



INSTALLATION MANUAL

AS-3411

**Arnott New Front Left Air Strut
Mercedes-Benz GL/GLS-Class (W166)**



Engineered to Ride, Built to Last®

CONGRATULATIONS ON YOUR PURCHASE OF AN ARNOTT® SUSPENSION PRODUCT

WE AT ARNOTT LLC ARE PROUD TO OFFER A HIGH QUALITY PRODUCT WITH ALL THE TECHNICAL SUPPORT YOU NEED. THANK YOU FOR YOUR CONFIDENCE IN US AND OUR PRODUCT.

Proper installation is essential to experience and appreciate the benefits of this system. Please take a moment to review these installation instructions before you begin to install these components on your vehicle. The removal and installation of air suspension products should only be performed by a fully qualified and certified automotive professional.

It is equally important to be aware of all necessary safety measures while installing your new Air Suspension System. This includes proper lifting and immobilizing of the vehicle and isolation of any stored energy to prevent personal injury or property damage.

GENERAL INFORMATION

Reading this manual signifies your agreement to the terms of the general release, waiver of liability, and hold harmless agreement, the full text of which is available at www.Arnottinc.com and www.Arnotteurope.com.



WARNING:

The air suspension system is under pressure (up to 10 bar, or 150 lbf/in). Verify pressure has been relieved and disconnect power to the air suspension system prior to disassembly. Do not allow dirt or grease to enter the system. Always wear standard hand, ear, and eye protection when servicing the air suspension system.

- Not to be stored below 5°F (-15°C) and above 122°F (50°C).
- Avoid damage to air lines and cables.
- Removal and installation is only to be performed by fully qualified personnel.
- Use car manufacturer's diagnostic software.

CAUTION:

Damage to the vehicle and air suspension system can be incurred if work is carried out in a manner other than specified in the instructions or in a different sequence.

To avoid the possibility of short circuits while working with electric components consult your owner's manual on how to disconnect your battery.

Consult your vehicle owner's manual, service manual, or car dealer for the correct jacking points on your vehicle and for additional care, safety and maintenance instructions. Under no circumstances should any work be completed underneath the vehicle if it is not adequately supported, as serious injuries and death can occur.

For vehicles with a "Closed Air Supply System," replacement of components requires proper adherence to procedures set forth within OE servicing literature. Failure to comply with the OE prescribed procedures can result in component damage and/or failure.

NOTE:

The product shown in the installation steps below may look different than the part you are installing. The installation steps are the same (unless otherwise noted) and all notices and warnings should be adhered to in the same manner.

