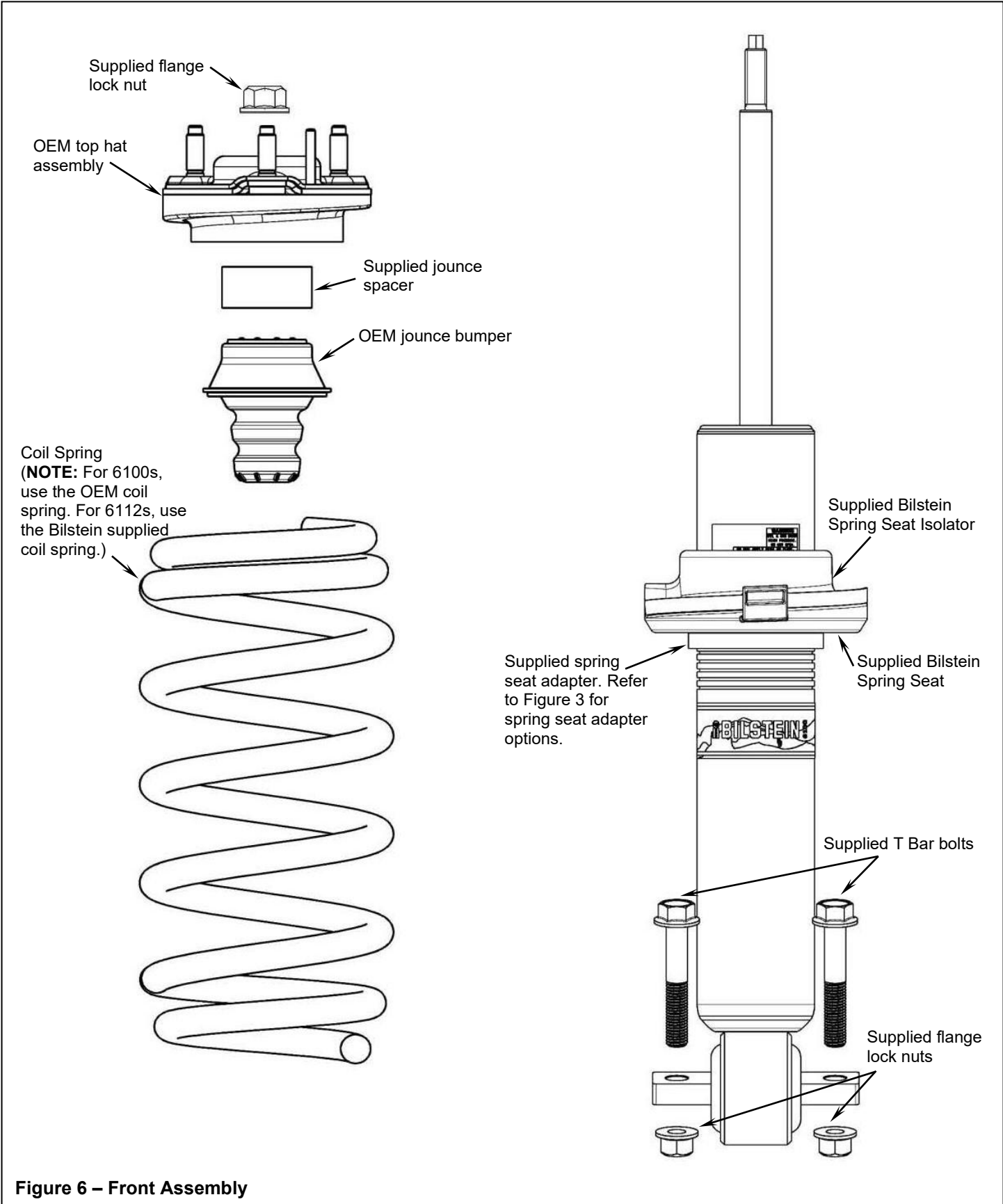
**Figure 4**

For the **Rears**, verify the shock absorber module length specified in Figure 5 below is **less than or equal to 23 3/8" (593mm)**. If the resultant shock absorber module length is greater than 23 3/8" (593mm), a lower circlip location or one less spring seat adapter should be used.



