

ZF Aftermarket Service Information

Replacing air spring
Mercedes-Benz
W639 | V639

Manufacturer Mercedes-Benz

Product

Document number 40939 EN



AFTERMARKET


LEMFÖRDER  SACHS  TRW 



1 Replacing air spring

Vehicle manufacturer	Model range	Model
Mercedes-Benz	W639 V639	Viano
		Vito

Tab. 1

 Vehicle identification: Check OE item number.

Storing air springs	
Temperature	-15°C (min.) / +50°C (max.)
UV radiation	Avoid direct sunlight.
Storage environment	Ensure a clean storage environment. Avoid contamination.

Tab. 2 Storing air springs

1.1 Removing air spring, rear axle

Requirements:

- Vehicle has been raised safely. Observe the vehicle manufacturer specifications.
- Air suspension has been emptied using suitable diagnostic unit. Observe the vehicle manufacturer specifications.



Removing air spring

1. Loosen and remove the screws of the air spring from the upper mounting.

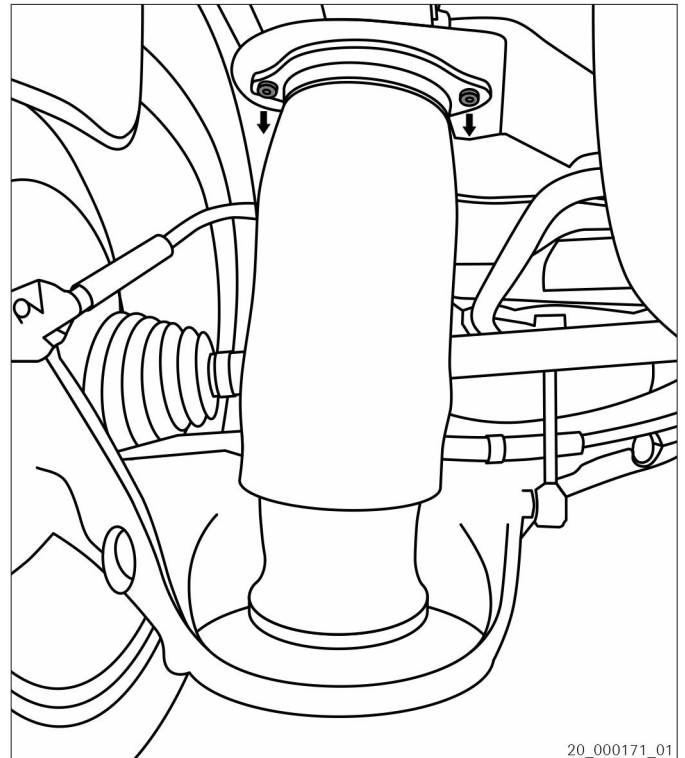


Fig. 1

2. Pull up and detach air spring from the lower mounting.

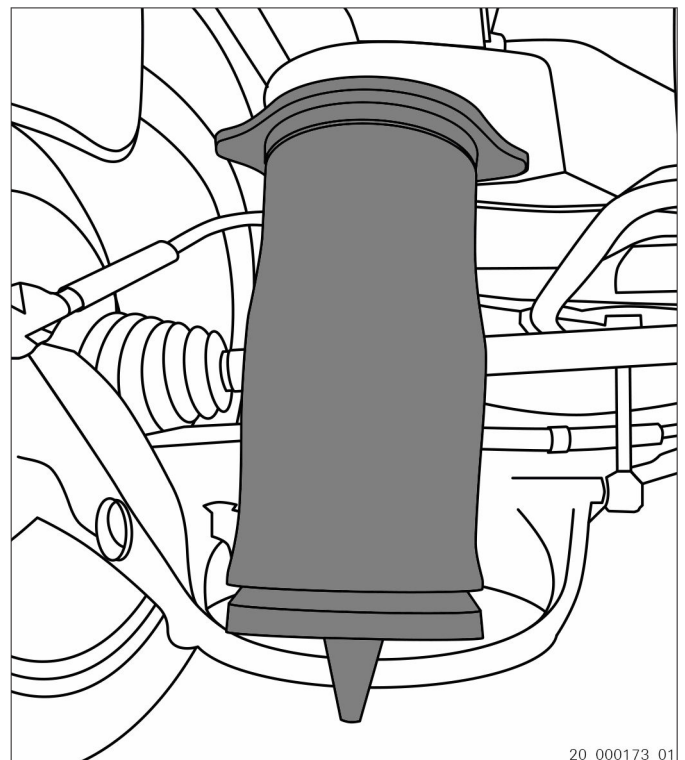


Fig. 2




Detaching air line

3. Detach air line.
4. Remove air spring.

1.2 Modifying air line

Requirements:

- Connectors are protected against contamination.