AIR STRUT REMOVAL

1. Set steering to straight ahead.
2. Raise vehicle.
3. Remove front wheel. (Figure 1)

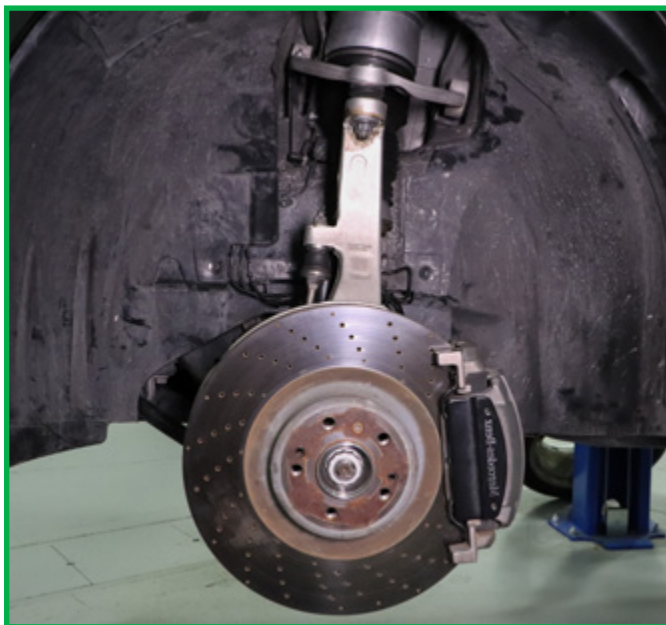


FIGURE 1

4. Remove engine bay trim panel to access top of air strut. (Figure 2)



FIGURE 2

5. Remove the air line fitting. (Figure 3)

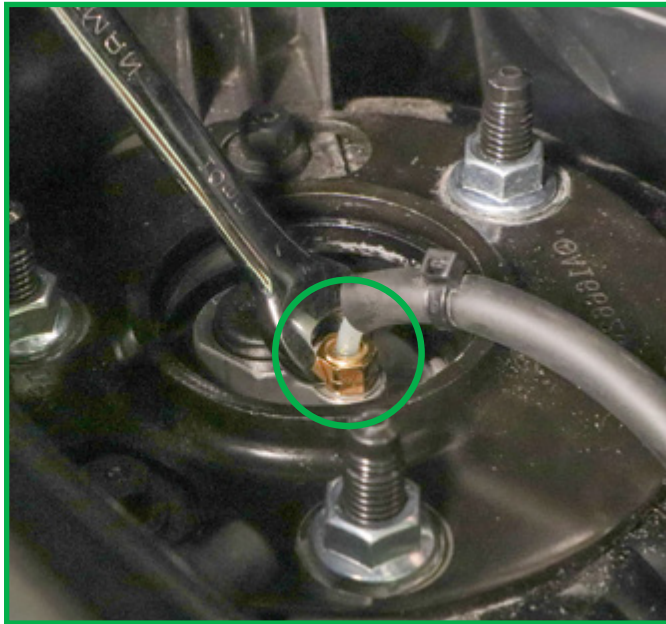


FIGURE 3

6. Remove the three (3) top mount nuts. (Figure 4)

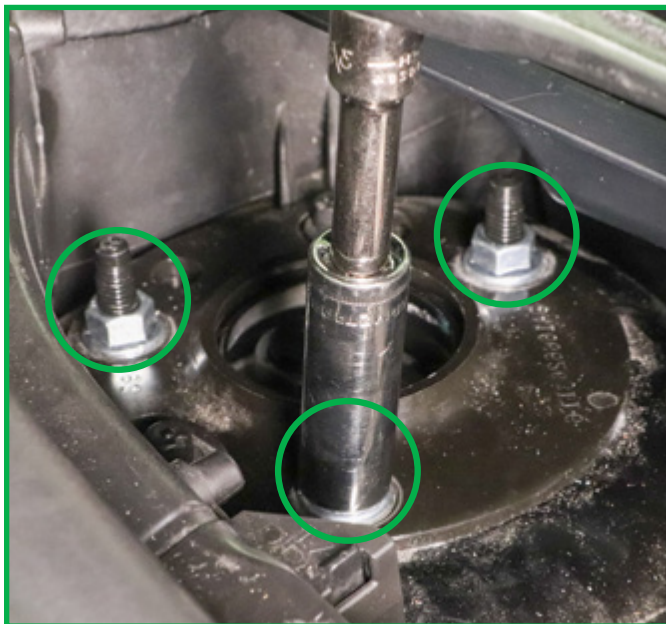


FIGURE 4

7. Disconnect steering knuckle joint. (Figures 5, 6)



FIGURE 5



FIGURE 6

8. Disconnect sway bar linkage and remove. (Figures 7, 8)

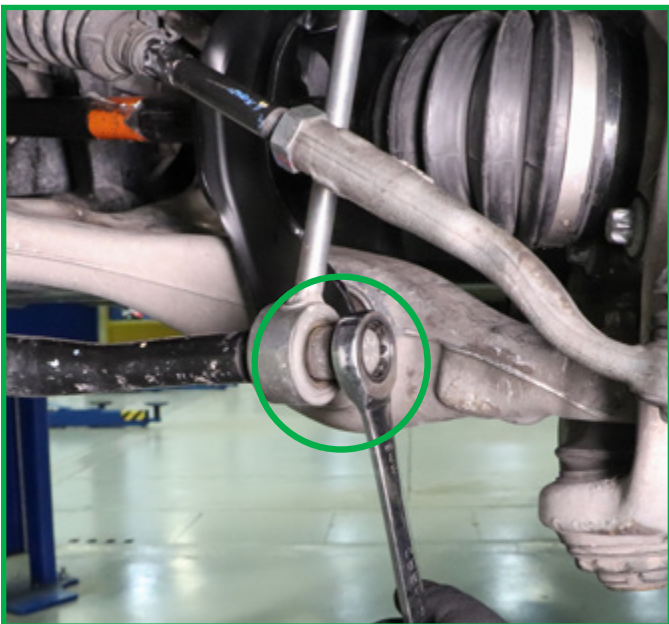


FIGURE 7

