

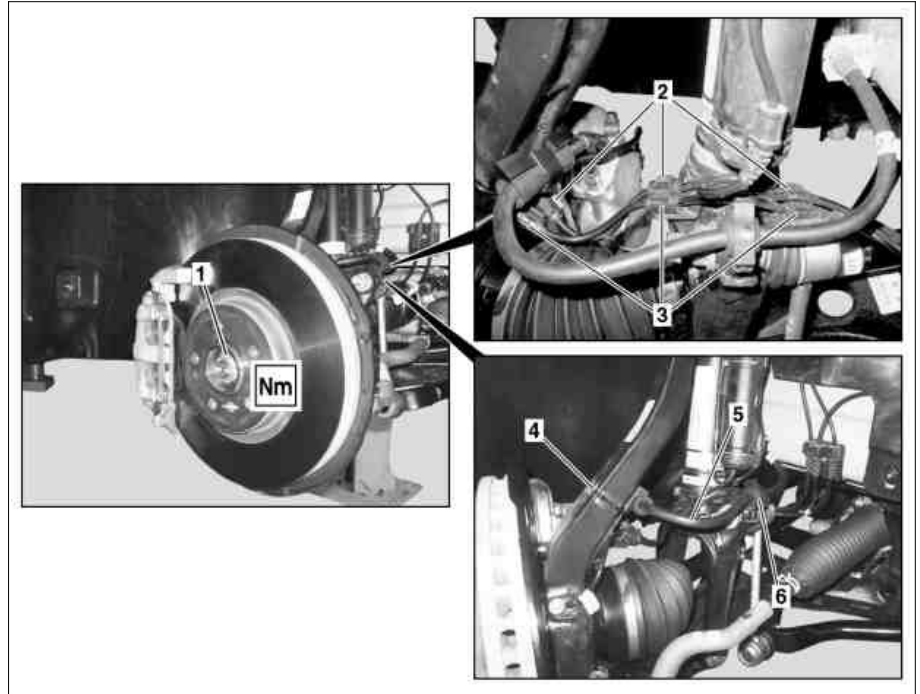
MODEL 164

## Modification notes

|         |  |                   |
|---------|--|-------------------|
| 25.4.14 | "Install a new retaining ring (14)" added. | Operation step 17 |
|---------|--|-------------------|

Shown on right side of MODEL 164 with CODE 489 (AIRmatic (air suspension with level adjustment and adaptive damping system ADS))

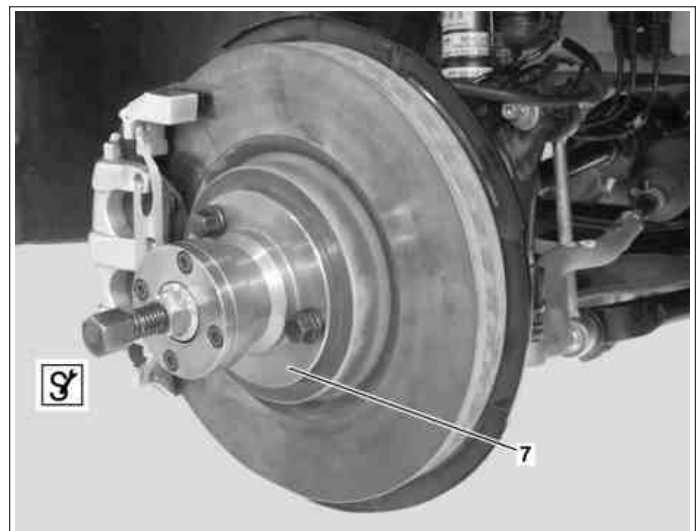
- 1 Front axle shaft collar nut
- 2 Bracket
- 3 Bracket
- 4 Cable tie
- 5 Brake hose
- 6 Brake hose bracket



P33.30-2082-06

Shown on right side of MODEL 164 with CODE 489 (AIRmatic (air suspension with level adjustment and adaptive damping system ADS))

