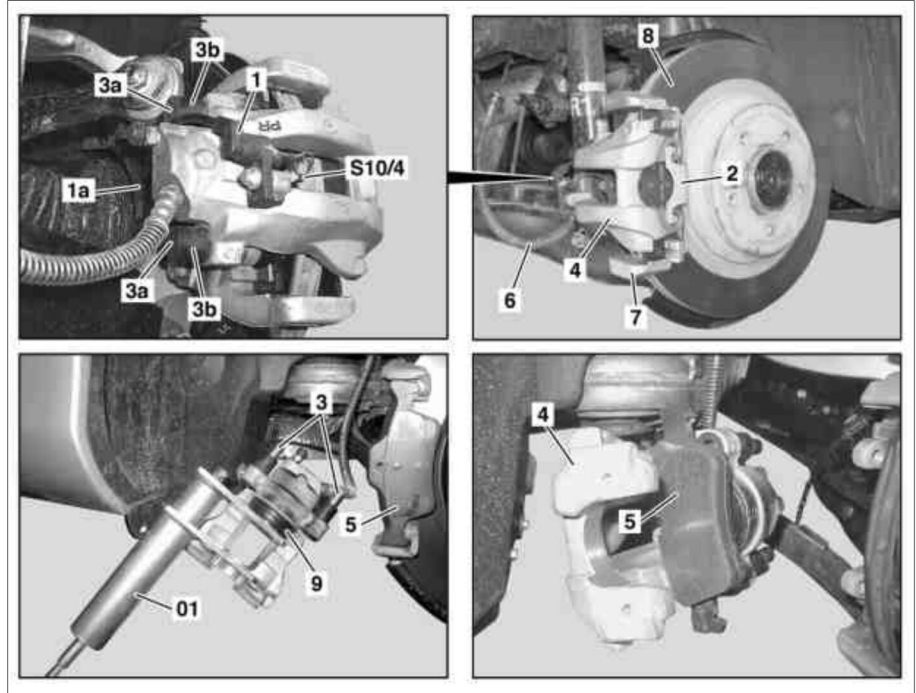


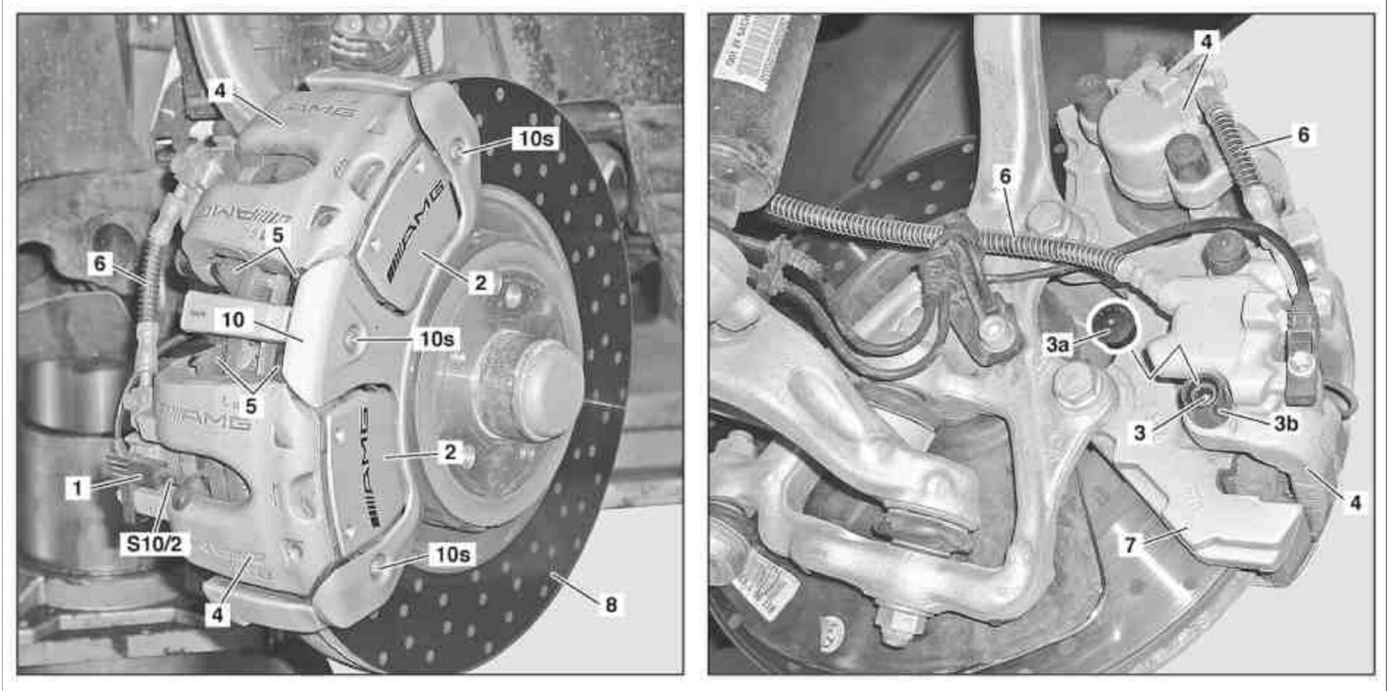
Shows model 221.071

- 01 ● pusher tool
- 1 Electrical feed line
- 1a Cable duct
- 2 Spring steel sheet
- 3 Guide bolts
- 3a Protective cap
- 3b Boot
- 4 Brake caliper
- 5 Brake pad
- 6 Brake hose
- 7 Caliper support
- 8 Brake disk
- 9 Dust boot

S10/4 Right rear brake pad contact sensor



P42.10-2530-06



