

**Important
instructions
Please read
before fitting**



Handbrake Calipers

Removing the Old Caliper

Remove the road wheel. Clamp off the flexible brake hose and unscrew hydraulic connection from the caliper. Disconnect friction pas wear sensor wires. (If fitted)

Extract retaining clips, pins or strings as applicable and remove the friction pads. (Please note their positions before extracting)

Remove the caliper from its mounting.

Examine the flexible brake hoses and metal brake pipes for deterioration or corrosion. Rectify as necessary.

Before fitting a new caliper, ensure the disc does not exceed its wear limits.

Clamp the brake hose before removing the old caliper.

Fitting new Caliper

When fitting the new caliper, clean carriers thoroughly and grease pads lightly where they contact the carriers to ensure free pad movement. Do not apply on the piston side of the pad. (Use heat resisting grease)

Clean guide pins and sockets. Apply the silicon grease to the pins, making sure they move freely in the sockets.

Examine the flexible brake hoses and metal brake pipes for deterioration or corrosion. Rectify as necessary. Attach to the caliper & fit the caliper over the pads check play is less than 1mm by moving it back and forth. If play exceeds 1mm then follow below steps according to type of Caliper.

For Bosch, Lucas, Bendix and Akebono remove the caliper from the carrier. Use the appropriate tool to apply slight pressure to the piston and wind clockwise to increase play, counter clockwise to reduce it until play is just below 1mm.

Some calipers must be adjusted counter clockwise to increase play, clockwise to reduce. If piston has been adjusted inwards, adjust it out ½ turn to activate the self-adjustment mechanism. Make sure the disc runs freely, and remount caliper on carrier.

For ATE & NBK Type Calipers

Remove bolt at rear of caliper and turn internal adjuster clockwise to reduce play. Check the disc runs freely if not turn adjuster counter clockwise. If you have adjusted counter clockwise, turn the adjuster clockwise to push out the piston slightly and to activate the self-adjustment mechanism..

Bleed the caliper. Attach cables as appropriate, checking they move freely. Adjust cables to remove slack, but ensure the lever on the caliper can retract to the stop. Sticking cables can damage calipers, discs and pads, so if in doubt, replace.

To activate self-adjustment, apply pressure on pedal, and operate the handbrake several times until the right/left calipers work evenly.

Reconnect the hydraulic pipe. Care must be taken not to over tighten the hydraulic connection.

Examine the friction pads and renew if necessary.

Note: All four friction pads (both sides of vehicle) must be renewed to ensure even braking.

Fit pads to the new caliper reconnecting any wear sensor wires.

Release the hose clamp and thoroughly bleed the hydraulic system with fluid recommended by the vehicle manufacturer. Apply pedal pressure to push out pistons. Re-check fluid level in master cylinder and top up if necessary. Replace the road wheel and wheel nuts. Remove the axle stands/blocks etc., release the jack to lower the car gently to the ground. Finally fully tighten the wheel nuts using the brace supplied with the vehicle.

Recommended tightening torques

Over tightening brake hose connections will cause damage to hydraulic assemblies. Great care must be taken while tightening the other components such as tube nuts, banjo bolts, bleed screws, etc.

Unified	Threads	Ibf	Nm
1/4"	Bleed Screws	50	5.6
3/8"	Bleed Screws	100	11.3
3/8"	Int & Ext Tube Nuts	115	13.0
3/8"	Hose Fittings	120	13.5
3/8"	Banjo Bolts	170	19.2
7/16"	Bleed Screws	170	19.2
7/16"	Int Tube Nuts	140	15.8
7/16"	Hose Fittings	170	19.2
Metric	Threads	Ibf	Nm
7mm	Bleed Screws	55	6.2
10mm	Bleed Screws	90	10.1
10mm	Int Tube Nuts	97	11.0
10mm	Hose Fittings	142	16.0
10mm	Banjo Bolts	250	28.0
12mm	Bleed Screws	160	18.0
12mm	Int & Ext Tube Nuts	210	24.0
12mm	Hose Fittings	160	18.0
12mm	Banjo Bolts	350	40.0

We have produced these fitting instructions as a helpful guide. Whilst every care has been taken in the compilation of these instructions no liability can be accepted for any loss, damage or injury caused by any errors, omissions or interpretation of the information provided.