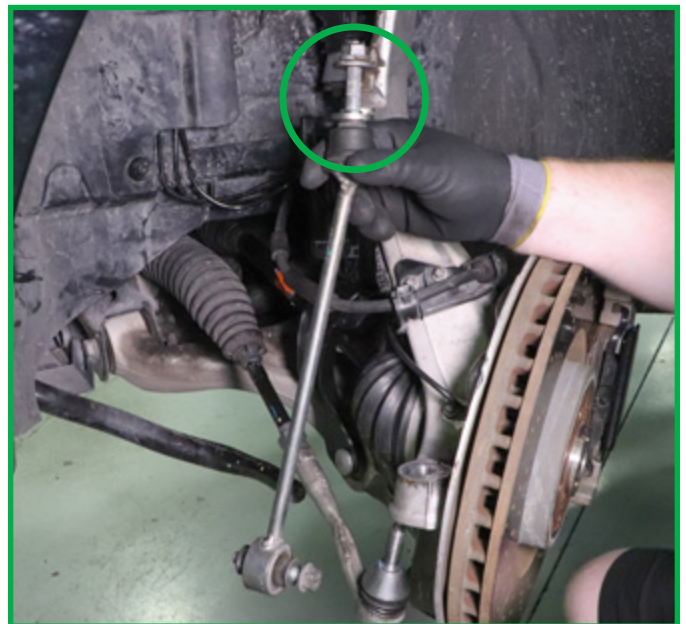


FIGURE 8

9. Disconnect air strut solenoid wire. Remove wire guide and unroute brake lines. (Figures 9, 10)

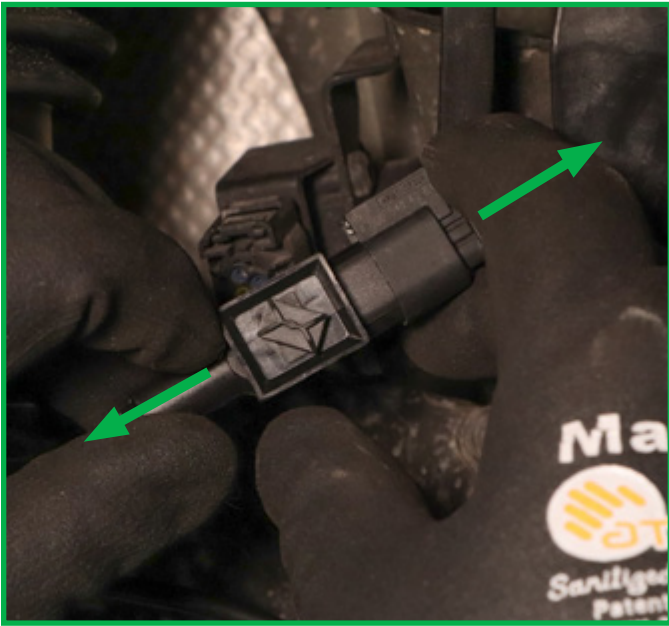


FIGURE 9



FIGURE 10

10. Remove lower strut mount nut. Leave the bolt in place. (Figure 11)

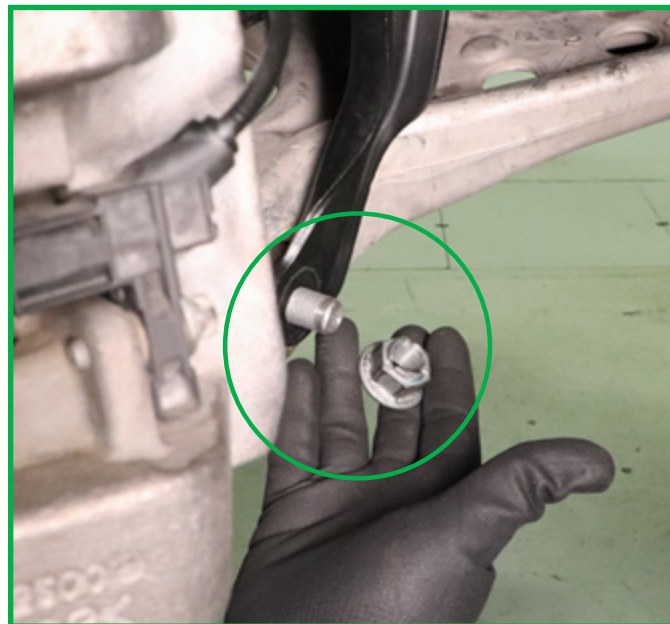


FIGURE 11

11. Remove axle nut. (Figures 12, 13)



FIGURE 12

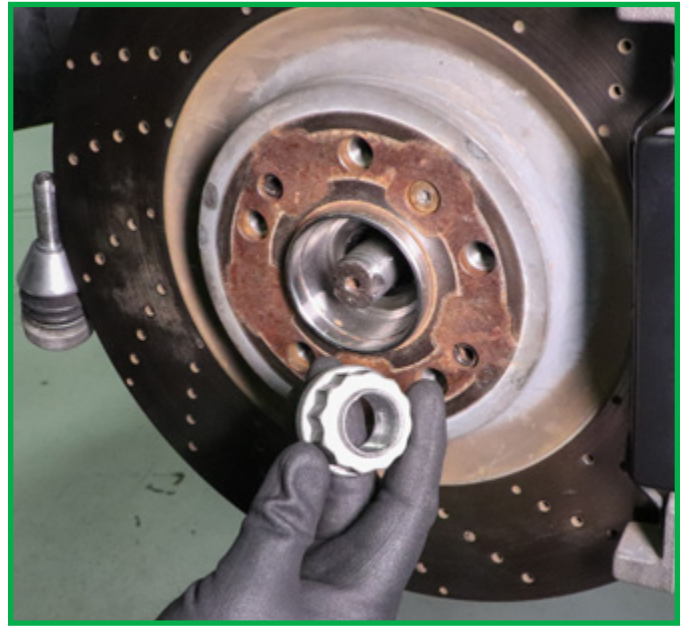


FIGURE 13

12. Support the lower control arm for the remainder of the removal and installation process to prevent damage to the suspension components. Disconnect the upper control arm ball joint from the spindle. (Figures 14, 15)