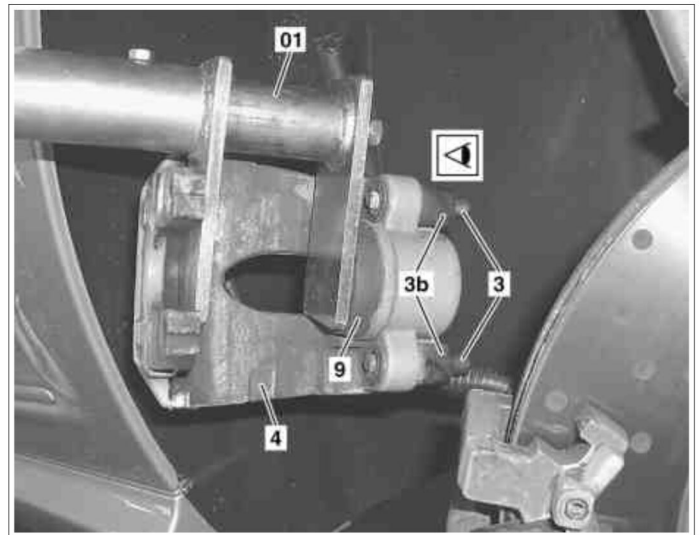
P42.10-2588-09

Shown on model 221.177, front axle

- | | | |
|------------------------|-------------------|--|
| 1 Electrical feed line | 4 Brake caliper | 10 Cover panel |
| 2 Spring steel sheet | 5 Brake pad | 10 s Screw |
| 3 Guide bolts | 6 Brake hose | |
| 3a Protective cap | 7 Caliper support | S10/2 Right front brake pad contact sensor |
| 3b Boot | 8 Brake disk | |

