

## **INSTALLATION MANUAL**

AS-3897
Arnott New Front Left Air Strut
Mercedes-Benz E-Class
(W212 w/ADS, w/o 4MATIC, Incl. AMG)



Engineered to Ride, Built to Last®



## **IMPORTANT NOTICE**

THIS PART IS NOT SUITABLE FOR EUROPEAN AVANTGARDE OR EUROPEAN AMG MODELS



# 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.

## **AIR STRUT REMOVAL**

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



FIGURE 1

4. Remove the strut cap to gain access to the air line. (Figures 2, 3)





FIGURE 2 FIGURE 3

5. Loosen and remove the air line fitting from the top of the strut. (Figures 4, 5)



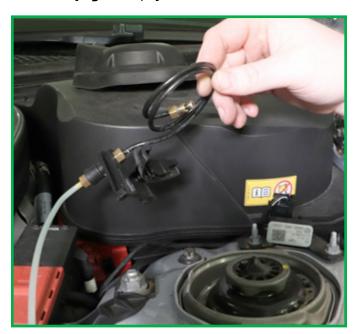


FIGURE 4 FIGURE 5

6. Disconnect electrical connection on the bottom mount of the strut. (Figure 6)



FIGURE 6

7. Remove the strut wire bracket. Bracket will be reused in installation. Ensure all wires and brake line are free from possible entanglement during strut removal. (Figure 7)



FIGURE 7

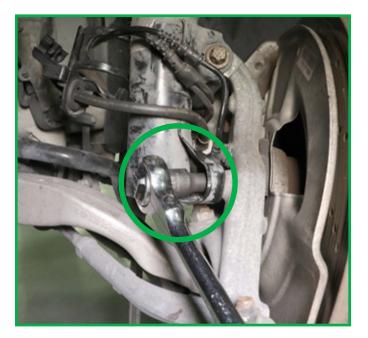
8. Remove the sway arm link nut and disconnect the sway arm from the strut. (Figures 8, 9)



FIGURE 8



9. Remove the two (2) lower strut bolts located opposite of each other at the wheel carrier. (Figures 10, 11)



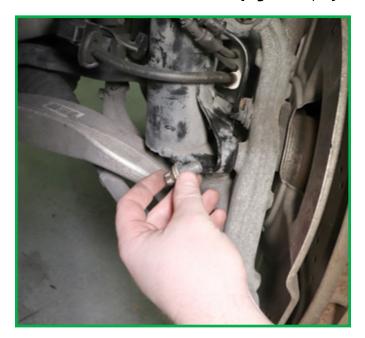


FIGURE 10 FIGURE 11

10. Remove the upper strut bolt at the wheel carrier. (Figures 12, 13)





11. Support the body of the strut and remove the three (3) top mount bolts. (Figures 14, 15)





FIGURE 14 FIGURE 15

12. Remove the air strut from the vehicle. (Figure 16)



FIGURE 16

13. Removal complete.

## **AIR STRUT INSTALLATION**



#### **WARNING:**

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



#### **WARNING:**

Do not remove the air fitting from the air strut. Doing so may cause damage and/or void warranty. Remove the white shipping pin from the new air fitting and insert the air line until fully seated.

1. Install the new Arnott strut into the vehicle. (Figure 17)

NOTE:

When installing the strut, make sure the electrical connections and brake lines are orientated correctly to avoid entanglement with the new strut.



FIGURE 17

2. Loosely install the three (3) top mount bolts by hand to hold the air strut in place. (Figure 18)



FIGURE 18

3. Reinstall the top mount bolt at the wheel carrier. Tighten to manufacturer's specifications. (Figures 19, 20)







FIGURE 20

4. Reinstall the two (2) bottom mount bolts at the wheel carrier. Tighten to manufacturer's specifications. (Figure 21)

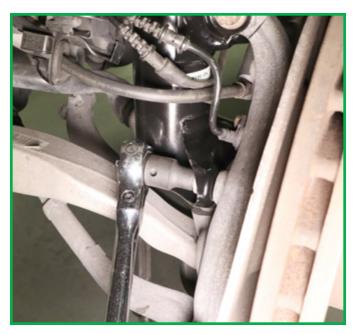


FIGURE 21

5. Reinstall the sway arm linkage. Tighten to manufacturer's specifications. (Figure 22)



FIGURE 22

6. Reinstall the strut wire mounting bracket. Secure all wires and brake line. (Figure 23)



FIGURE 23

7. Connect the strut electrical connection. (Figure 24)



FIGURE 24

8. Tighten the three (3) top mount bolts to manufacturer's specifications. (Figure 25)



FIGURE 25

9. Remove the white plastic shipping pin from the air line fitting and discard. (Figure 26)



FIGURE 26

10. Prepare the air line for installation by removing the old air fitting as demonstrated below. (Figure 27)

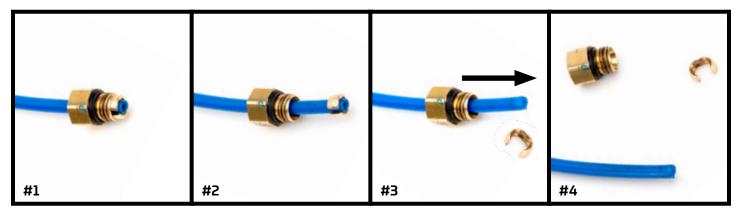
#### **REMOVAL**



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.



**OE AIR LINE FITTING** 

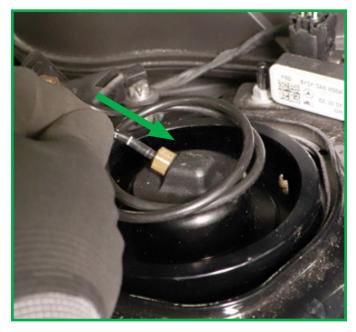
SLIDE THE THREADED PORTION UP THE LINE AND SPREAD THE COLLET OPEN TO REMOVE

SLIDE THE AIR FITTING OFF OF THE AIR LINE

DISCARD OE AIR LINE FITTING

FIGURE 27

11. Install the air line into the air line fitting on the strut. Press the air line in firmly until it is fully seated in the fitting. (Figures 28, 29)







## 12. Reinstall the strut cap. (Figure 30)



FIGURE 30

- 13. Reinstall the left front wheel.
- 14. Inflate air system per manufacturer's specifications.
- 15. Lower vehicle.
- 16. Installation complete.



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