

# MGB Front Brakes

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The MGB uses a traditional front disc braking arrangement. Symptoms of trouble include poor braking, vibration, or a soft brake pedal.

Installing new disc brake rotors is a straightforward job, the results of which will be immediately apparent.

Cars with thin, badly corroded rotors don't usually stop very well! Not many things are more unpleasant than bearing up on someone's rear bumper with that sinking feeling that you won't be able to stop in time!

The brake rotors are fairly thin, even when new. Cars that sit all winter in a damp location may have rotors that are badly rusted. Since the rotors can only be resurfaced a couple of times at most, it is often advisable to install new rotors when servicing the brakes.



This badly rusted rotor is actually fairly typical! It's become too thin to use safely and is probably warped as well.

## Brake Rotor Replacement

After jacking the car up and properly supporting it on jack stands, remove the front wheels. Unbolt the brake calipers and slide them up off the rotors.

Carefully hang the calipers up with pieces of wire. This must be done so that there is **NO STRAIN** on the brake hoses. The calipers must not be allowed to hang by their hoses!

Pry off the grease cap. Water pump pliers are a better choice for this than a hammer & chisel. Gently rocking back and forth with the pliers will usually "persuade" the cap to come off. This sure beats smashing the Hell out of it with your hammer!



Straighten out the bent-over end of the cotter pin and pull it out.

The nut and its special keyed washer can now be removed.

This photo shows the hub after being pulled off the stub axle.

The outer bearing has also been removed.

You can see the top face of the bearing spacer and one of the adjusting shims.

Shims are used in the MGB front hub to control end float. If you are only going to replace the brake rotors, chances are that you will be able to reassemble everything without needing to do any reshimming of the hub bearings.



There are four nuts and bolts that secure the brake rotor to the hub. They can most easily be removed with an air impact gun, though a pair of socket wrenches will suffice if need be!



After removing the old rotor, carefully clean the hub. The bottom hub face where the rotor is mounted should be wire brushed or lightly sanded. This is necessary to ensure that the rotor will be concentric with the hub.

This photo HAS NOT been digitally enhanced for your viewing pleasure.

The old rotor is about half the thickness of the new one beside it!

Incidentally, new MGB rotors are 8.8 MM (.344") thick. Lockheed states the minimum thickness at 7.6MM (.297").



Always replace the hub seal when changing a brake rotor. Since everything is already apart, it just makes sense.

Quite frankly, you may as well install a wheel bearing kit (the hub seal comes in the kit), but the choice is yours.

The hub seal is easily pried out with a slot screwdriver.

This is a good opportunity to check out the wheel bearings & races.

If the races or bearings are burned, marked, or rusted, they should be replaced. The machined face where the rotor is attached must be spotlessly clean & flat. Wire brush it to remove any traces of rust.





Here the new rotor is bolted up to the hub.

Everything can now be reassembled.

After the grease cap is off, fish around in the greasy blob until you find the cotter pin, locking the stub axle nut. Straighten out the cotter and pull it out. The nut can then be unscrewed and removed. Grasp the rotor & pull it off the stub axle. Pull out the outer bearing & retaining washer. From the underside, pop out the grease seal. The inner bearing with its spacer & shims can be removed.

Next, unbolt the rotor from the hub. There are four nuts & bolts with 9/16" heads.

Discard the old rotor. The hub must now be cleaned, both inside & out.

Since it will be partially filled with messy old grease, it's easiest to clean out the biggest blob of grease with a wad of toilet paper! Following this, wash the hub thoroughly in solvent.

Check the bearing races for any wear or damage. If they aren't perfect, drift them out and install a bearing kit. Fit the new rotor and hub together. They must fit perfectly with no light visible around the joint. If they don't, the rotor will wobble while driving, and the brake pedal will oscillate while braking!

If all is well, bolt them together and tighten up.

Repack and install the bearings. The hub assembly can now be mounted on the stub axle and the bearings adjusted.

Reinstall the caliper and carefully recheck your work! Install the wheel(s) and do a careful testdrive.

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