

Audi B9 A4 Transmission Mount Bushing Insert Kit Installation

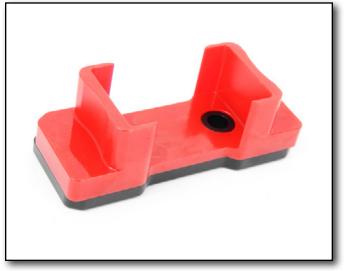
















INTRODUCTION

Audi B9 A4 Transmission Mount Bushing Insert Kit

Today we are going to install our ECS Tuning Transmission Mount Insert Kit into our Audi B9 A4. The stock transmission mount on your vehicle was designed with rather large voids in the rubber damper, and while this provides superior ride comfort to you in the cabin, it also allows an excessive amount of transmission movement under a load such as acceleration or deceleration. The ECS Tuning Transmission Mount Insert Kit has been designed to fill the voids in the stock transmission mount without adding harsh vibrations or noise into the cabin.

ECS Difficulty Gauge



2 - Moderate

Advanced - 3

Installing this Transmission Mount Insert Kit on your vehicle will limit unwanted transmission movement, resulting in crisper shifts and a smoother driving experience. This kit is extremely easy to install, only requiring a few basic tools. Read these instructions completely first, and with the project overview under your belt you'll breeze right through this install. Just to make sure you have everything you need, reference the required tool list on Page 5 before you begin. Thank you for looking to ECS Tuning for all your performance and repair needs, we appreciate your business!



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KIT CONTENTS



ECS Trans Mount Insert (1)



Poly Grease (1)



ECS Trans Mount Plate (1)



M8 x 60mm Bolts (2)



REQUIRED TOOLS

Note: The tools required for each step will be listed by the step number throughout these instructions.

Standard Automotive Tools

Required For This Install

Available On Our Website

| D C . l (6 . l) | 1/11 - 1 - 1 - 1 |
|---|--|
| Protecta-Sockets (for lug nuts) <u>ES#2221243</u> | • ¼" Drive Ratchet <u>ES#2823235</u> |
| • 3/8" Drive Ratchet <u>ES#2765902</u> | • ¹ / ₄ " Drive Deep and Shallow Sockets <u>ES#2823235</u> |
| • 3/8" Drive Torque Wrench <u>ES#2221245</u> | • ¹ / ₄ " Drive Extensions <u>ES#2823235</u> |
| • 3/8" Drive Deep and Shallow Sockets <u>ES#2763772</u> | • Plier and Cutter Set <u>ES#2804496</u> |
| • 3/8" Drive Extensions <u>ES#2804822</u> | Flat and Phillips Screwdrivers <u>ES#2225921</u> |
| Hydraulic Floor Jack ES#2834951 | • Jack StandsES#2763355 |
| • Torx Drivers and Sockets <u>ES#11417/8</u> | Ball Pein Hammers |
| •½" Drive Deep and Shallow Sockets <u>ES#2839106</u> | • Pry Bar Set <u>ES#1899378</u> |
| • ½" Drive Ratchet | Electric/Cordless Drill |
| • ½" Drive Extensions | Wire Strippers/Crimpers |
| • ½" Drive Torque Wrench ES#2221244 | • Drill Bits |
| • ½" Drive Breaker Bar <u>ES#2776653</u> | Punch and Chisel Set |
| Bench Mounted Vise | Hex Bit (Allen) Wrenches and Sockets <u>ES#11420</u> |
| Crows Foot Wrenches | Thread Repair Tools <u>ES#1306824</u> |
| Hook and Pick Tool Set <u>ES#2778980</u> | Open/Boxed End Wrench Set <u>ES#2765907</u> |

Specialty Tools

• Triple Square Socket Set <u>ES#9011</u>



SHOP SUPPLIES AND MATERIALS

Standard Shop Supply Recommendations: We recommend that you have a standard inventory of automotive shop supplies before beginning this or any automotive repair procedure. The following list outlines the basic shop supplies that we like to keep on hand. Shop supplies with a hyperlink are available on our website.