FIGURE 14



FIGURE 15

13. Separate axle from front wheel bearing. (Figure 16)

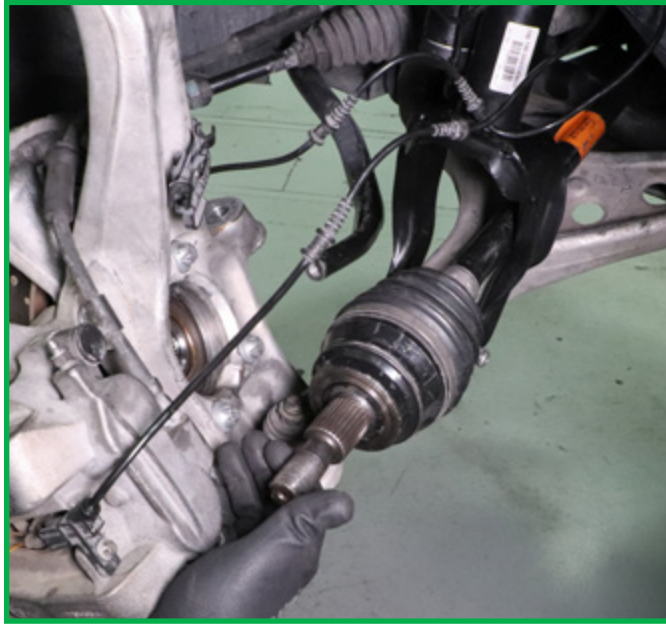


FIGURE 16

14. Remove bottom strut mount bolt. (Figure 17)



FIGURE 17

15. Pull out axle and remove air strut. (Figure 18, 19)

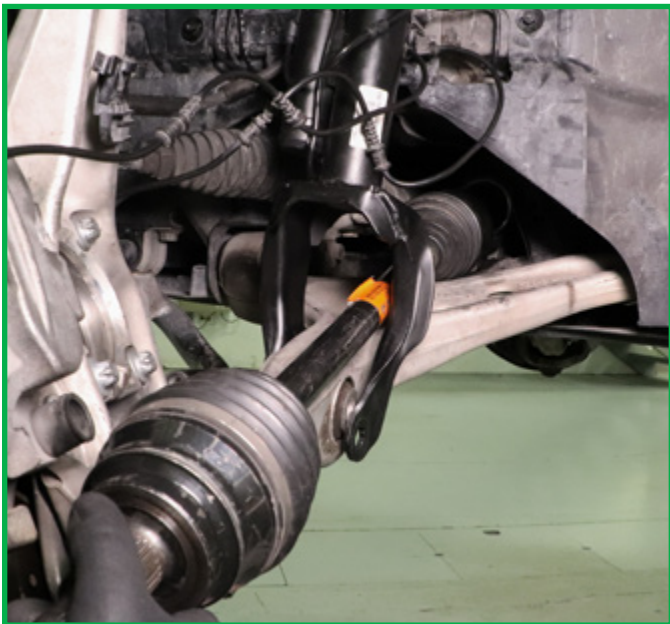


FIGURE 18



FIGURE 19

16. Removal complete.

AIR STRUT INSTALLATION



WARNING:

Tighten all nuts and bolts to manufacturer's specifications during the installation process.

1. Install the VOSS fitting from the provided accessory kit on to the new Arnott air strut and snug tight with a wrench. Remove the shipping pin. (Figures 20, 21, 22)