Shown on model 221.056, rear axle

- 01 ● pusher tool
- 3 Guide bolts
- 3b Boot
- 4 Brake caliper
- 9 Dust boot



P42.10-2590-11

Modification notes

1.9.10	"Perform brake test on test bench" reference changed	Test sequence augmented/revised	
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	Remove/install		
Danger!	Risk of poisoning caused by swallowing brake fluid. Risk of injury caused by brake fluid coming into contact with skin and eyes.	Only pour brake fluid into suitable and appropriately marked containers. Wear protective clothing and eye protection when handling brake fluid.	AS42.50-Z-0001-01A
Danger!	Risk of injury to skin and eyes caused by handling hot or glowing objects.	Wear safety gloves, protective clothing and safety glasses, if necessary.	AS00.00-Z-0002-01A
1	Ensure vehicle idle (bus idle)	Model 221.095 / 195	AR54.10-P-2000-01SX
2	Unscrew cap of brake fluid reservoir and extract some brake fluid	⌘ In order to prevent the brake fluid reservoir from overflowing when pressing back the brake pistons.	AH42.50-P-0001-01A AH42.00-P-0003-01A
	Brake fluid notes		
	Notes on repairs to brake system		
3	Remove wheels		AP40.10-P-4050SX
4	Remove bolts (10s) and remove cover panel (10)	Model 216.374 /377 /379, 221.074 /077 /174 /177 /179 on front axle ⌘ Installation: Replace bolts (10s). Coat ATE brake cylinder paste lightly on the contact surfaces of the bolt heads. Do not grease the thread Wipe off excess brake cylinder paste after tightening the bolts (10s). ATE brake cylinder paste	*BR00.45-Z-1078-06A
5	Separate brake pad contact sensor (S10/2, S10/4) from electrical feed line (1)	When removing the brake pads (5) on the right-hand side of the vehicle	
6	Unclip the electrical feed line (1) from the cable retainer (1a) on the wheel carrier	When removing the brake pads (5) from the rear axle on the right-hand side of the vehicle	
7	Pry off spring steel sheet (2) and remove		
8	Pry off and remove protective caps (3a) from boots (3b)		
9	Remove guide pin (3)	■ ■	*BA42.10-P-1003-12M *BA42.10-P-1004-10M
10	Remove brake caliper (4)	Do not subject brake hoses (6) to tensile loads or kink. Attach brake caliper (4) without tension to vehicle to relieve load on brake hose (6), otherwise the brake hose (6) will be damaged. ⌘ Do not detach brake hoses (6).	
11	Take out brake pads (5)	⌘ Brake pads (5) are to be disposed of as special waste. The local authorities can provide information regarding whether disposal is also permitted as industrial waste similar to domestic waste.	

		<p>⌘ Only complete sets of brake pads (5) approved by Mercedes-Benz may be installed.</p> <p>⌘ Installation: Insert inner brake pad (5) with riveted-on spring in brake piston. Vehicles without engine 156 /157 at rear axle: Slide outer brake pad (5) into brake caliper support (7) and install brake caliper (4). Vehicles with engine 156 / 157, at the rear axle: Insert outer brake pad (5) with spring riveted on into brake caliper (4) and mount brake caliper (4).</p>	
12	<p>Pull brake pad contact sensor (S10/2, S10/4) out of the pad backing plate of the brake pad (5)</p> <p>□ Notes on installing brake wear indicator contact sensors</p>	<p>When removing the brake pads (5) on the right-hand side of the vehicle</p> <p>⌘ Installation: Replace defective brake pad contact sensor (S10/2, S10/4).</p>	AH42.10-P-0003-01A
↳	Checking		
13	<p>Check brake pads (5) and brake disks (8)</p> <p>Check brake lining thickness Inspect condition of brake disks</p>	<p>⌘ Replace brake pads (5) and brake disks (8) in complete sets if necessary.</p>	<p>AP42.10-P-4253A AP42.10-P-4258SX</p>
14	Check brake caliper (4) for leaks	<p>⌘ In the event of leaks: ↓ Replace rear axle brake caliper.</p> <p>Install new front axle brake caliper.</p>	<p>AR42.10-P-0080SX AR42.10-P-0070SX</p>
15	Check dust boot (9) on brake piston for damage	<p>⌘ If dust boot (9) is damaged: ↓ Replace rear axle brake caliper.</p> <p>Install new front axle brake caliper.</p>	<p>AR42.10-P-0080SX AR42.10-P-0070SX</p>
16	Press back brake piston using ● pusher tool (01)	<p>⌘ If the brake piston is difficult to move: ↓ Replace rear axle brake caliper.</p> <p>Install new front axle brake caliper.</p> <p>●</p>	<p>AR42.10-P-0080SX AR42.10-P-0070SX *000589524300</p>
○	Clean		
17	Clean contact surfaces of brake pads (5) on brake caliper (4) and brake caliper support (7) using rags	<p>□ Do not damage dust boot (9) in the process. Do not use sharp-edged or pointed tools, otherwise the brake caliper (4) or brake caliper support (7) will be damaged. Cleaner from package</p>	*BR00.45-Z-1028-04A
18	Coat brake paste	<p>All models except model 216.374 /377 /379, 221.074 /077 /174 /177 /179</p> <p>□ Only use the brake pastes listed in the linked description, and apply it solely at the specified positions, otherwise there may be problems with noise or damage to the brake system! MB brake paste Molykote (copper colored) MB Plastilube brake paste (brownish) Model 216.374 /377 /379, 221.074 /077 /174 /177 /179: Use ATE Plastilube paste only on the front and rear axles. ATE brake pad paste (ATE Plastilube)</p>	<p>AR42.10-P-0161-01B *BR00.45-Z-1057-06A *BR00.45-Z-1084-06A *BR00.45-Z-1054-06A</p>
19	Install in the reverse order		
⚠ Danger!	<p>Risk of accident when commissioning the vehicle due to a lack of braking effect when the service brake is operated for the first time after repair work</p> <p>Push down brake pedal several times</p>	<p>Before starting engine, actuate brake pedal several times until the pressure is built up and maintained in the brake system.</p> <p>Model 221.095 /195: Fully depress brake pedal 10-times in quick succession. Model 216, 221, except 221.095 / 195: Depress brake pedal several times until a firm resistance is noticeable.</p>	AS42.50-Z-0002-01A
20			
21	Check fluid level in the brake fluid reservoir, correct if necessary		AP42.10-P-4210SX