- Hand Cleaner/Degreaser Click Here
- Pig Mats for protecting your garage floor and work area from spills and stains Click Here
- Spray detailer for rapid cleaning of anything that comes into contact with your paint such as brake fluid Click Here
- Micro Fiber Towels for cleaning the paint on your car Click Here
- Latex Gloves for the extra oily and dirty jobs Click Here
- Medium and High Strength Loctite Thread lock compound to prevent bolts from backing out Click Here
- Anti-Seize Compound to prevent seizing, galling, and corrosion of fasteners Click Here
- Aerosol Brake/Parts Cleaner for cleaning and degreasing parts
- Shop Rags used for wiping hands, tools, and parts
- Penetrating oil for helping to free rusted or stuck bolts and nuts
- Mechanics wire for securing components out of the way
- Silicone spray lube for rubber components such as exhaust hangers
- Paint Marker for marking installation positions or bolts during a torquing sequence
- Plastic Wire Ties/Zip Ties for routing and securing wiring harnesses or vacuum hoses
- Electrical tape for wrapping wiring harnesses or temporary securing of small components



INSTALLATION NOTES

- **RH** refers to the *passenger side* of the vehicle.
- **LH** refers to the *driver side* of the vehicle.
- Always use the proper torque specifications.
- If applicable to this installation, torque specifications will be listed throughout the document and at the end as well.
- Please read all of these instructions and familiarize yourself with the complete process **BEFORE** you begin.

GENERAL PREPARATION AND SAFETY INFORMATION

ECS Tuning cares about your health and safety. Please read the following safety information. This information pertains to automotive service in general, and while it may not pertain to every job you do, please remember and share these important safety tips.

- Park your car in a safe, well lit, level area.
- Shut the engine off and remove the key from the ignition switch.
- Make sure any remote start devices are properly disabled.
- ALWAYS wear safety glasses.
- Make sure the parking brake is applied until the vehicle is safely lifted and supported.
- If using an automotive lift, be sure and utilize the factory specified lift points. Lifting a vehicle in an incorrect location can cause damage to the suspension/running gear.
- When lifting a vehicle using a jack, always utilize the factory specified lift points. Lifting a vehicle in an incorrect location can cause damage to the suspension/running gear. **ALWAYS** support the vehicle with jack stands.
- Always read and follow all safety information and warnings for the equipment you are using.



NEVER get underneath a vehicle that is supported only by a jack, and ALWAYS make sure that the vehicle is securely supported on jack stands.



PROJECT OVERVIEW

Let's take a moment and look at what we'll be doing to install your new transmission mount bushing insert kit:

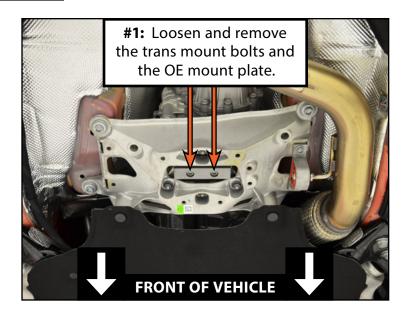
#1: With the vehicle safely supported with enough room to work underneath, remove the trans mount bolts and the OE mount plate.

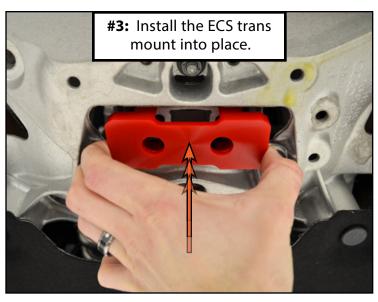
#2: Lubricate the new ECS transmission mount insert.

#3: Install the insert into the trans mount.

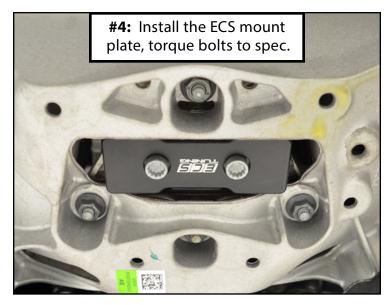
#4: Install the new ECS mount plate and torque the bolts to spec.