FIGURE 20

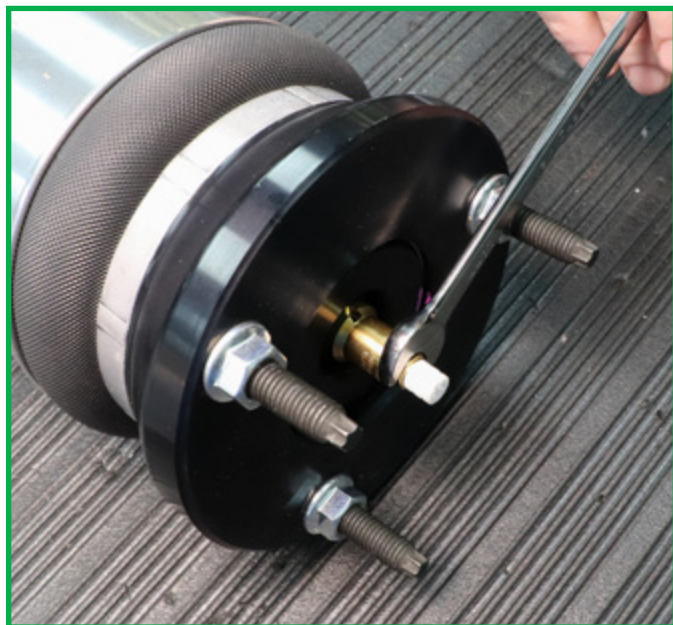


FIGURE 21



FIGURE 22

2. Remove existing VOSS fitting from the vehicle air line and discard. Use the figure below as an example. (Figure 23)

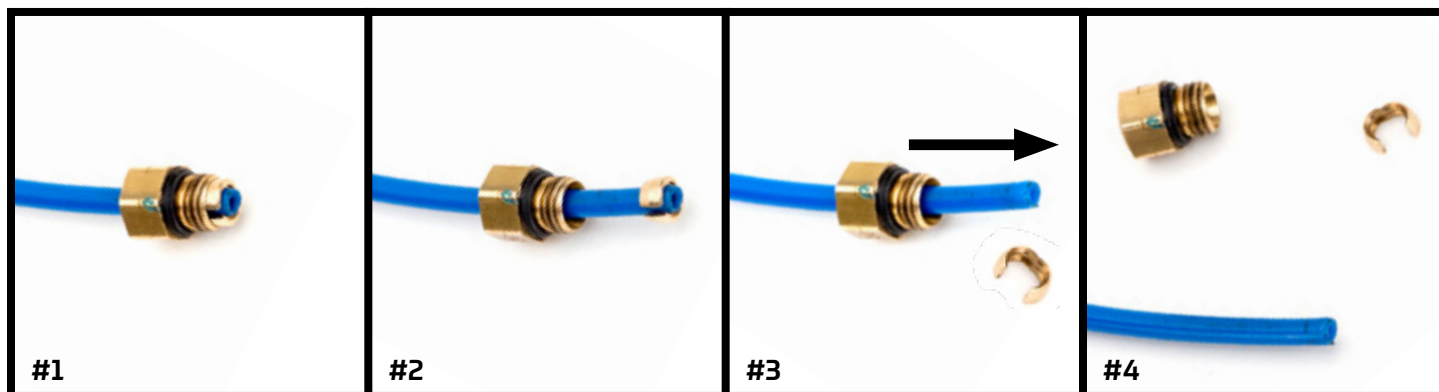
REMOVAL



Prior to inserting the existing air line into the new air strut you will need to remove the old original equipment air line fitting and discard.

NOTE:

Scratches and/or deep cuts in the air line can result in possible leaks. Inspect the air line before insertion. Air line needs to be replaced if damaged.



#1
OE AIR LINE FITTING

#2
SLIDE THE THREADED
PORTION UP THE LINE
AND SPREAD THE COLLET
OPEN TO REMOVE

#3
SLIDE THE AIR FITTING
OFF OF THE AIR LINE

#4
DISCARD OE AIR LINE
FITTING

FIGURE 23

3. Install new Arnott air strut and guide the axle back into place. Install top mount nuts loosely to hold strut in place if necessary. (Figures 24, 25)