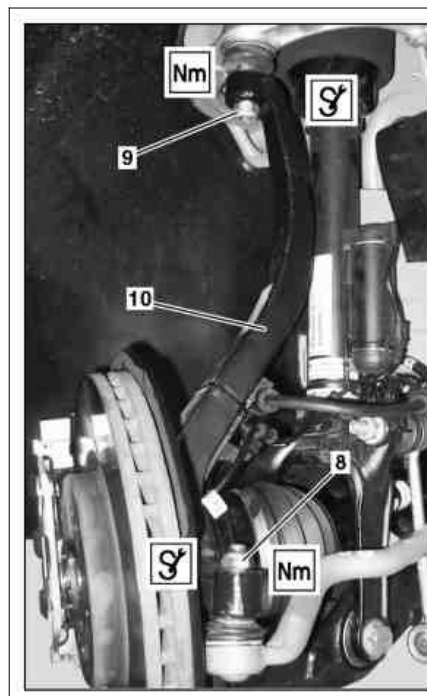
- 7 Extraction and insertion tool



P33.30-2083-11

Shown on right side of MODEL 164 with CODE 489 (AIRmatic (air suspension with level adjustment and adaptive damping system ADS))

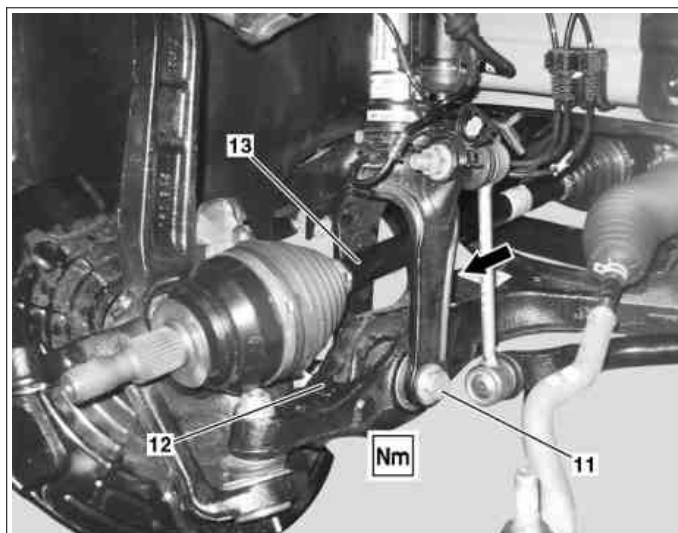
- 8 Nut
- 9 Nut
- 10 Steering knuckle



P33.30-2084-03

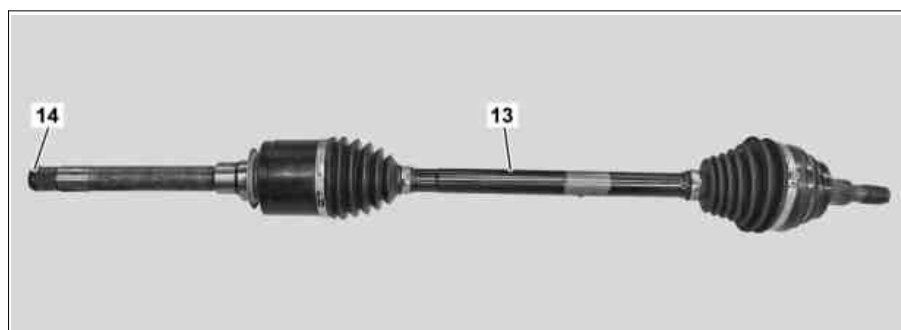
Shown on right side of MODEL 164 with CODE 489 (AIRmatic (air suspension with level adjustment and adaptive damping system ADS))