Now let's get to it!





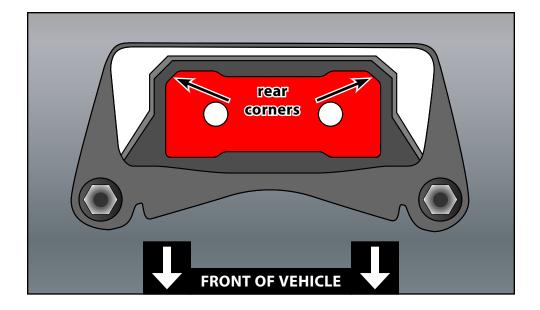




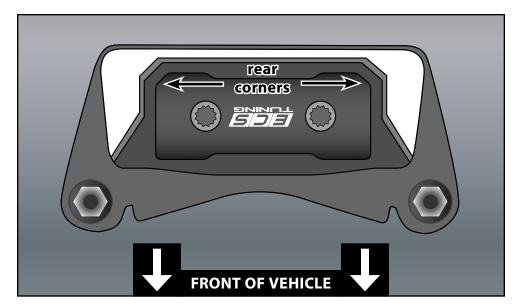


PROJECT OVERVIEW

This illustration is a representation of how the ECS polyurethane insert will fit into the stock mount (this view is from directly below the mount). Note that the rear corners on the poly insert, and the rear corners on the stock mount are both cut at an angle, it is very important that you align these corners as shown on the right.



This illustration is a representation of how the ECS mount plate will fit into the poly mount insert (this view is from directly below the mount). Note that the rear corners on the mount plate are cut at an angle just like the mount insert, it is very important that you align these corners as shown on the right.





Step 1:

Safely lift and support the vehicle. In the photo we are using an automotive lift, but safely supporting the vehicle on jack stands will give you plenty of room to work.

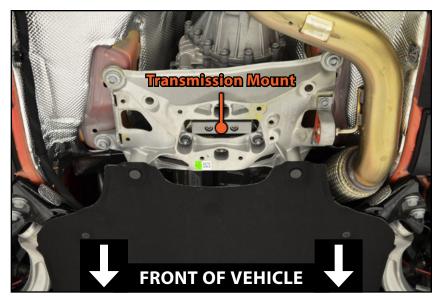


Step 2:

The transmission mount is located right in the middle of the transmission crossmember, this is what we will be upgrading today.



From this point forward, every photo of the transmission mount will be taken from behind the mount, facing towards the front of the vehicle.



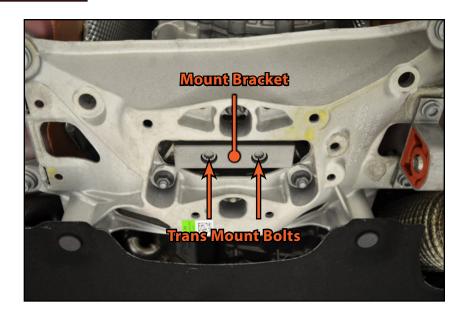


Step 3: M10 Triple Square Socket & Ratchet

Loosen and remove the two transmission mount bolts and the mount bracket which secure the transmission mount to the transmission cradle.

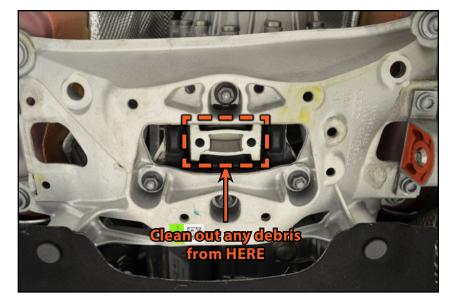


These are "Torque To Yield" bolts and MUST NOT be reused. Replacement bolts are included in the kit.



Step 4:

Inspect the gap around the stock transmission mount and clean out any dirt or debris which may be present. If the mount is cracked or worn out, it should be replaced in order to get the maximum benefit from your new mount insert kit.