FIGURE 24

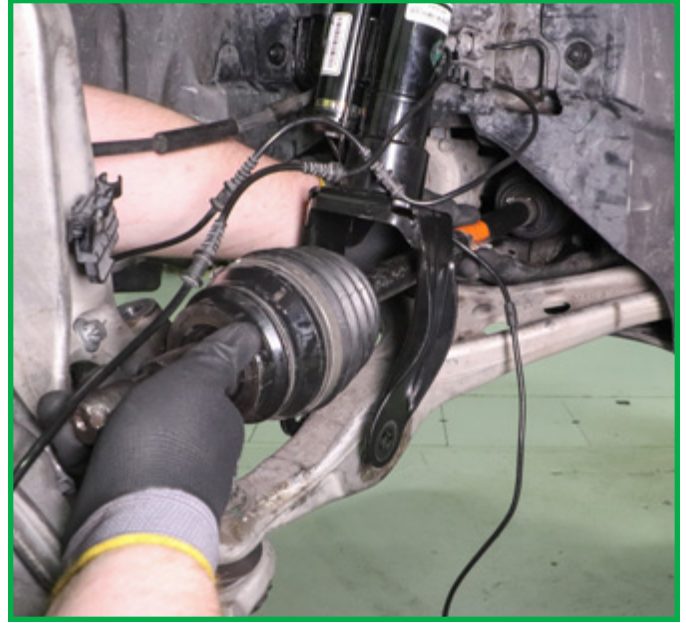


FIGURE 25

4. Reinstall axle into front wheel bearing. (Figure 26)

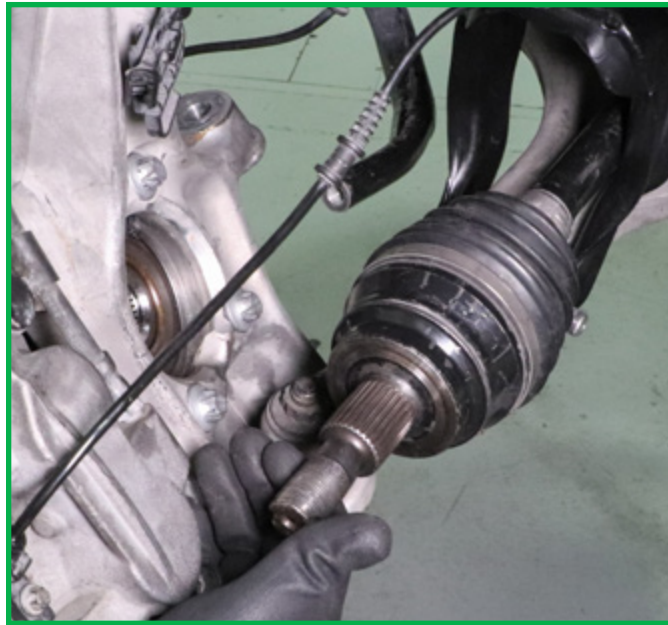


FIGURE 26

5. Reinstall spindle assembly and tighten to manufacturer's specifications. (Figure 27)



FIGURE 27

6. Reinstall bottom strut mount bolt and nut and tighten to manufacturer's specifications. (Figures 28, 29)



FIGURE 28



FIGURE 29

7. Reinstall wire guide and reroute all lines including brakes. Connect strut solenoid wire. Note: the wire guide may not sit perfectly on the shock body. Use zip ties as needed to secure the wire guide to the shock. (Figures 30, 31, 32)