 Connecting air line to a new SACHS air spring possible only without OE nipple.

Modifying air line

1. Separate nipple (1) from clamping piece (2).

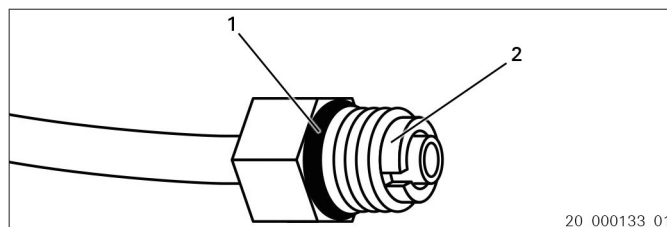


Fig. 3 Nipple with clamping piece

- 1 Nipple
- 2 Clamping piece

2. Bend open clamping piece (2).

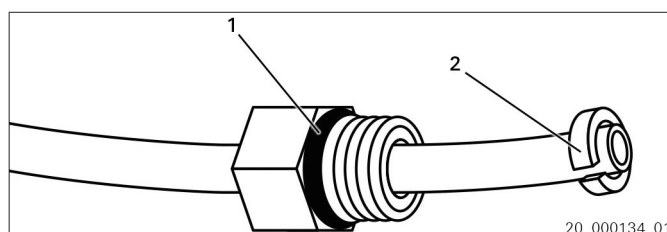


Fig. 4 Bend open clamping piece

- 1 Nipple
- 2 Clamping piece

3. Remove clamping piece (2).

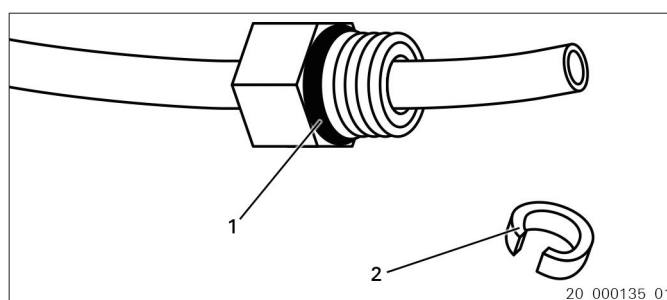


Fig. 5 Remove clamping piece



- 1 Nipple
- 2 Clamping piece

4. Remove nipple (1).

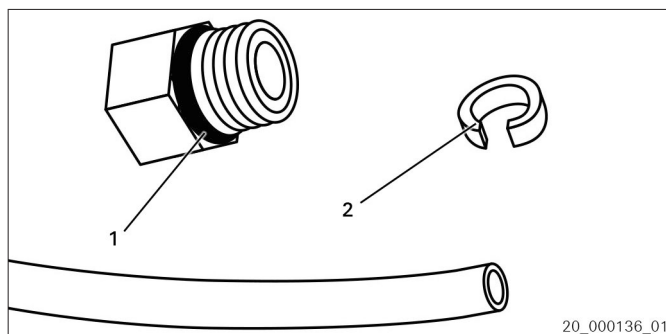


Fig. 6 Remove nipple

- 1 Nipple
- 2 Clamping piece

1.3 Installing air spring, rear axle

Requirements:

- Connectors are clean.
- Connectors are protected against contamination.
- Air line has been checked for damage.

NOTICE

Material damage possible on air suspension.

⇒ Do not lubricate sealing rings.