- 11 Screw
- 12 Transverse control arm
- 13 Front axle shaft




P33.30-2085-11

- 13 Front axle shaft
- 14 Retaining ring



P33.30-2163-04

|                          |  |  |                           |
|--------------------------|--|--|---------------------------|
| <p><b>⚠ Danger !</b></p> | <p><b>Risk of injury.</b> Moving parts can pinch, crush or, in extreme cases even sever extremities.</p> | <p>No parts of the body or limbs should be within the operating area of the mechanism when the components are moving.</p>  | <p>AS00.00-Z-0009-01A</p> |
| <p><b>⚠ Danger !</b></p> | <p><b>Risk of death</b> caused by vehicle slipping or toppling off of the lifting platform.</p>          | <p>Align vehicle between vehicle lift columns and position the four support plates at the vehicle lift support points specified by the vehicle manufacturer.</p> | <p>AS00.00-Z-0010-01A</p> |

|  |  |   |   |
|--|--|---|---|
|  <b>Danger !</b> | <b>Risk of death</b> when touching components on vehicles with high-voltage on-board electrical system                     | Do not touch components and open lines of the high-voltage on-board electrical system. Persons who wear electronic implants (e.g. cardiac pacemakers), must <b>not</b> carry out any work on high-voltage on-board electrical systems.  | AS54.00-Z-0001-01A                                    |
|                | Notes on self-locking nuts and bolts   |   | AH00.00-N-0001-01A                                    |
|                | Notes on repair work on suspension components  |   | AH00.00-P-0100-01A                                    |
|                | <b>Remove/install</b>  |   |   |
| 1  | Switch off ignition and remove transmitter key   |   |   |
| 2  | Raise vehicle  |  Raise vehicle until wheels are free of ground.  | AR00.60-P-1000GZ                                      |
| 3  | Deflate AIRmatic system using STAR DIAGNOSIS   | MODEL 164 with CODE 489 (Airmatic (air suspension with level adjustment and adaptive damping system ADS ))  | AD00.00-P-2000-04A                                    |
|                |  |   |   |
| 4  | Remove front wheels  |   | AP40.10-P-4050Z                                       |
|                |  |   |   |
| 5  | Unscrew collar nut on front axle shaft (1)   |  For counterholding purposes an assistant must apply the brake.<br> Collar nut, front axle shaft to front axle shaft flange   | *BA33.30-P-1001-02D                                   |
| 6  | Raise vehicle  |  Raise vehicle to full height.   | AR00.60-P-1000GZ                                      |
| 7.1  | Detach lower engine compartment paneling   | MODEL 164 with ENGINE 113, 156, 272, 273  | AR61.20-P-1105GZ                                      |
| 7.2  | Remove soundproofing   | MODEL 164 with ENGINE 629, 642  | AR94.30-P-5300GZ                                      |
| 7.3  | Remove underide guard  | MODEL 164 with CODE 430 (Offroad package)   | AR88.30-P-0010GZ                                      |
| 8  | Lower vehicle  |  Lower half way.   | AR00.60-P-1000GZ                                      |
| 9  | Remove electrical lines from bracket (2) and bracket (3)   |  Do not damage electrical leads.   |   |
| 10   | Cut off cable ties (4)   |  <b>Installation:</b> Pay attention to installation position.<br> <b>Installation:</b> Use a new cable tie (4).<br> Pliers | *164589013700   |
| 11   | Remove brake hose (5) from brake hose bracket (6)  |  Do not damage the brake hose (5).   |   |
| 12   | Unscrew nut (8) and detach tie rod from steering knuckle (10)  |  Self-locking nut, tie rod to steering knuckle<br> Thrust piece<br> Puller   | *BA46.40-P-1002-01K<br>*140589006300<br>*140589093300 |
| 13   | Unscrew nut (9) and detach steering knuckle (10) from upper transverse control arm   |  Self-locking nut, upper ball joint out of upper transverse control arm to steering knuckle<br> Puller<br> Thrust piece    | *BA33.20-P-1001-01J<br>*601589043300<br>*140589006300 |
| 14   | Mount extraction and insertion tool (7) and undo front axle shaft (13) from front axle shaft flange                        |  Extraction and insertion tool   | *210589034300   |
| 15   | Swivel steering knuckle (10) out of working area   |   |   |
| 16   | Unscrew nut from front shock absorber, pull out bolt (11) and detach front shock absorber from transverse control arm (12) |  Self-locking nut, shock absorber to wishbone  | *BA32.25-P-1002-01G                                   |
| 17   | Pull front axle shaft (13) out of front axle gear (arrow) and remove   |  <b>Installation:</b> Install a new retaining ring (14).<br> Collect any oil which runs out.  |   |
| 18   | Install in the reverse order   |   |   |
| 19   | Fill AIRmatic system using STAR DIAGNOSIS  | <br>The wheels must not be in contact with the ground during the filling procedure. The air suspension bellows in the spring element will otherwise be destroyed if filling is performed in the compressed state.  |   |