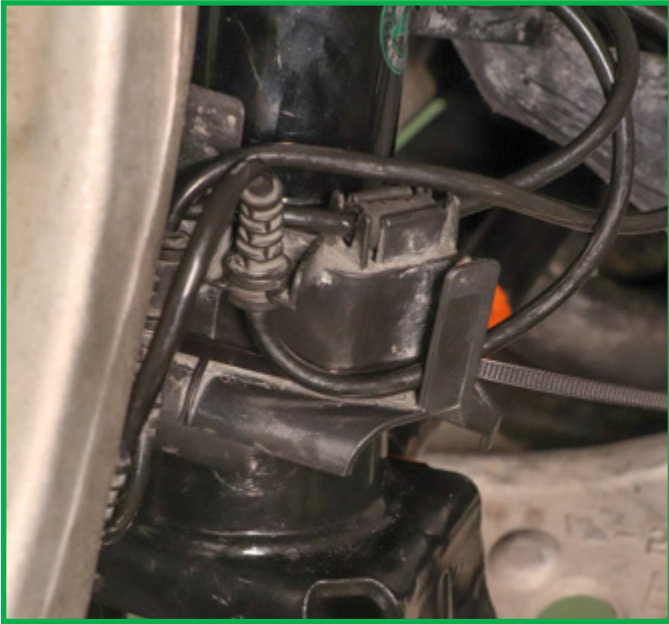


FIGURE 30

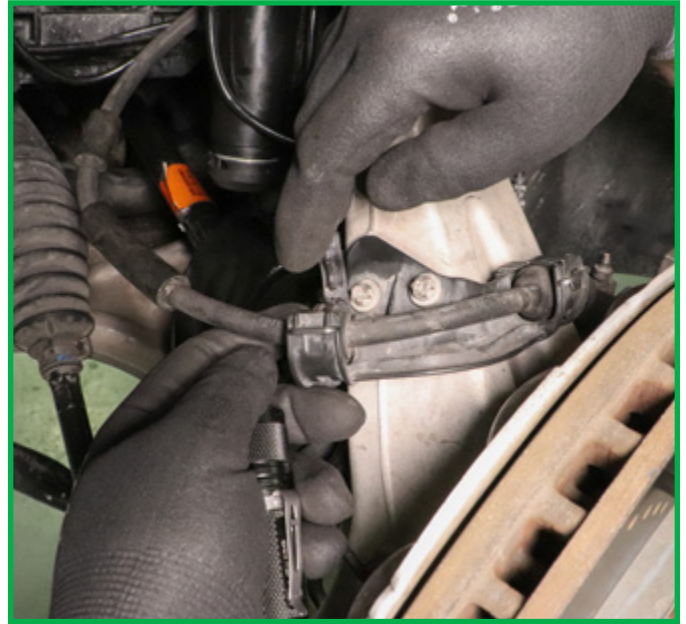


FIGURE 31



FIGURE 32

8. Reinstall sway bar linkage and tighten to manufacturer's specifications. (Figures 33, 34)

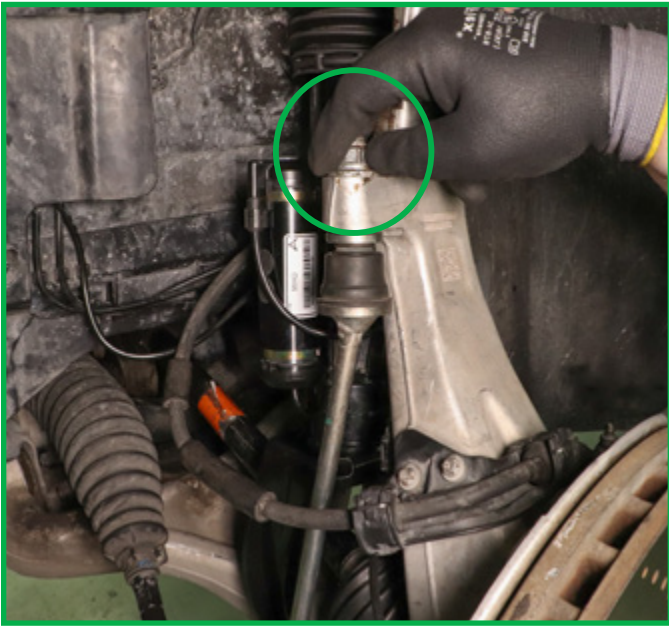


FIGURE 33

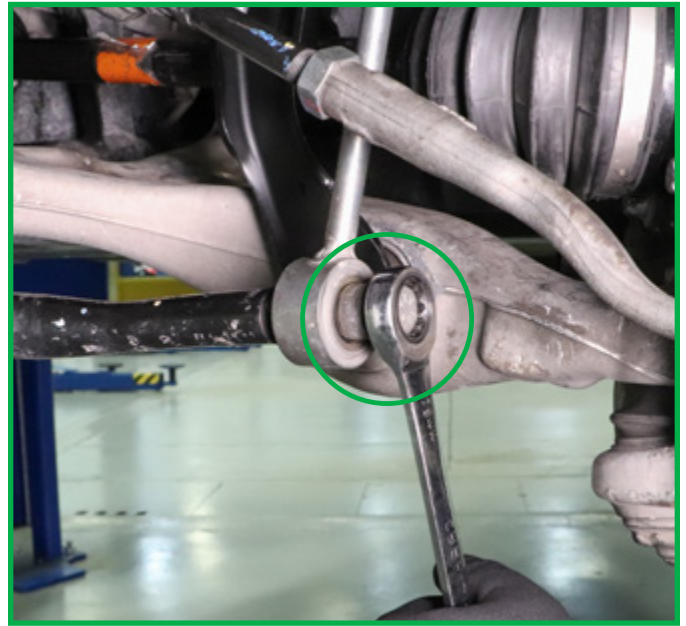


FIGURE 34

9. Reinstall steering knuckle joint and tighten to manufacturer's specifications. (Figures 35, 36)



FIGURE 35

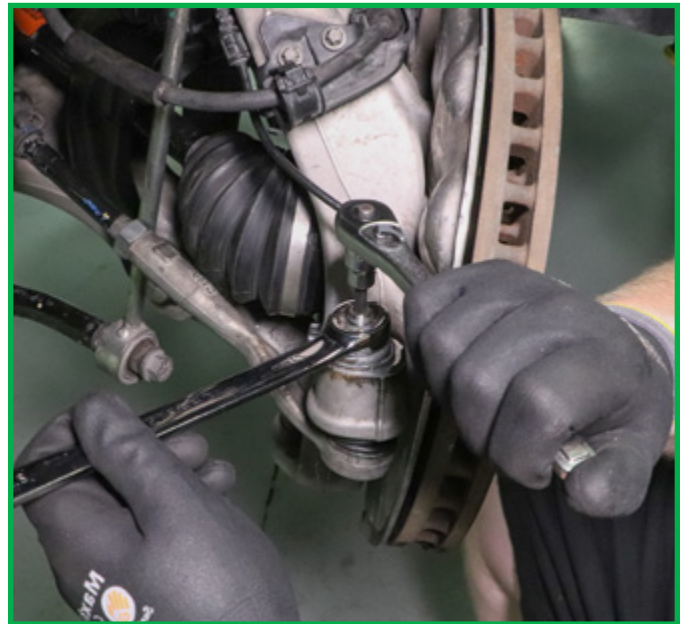


FIGURE 36

10. Reinstall axle nut and tighten to manufacturer's specifications. (Figure 37)

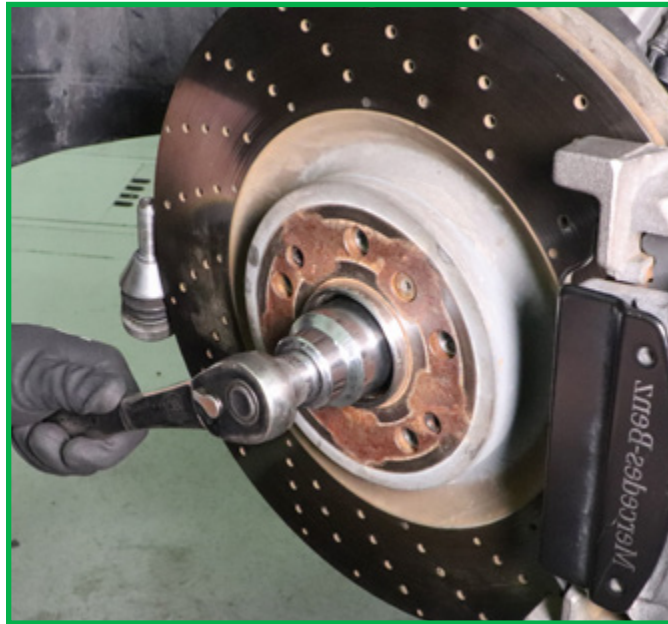


FIGURE 37

11. Reinstall the three (3) top mount nuts and tighten to manufacturer's specifications. (Figure 38)



FIGURE 38

12. Connect the air line to the strut air fitting. Push in until line is firmly seated. (Figures 39, 40)

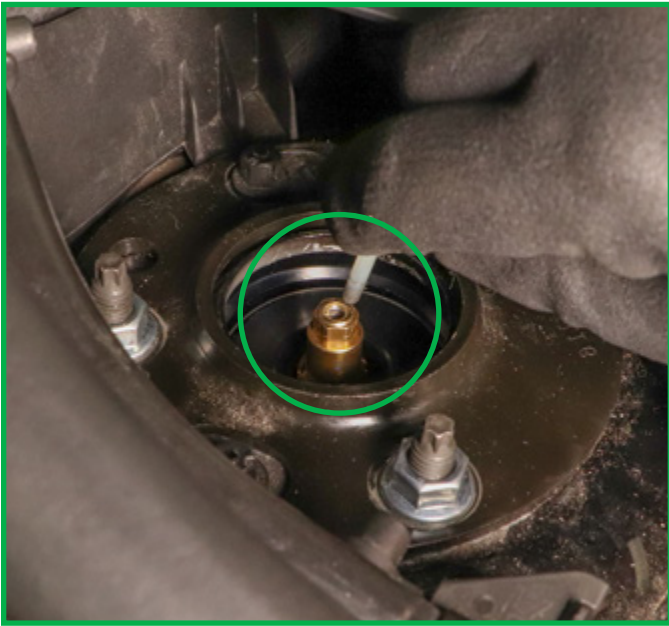