Step 5:

Locate the two "ears" which protrude upwards from the base of the new transmission mount insert. Apply a light coating of the supplied polyurethane bushing grease to both "ears".



Step 6:

Slide the new ECS trans mount insert upwards into the stock transmission mount. Please take note of the shapes of both the stock mount and the new mount insert, the mount insert is designed to follow the shape of the stock mount, do not install the mount insert backwards.



For more information on how to orient the trans mount insert, as well as an illustration showing the finished product, please review the project overview on Page 9.





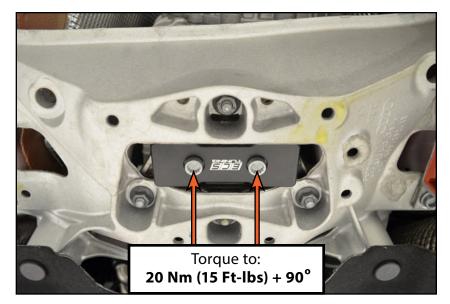
Step 7:

Insert the new mount bolts through the new ECS mount plate, then thread them into the transmission mount **BY HAND**.



Step 8: M10 Triple Square Socket & Torque Wrench, Breaker Bar

Torque the two mount bolts to 20 Nm (15 Ft-lbs), then turn them an additional 90° with a breaker bar.





TORQUING TIPS

Torque to Yield or "Stretch" Bolts

Many bolts will have a torque specification listed in the format - xx Nm (xx Ft-lbs) + xx degrees. These bolts are torque to yield bolts, commonly referred to as "stretch" bolts. The correct procedure for torquing these bolts is:

Stage One - Torque the bolt(s) to the initial Nm or Ft-lb specification. If there is more than one, be sure to torque them in the correct sequence.

Stage Two - Tighten or "stretch" the bolt(s) the additional specified number of degrees. If there is more than one, be sure to follow the correct sequence.

Note - Some bolts may have two or more stages of torquing before the final stage of "stretching" the bolts.

When tightening more than one bolt in a specified sequence, be sure to mark each fastener with paint *immediately* after performing the final stage or "stretching" of the bolts. This will ensure that you keep track of which bolts have already been "stretched".

All Torque to Yield bolts should only be used once and should be replaced each time they are removed. If they are reused, they will not be able to achieve the proper clamping force with the specified torque.

Lubrication

Torque specifications are always listed for a dry fastener (no lubrication) unless specified otherwise.

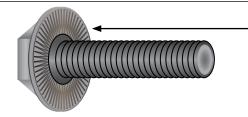
Some fasteners require lubrication on the threads -or- on the contact surface while torquing. These fasteners will be listed with the specific location and type of lubrication required. Always follow manufacturers recommendations exactly.

Lubricating a fastener that is intended to be installed dry and then torquing it to factory specifications will increase the clamping force and stress on the fastener and components, which can result in damage or failure.

Do not lubricate the threads of any fastener unless it is specifically recommended by the manufacturer.

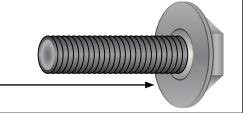
Ribbed vs. Non-Ribbed Bolts

Ribbed and Non-Ribbed bolts in the same location generally require a different torque specification.



A ribbed bolt is identified by the ribs on the contact surface

A non-ribbed bolt is identified by the smooth contact surface





SCHWABEN - BUILD THE ULTIMATE TOOL COLLECTION

At ECS Tuning, we carry a line of high quality Schwaben Tools and Equipment to help you build your ultimate tool collection. Never before has affordability and quality been so closely related. Our entire Schwaben line is subjected to strict in house testing for strength and durability. See what we have to offer and equip your garage without breaking the bank.



Your Transmission Mount Bushing Insert Kit installation is complete!



These instructions are provided as a courtesy by ECS Tuning

Proper service and repair procedures are vital to the safe, reliable operation of all motor vehicles as well as the personal safety of those performing the repairs. Standard safety procedures and precautions (including use of safety goggles and proper tools and equipment) should be followed at all times to eliminate the possibility of personal injury or improper service which could damage the vehicle or compromise its safety.

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