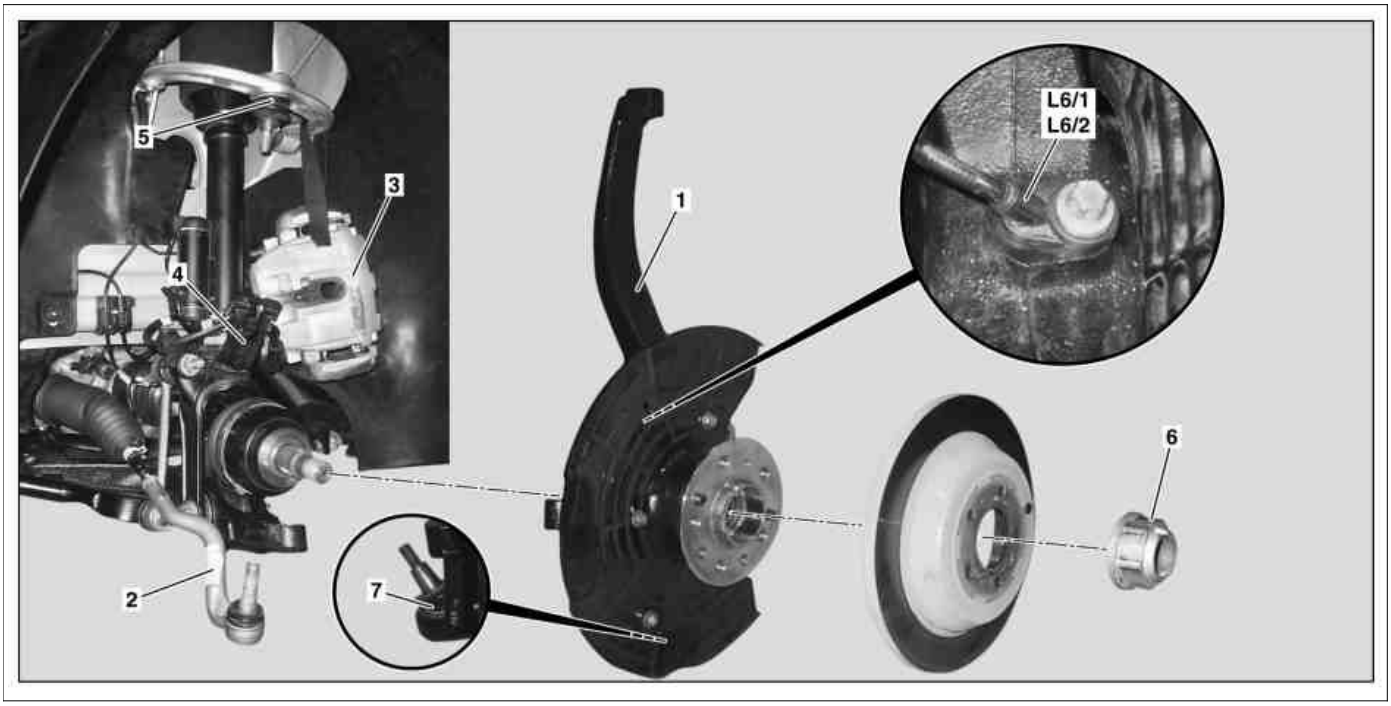
Model **164, 166, 292**



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Shown on model 164

1	*Steering knuckle*	*4*	*Bracket*	*7*	*Supporting joint*
2	*Tie rod*	*5*	*Follower joint*	*L6/1*	*Left front rpm sensor*
3	*Brake caliper*	*6*	*Collar nut*	*L6/2*	*Right front rpm sensor*

⚠ **Danger !**	**Risk of death** caused by vehicle slipping or toppling off of the lifting platform.	Align vehicle between vehicle lift columns and position the four support plates at the vehicle lift support points specified by the vehicle manufacturer.	AS00.00-Z-0010-01A
⚠ **Danger !**	**Risk of injury** caused by pinching or crushing when working on springs or spring bodies that are under tension	Use only approved tensioning devices; additionally screen off hazardous area if necessary. Check special tools for damage and proper operation (visual inspection). Wear protective gloves.	AS00.00-Z-0001-01A
⚠ **Danger !**	**Risk of injury**. Moving parts can pinch, crush or, in extreme cases even sever extremities.	No parts of the body or limbs should be within the operating area of mechanical components when moving components.	AS00.00-Z-0009-01A
⚠ **Danger !**	**Risk of death** 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 **not** 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
	Notes on AIRmatic		AH32.22-P-1000-02GZ
	Remove/install		
1	Hoist vehicle with lifting platform until wheels are free		AR00.60-P-1000GZ
2 AD	Empty AIRmatic using diagnostic system	Model 164, 166, 292 with code 489 (AIRMATIC)	AD00.00-P-2000-04A