FIGURE 39

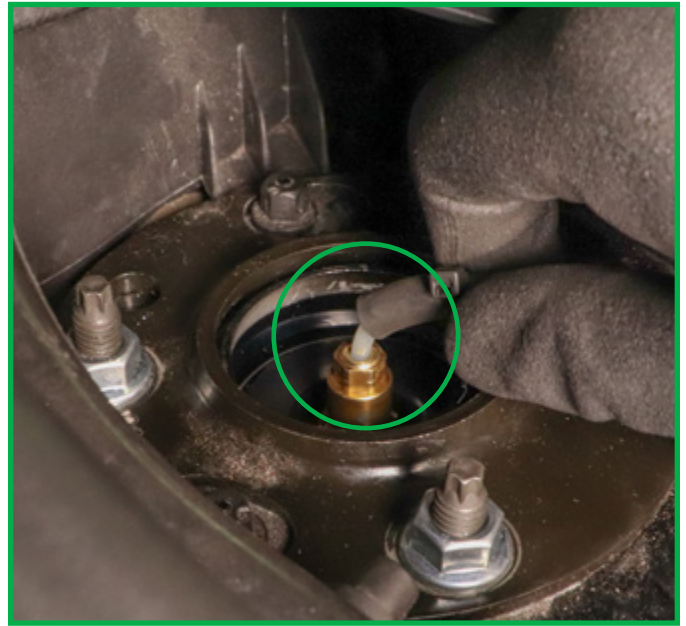


FIGURE 40

- 13. Reinstall engine bay trim
- 14. Reinstall front wheel.
- 15. Lower the vehicle.
- 16. Installation complete.

Arnott®

Suspension Products

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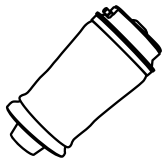
UK Phone: +44 203 3186 124

BE Phone: +32 258 846 90

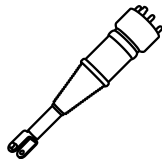
ES Phone: +34 91 901 10 56

FR Phone: +32 78 48 46 93

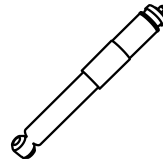
Email: info@Arnotteurope.com



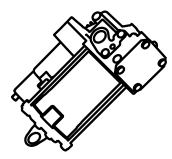
Air Springs



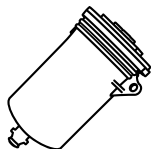
Struts



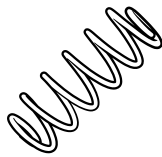
Shocks



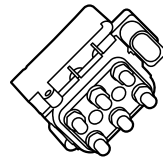
Compressors



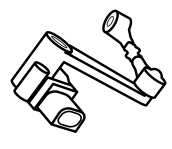
Dryers



Coil Spring
Conversion Kits



Valve Blocks



Ride Height
Sensors