⚠ Danger! 22	Risk of death caused by limbs being caught or crushed by rotating parts when performing tests on the brake test stand	Never leave the vehicle unattended on the rollers except in an emergency. Ensure that no one is under the vehicle or near rotating parts during testing. In case of emergency, use the EMERGENCY STOP switch to shut down test stand.	AS42.00-Z-0001-01A
	Carry out brake test on the test stand		AP42.00-P-4290BA

■ Front axle brake caliper

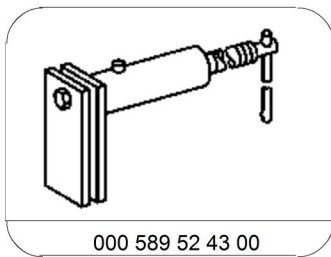
Number	Designation	Model 216 except model 216.374/377/379	Model 216.374/377/379
BA42.10-P-1004-10M	Guide pin, brake caliper to brake caliper support	Nm	28

■ Front axle brake caliper

Number	Designation	Model 221 except model 221.074/077/174/ 177/179	Model 221.074/077/174/ 177/179
BA42.10-P-1004-10M	Guide pin, brake caliper to brake caliper support	Nm	28

■ Rear axle brake caliper

Number	Designation	Model 216 except 216.374/ 377/379	Model 216.374/ 377/379	Model 221 except model 221.074/ 077/174/ 177/179	Model 221.074/ 077/174/ 177/179
BA42.10-P-1003-12M	Guide pin on caliper support	Nm	28	28	28



Pusher tool

Repair materials

Number	Designation	Order number
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BR00.45-Z-1028-04A	Cleaner from package	Adolf Würth GmbH & Co. KG Reinhold-Würth-Str. 12-17 74653 Künzelsau-Gaisbach Germany Tel. +49 7940 15-0 Fax +49 7940 15-1000 www.wuerth.de
BR00.45-Z-1054-06A	ATE brake pad paste (ATE Plastilube) Article number: 03.9902-1001.2 (35 ml) Article number: 03.9902-1002.2 (75 ml)	Continental Teves AG & Co. oHG Guerickestr. 7 60488 Frankfurt Germany Tel. +49 69 7603-1 Fax +49 69 761061 www.conti-online.com
BR00.45-Z-1057-06A	MB brake paste Molykote (copper colored)	A 001 989 87 51
BR00.45-Z-1078-06A	ATE brake cylinder paste 188 ml. Article no.: 03.9902-0501.2	Continental Teves AG & Co. oHG Guerickestr. 7 60488 Frankfurt Germany Tel. +49 69 7603-1 Fax +49 69 761061 www.conti-online.com
BR00.45-Z-1084-06A	MB Plastilube brake paste (brownish)	A 002 989 37 51