		AIRmatic must be emptied and filled as per the specifications; the complete wheels must not be touching the ground. The air springs can otherwise be damaged and fail later.	
3	Switch on ignition and store transmitter key outside of transmission range (min. 2 m)		
4	Remove brake disk		AR42.10-P-0220GZ
5	Detach left front rpm sensor (L6/1) and right front rpm sensor (L6/2) from steering knuckle (1) and place to one side	Nm Self-locking bolt, rpm sensor on front axle to steering knuckle	*BA42.30-P-1001-01G
6	Detach bracket (4) from steering knuckle (1) and place to one side	Model 164 **Installation:** The installation position must be noted and the cable tie replaced. Pliers	*164589013700
7	Detach tie rod (2) from steering knuckle (1)	Model 166, 292 Model 164 Nm Self-locking nut, tie rod to steering knuckle	AR46.40-P-0200EW AR46.40-P-0200-02GZ *BA46.40-P-1002-01K
8	Unscrew nut of torsion bar linkage from steering knuckle (1)	Model 166, 292 Nm Nut, link rod to steering knuckle	*BA32.20-P-1003-02Q
9	Unscrew collar nut (6) from front axle shaft	Nm Model 164.1 Model 164.8Collar nut, front axle shaft to front axle shaft flange Nm Model 166, 292Collar nut, front axle shaft to front axle shaft flange	*BA33.30-P-1001-02D *BA33.30-P-1001-02I
10	Push front axle shaft out of wheel hub	Extraction and insertion tool	*210589034300
11	Unscrew nut from upper ball joint (5)	Nm Model 164.1/8Self-locking nut, upper ball joint out of upper transverse control arm to steering knuckle Nm Model 166, 292Self-locking nut, upper ball joint out of upper transverse control arm to steering knuckle	*BA33.20-P-1001-01J *BA33.20-P-1001-01R
12	Press upper ball joint (5) out of steering knuckle (1)	The supporting ball joint must be secured against dropping down. Thrust piece Puller Press	*140589006300 *221589003300 *163589034300
13	Unscrew nut from supporting joint (7) and remove steering knuckle (1)	Nm Model 164.1/8Self-locking nut, supporting joint to lower transverse control arm Nm Model 166, 292Self-locking nut, supporting joint to lower transverse control arm	*BA33.20-P-1003-01J *BA33.20-P-1003-01R
14	Inspect follower joint (5)		AR33.20-P-0426GZ
15	Install in the reverse order		

Nm Front axle torsion bar

Number	Designation		Model 166 except code 468 (ACTIVE CURVE SYSTEM)	Model 166 with code 468 (ACTIVE CURVE SYSTEM)
BA32.20-P-1003-02Q	Nut, link rod to steering knuckle	Nm	65	65

Nm Front axle torsion bar

Number	Designation		Model 292 except code 468 (ACTIVE CURVE SYSTEM)	Model 292 with code 468 (ACTIVE CURVE SYSTEM)
BA32.20-P-1003-02Q	Nut, link rod to steering knuckle	Nm	65	65

Nm Wheel control, hub

Number	Designation	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 Wheel control, hub

Number	Designation			Model 166	Model 292
BA33.20-P-1001-01R	Self-locking nut, upper ball joint out of upper transverse control arm to steering knuckle	Stage 1	Nm	100	100
		Stage 2	∡°	45	45

Nm Wheel control, hub

Number	Designation		Model 164.1/8
BA33.20-P-1003-01J	Self-locking nut, supporting joint to lower transverse control arm	Nm	230

Nm Wheel control, hub

Number	Designation			Model 166	Model 292
BA33.20-P-1003-01R	Self-locking nut, supporting joint to lower transverse control arm	Stage 1	Nm	80	80
		Stage 2	∡°	90	90

Nm Front axle shaft

Number	Designation			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 Front axle shaft

Number	Designation				Model 166	Model 292
BA33.30-P-1001-02I	Collar nut, front axle shaft to front axle shaft flange	Stage 1		Nm	250	250
		Stage 2	Loosen	∡°	180	180
		Stage 3		Nm	200	200
		Stage 4		∡°	30	30

Nm Front axle rpm sensor

Number	Designation		Model 164.1/8	Model 166
BA42.30-P-1001-01G	Self-locking bolt, rpm sensor on front axle to steering knuckle	Nm	8	8

Nm Front axle rpm sensor

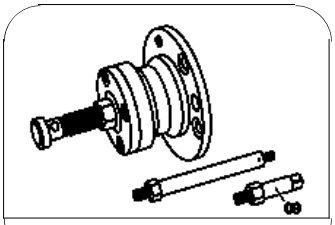
Number	Designation		Model 292
BA42.30-P-1001-01G	Self-locking bolt, rpm sensor on front axle to steering knuckle	Nm	10

Nm Tie rod

Number	Designation			Model 164.1/8	Model 166
BA46.40-P-1002-01K	Self-locking nut, tie rod to steering knuckle	Stage 1	Nm	45	90
		Stage 2	∡°	90	90

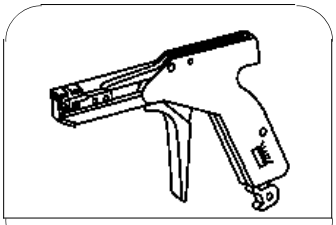
Nm Tie rod

Number	Designation			Model 292
BA46.40-P-1002-01K	Self-locking nut, tie rod to steering knuckle	Stage 1	Nm	90
		Stage 2	∡°	90



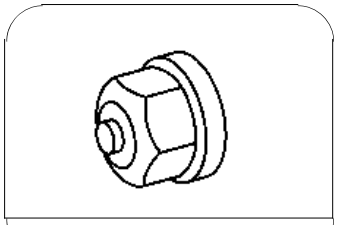
210 589 03 43 00

Extraction and insertion tool



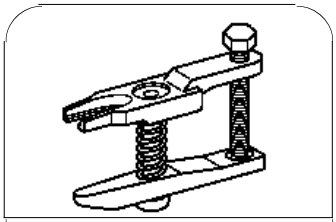
164 589 01 37 00

Pliers



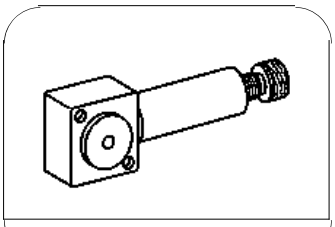
140 589 00 63 00

Thrust piece



221 589 00 33 00

Puller



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Press