**Figure 5**

# E-WM05-0000134AA MOUNTING INSTRUCTION



# E-WM05-0000134AA MOUNTING INSTRUCTION

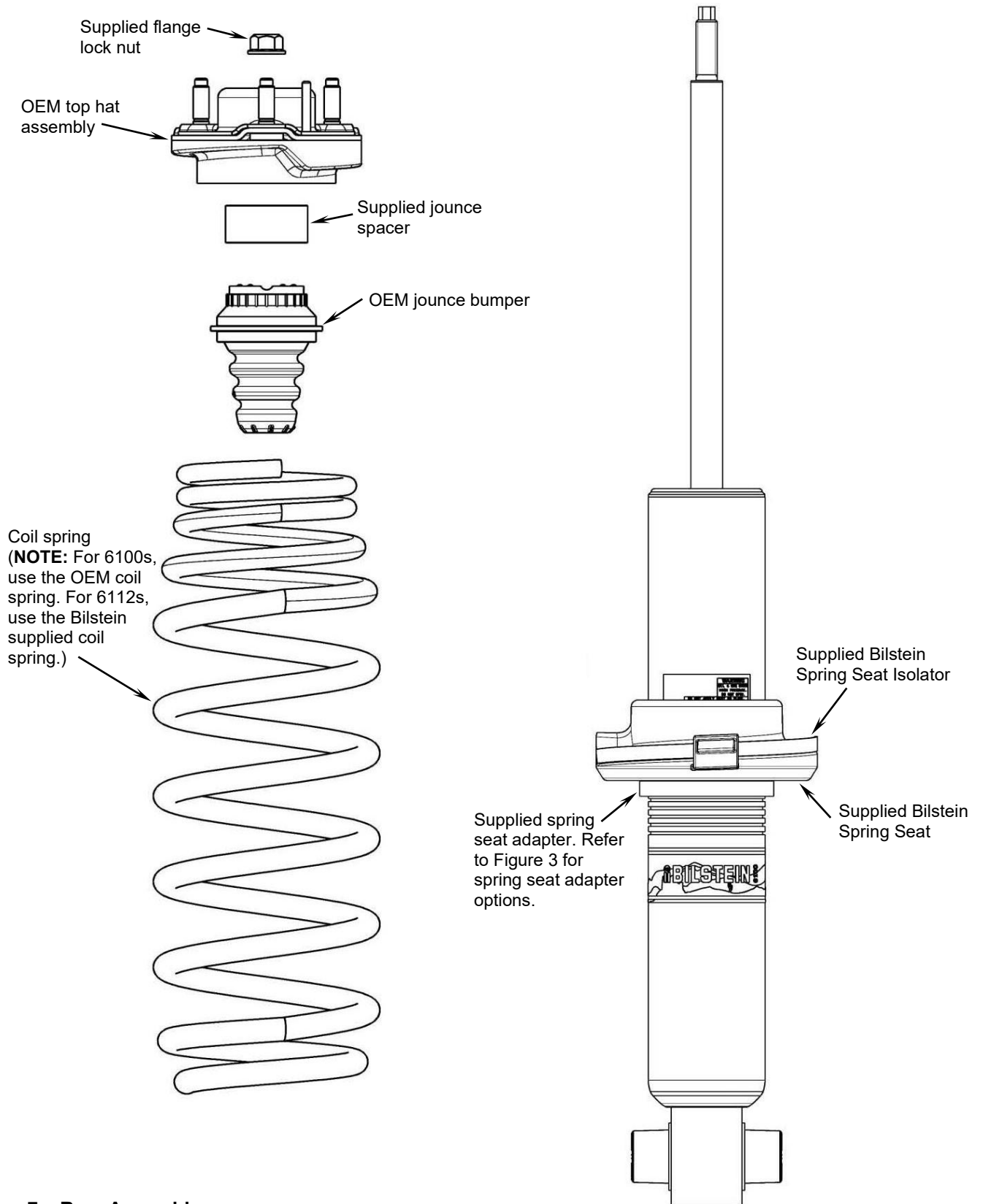


Figure 7 – Rear Assembly