Connecting air line

1. Remove and dispose of transport safety device (1).

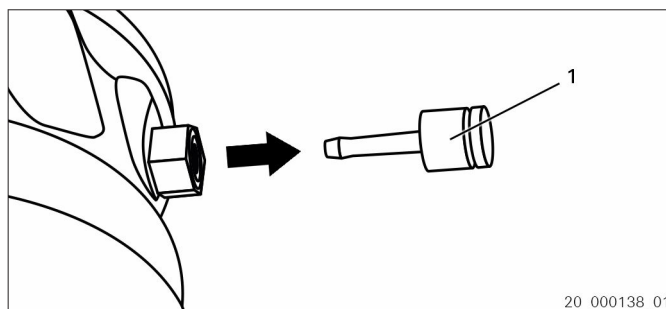


Fig. 7 Removing transport safety device

- 1 Transport safety device



2. Insert air line (1) into the nipple until it abuts.

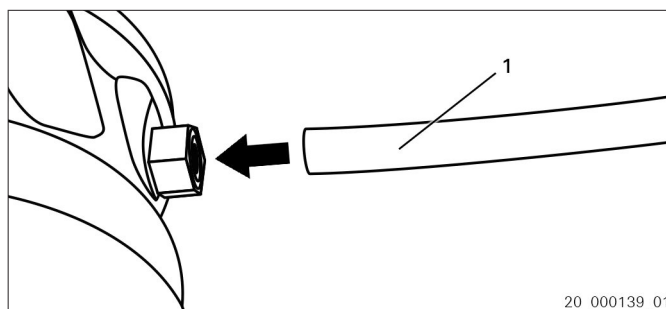


Fig. 8 Insert air line

1 Air line

3. Pull air line to check for secure fit.

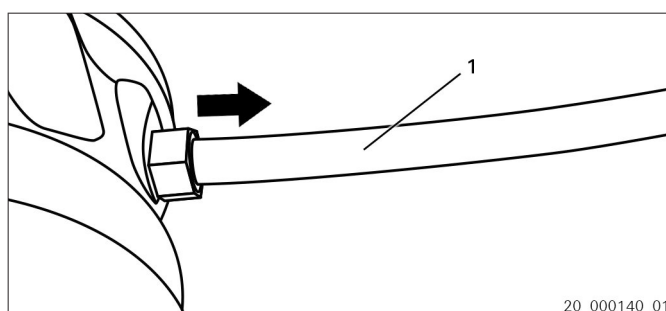


Fig. 9 Check for secure seat

1 Air line



Installing air spring

4. Insert air spring.
5. Check air line for proper fit.

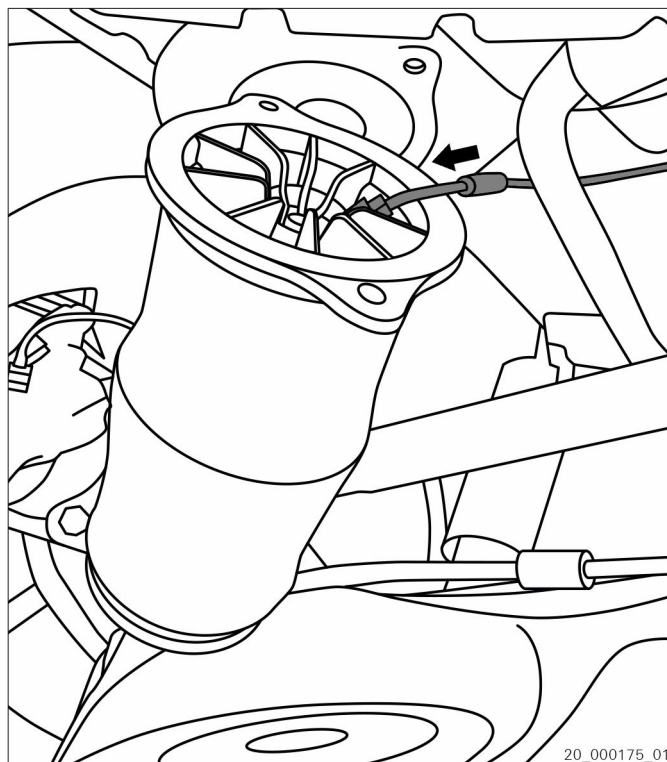


Fig. 10



Mounting air spring

6. Screw air spring to the upper mounting. Tighten screws to the correct tightening torque. Observe the vehicle manufacturer specifications.

