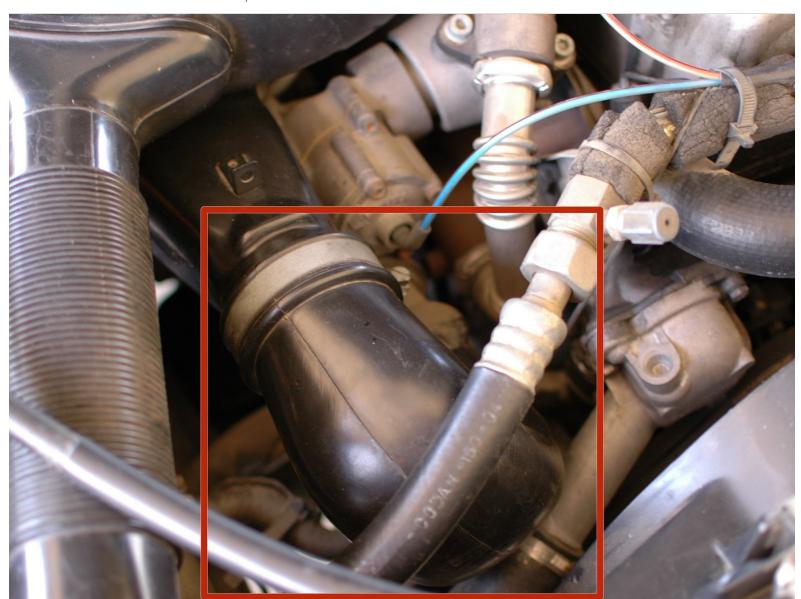


# Mercedes W123 Turbo Elbow Seals Replacement

To get air from the air cleaner housing to the turbo, Mercedes installed a plastic elbow in between. This is sealed at both end with rubber seals. Check to see that yours are installed properly and are not dry and brittle.

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#### INTRODUCTION

The seals on the turbo elbow are designed to keep unfiltered air from being sucked directly in to your turbo.

The top seal is renowned for being difficult to install and even seasoned mechanics install it in such a way that reduces its effectiveness. Replace yours, and install it properly!

Also, the lower seal on the turbo is prone to premature again due to exposure to heat from the turbo. It will dry out and become brittle, sealing less effectively.

In either case you could be letting unfiltered air reach your turbo. Help keep your turbo alive a lot longer by replacing these seals. Learn a few tricks, too, to make it easier.



#### **TOOLS:**

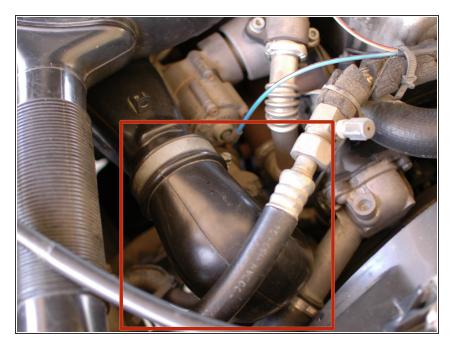
- Socket 10mm (1)
- Socket Wrench (1)
- Large Needle Nose Pliers (1)



#### **PARTS:**

- W123 Upper Turbo Elbow Seal (1)
- W123 Lower Turbo Elbow Seal (1)

# Step 1 — Turbo Elbow Seals



- Open your hood.
- Find the turbo elbow, just in front of the air filter housing, attached to its lower outlet.



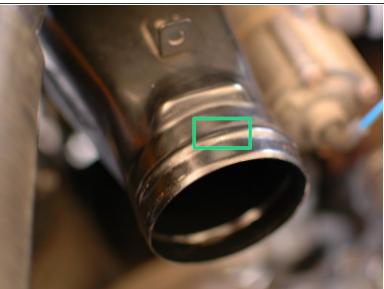


- Use a 10mm socket and ratcheting wrench to loosen the clamp on the top portion of the turbo elbow.
- Then repeat this on the lower clamp.



- The turbo elbow can now be pulled off.
- Start by inspecting the upper seal. As you can see, this one was installed improperly. It was pushed back in to the elbow during installation. This is typical, and due to a Mercedes design issue.





- Allow a brief discussion of the design issue...
- The seal for the upper elbow has a groove built in to it.
- The neck on the air filter housing where this seal goes has a matching ridge.
- This prevents the new seal from easily slipping on to the neck and it often gets pushed back in to the elbow, preventing a proper seal.
- A potential fix for this will be addressed later in the guide.



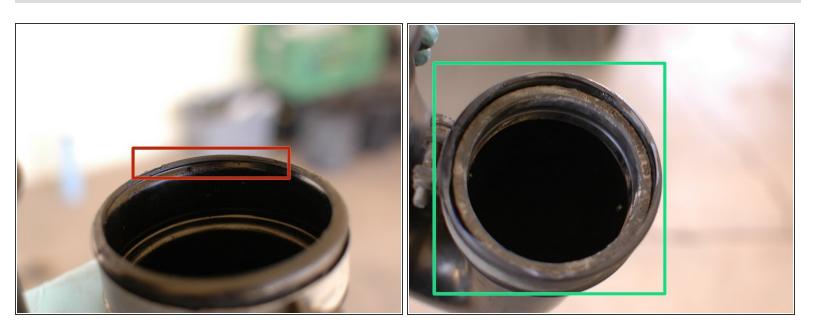
- Remove the upper seal now. Needle nose pliers work well for this.
- As you can see, the old seal was deformed due to its improper installation.







- Now remove the lower elbow seal.
- The old one on this car was so old and brittle it would not bend for removal. It had to be broken in half using a needle nose pliers.
- Notice that the unbroken side of the old seal shows visible cracks when squeezed.
- Compare this with the new seal.



- Now it's time to install the new seals.
- One trick that seems to work to make the upper seal easier to install is to cut off the raised lip on the upper elbow. This lip seems to be of dubious value, and causes a lot of trouble.
- It can be cut off with a sharp razor blade, though be careful when doing this.
- As you can see, after modification the new upper seal sits in the upper end of the elbow easily. It will still seal well when clamped down as the lip is not part of the sealing surface.





- Now install the new lower elbow seal.
- It needs to be squeezed to fit it in to the opening on the elbow to get it past the lip.
- This end is much easier to install on the turbo since the seal and turbo inlet are both smooth.



- It's now time to re-install the elbow. It should simply push on. It can help to leave a bit of the upper seal showing out of the end of the upper elbow end as you slip it on.
- Now just tighten down the clamps and you're ready to roll!

To reassemble your device, follow these instructions in reverse order.