|    |                          |  |                  |
|----|--------------------------|--|------------------|
| 20 | Check AIRmatic for leaks | MODEL 164 with CODE 489 (Airmatic (air suspension with level adjustment and adaptive damping system ADS )) | AR32.22-P-8100GZ |
|----|--------------------------|--|------------------|

**Nm** Front axle shock absorber

| Number             | Designation                                  | Nm | Model 164.1/8 |
|--------------------|--|----|---------------|
| BA32.25-P-1002-01G | Self-locking nut, shock absorber to wishbone |    | 265           |

**Nm** Wheel control, hub

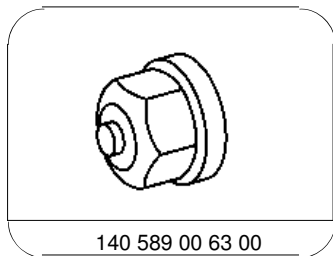
| Number             | Designation  | Stage 1 | Nm | Model 164.1/8 |
|--------------------|--|---------|----|---------------|
| BA33.20-P-1001-01J | Self-locking nut, upper ball joint out of upper transverse control arm to steering knuckle | Stage 1 | Nm | 20            |
|                    |  | Stage 2 | ∠° | 90            |

**Nm** Front axle shaft

| Number             | Designation   | Stage 1 | Nm | MODEL 164.1 | MODEL 164.8 |
|--------------------|---|---------|----|-------------|-------------|
| BA33.30-P-1001-02D | Collar nut, front axle shaft to front axle shaft flange | Stage 1 | Nm | 250         | 260         |
|                    |   | Stage 2 | ∠° | 45          | 45          |

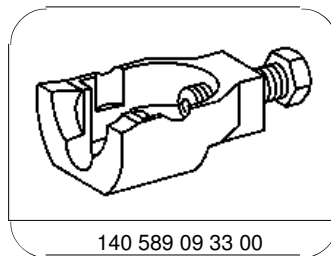
**Nm** Tie rod

| Number             | Designation                                   | Stage 1 | Nm | Model 164.1/8 |
|--------------------|---|---------|----|---------------|
| BA46.40-P-1002-01K | Self-locking nut, tie rod to steering knuckle | Stage 1 | Nm | 45            |
|                    |   | Stage 2 | ∠° | 90            |



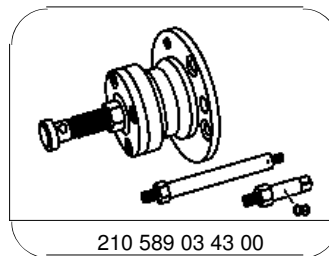
140 589 00 63 00

Thrust piece



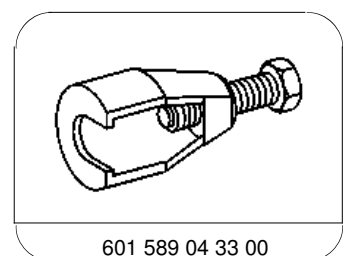
140 589 09 33 00

Puller



210 589 03 43 00

Extraction and insertion tool



601 589 04 33 00

Puller



164 589 01 37 00

Pliers