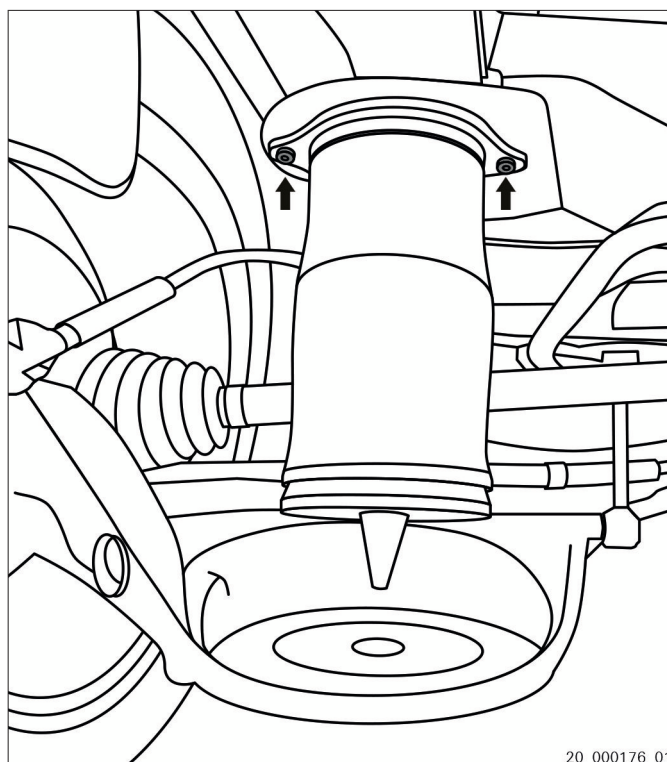


Fig. 11

7. Raise rear axle or lower vehicle carefully onto its wheels.
8. Slide in the lower mounting of the air spring.

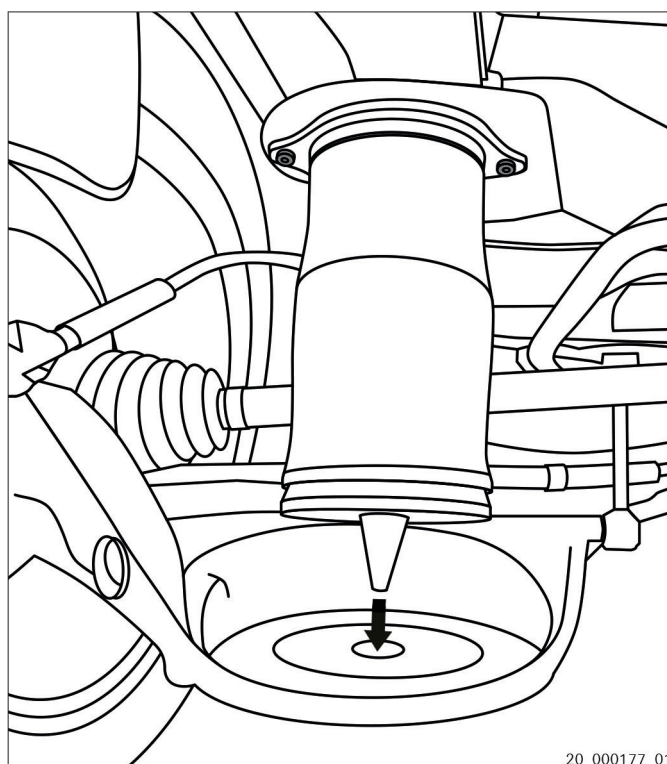


Fig. 12



9. Check air spring for proper fit.

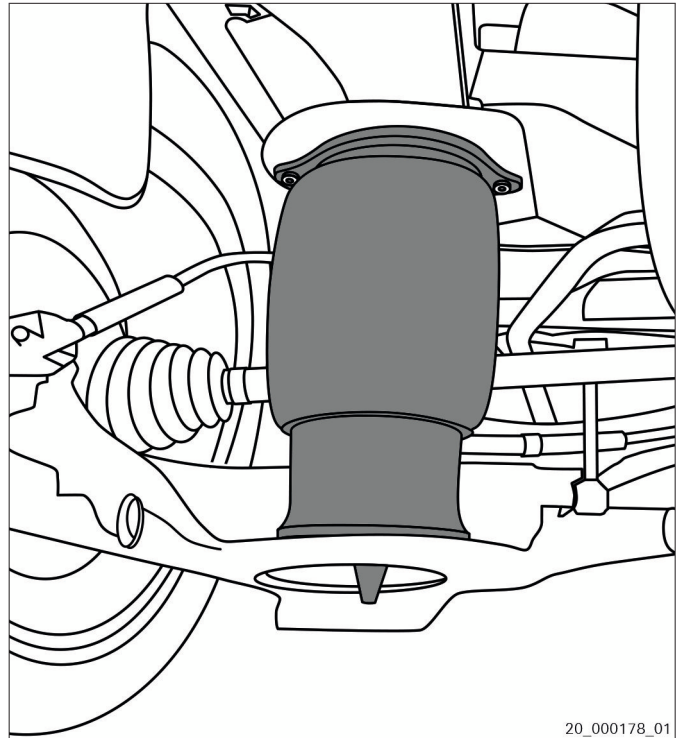


Fig. 13

Filling air spring

10. Fill air suspension using suitable diagnostic unit. Observe the vehicle manufacturer specifications.
11. Lower vehicle from lifting platform.