



Equipped with AEM® Dryflow™ Filter
No Oil Required!

INSTALLATION INSTRUCTIONS

PART NUMBER: 21-8214

2006 DODGE Ram 1500 Pickup V6-3.7L C.A.R.B. E.O. # D-670

* **NOTE:** Legal in California only for racing vehicles which may never be used upon a highway

PARTS LIST

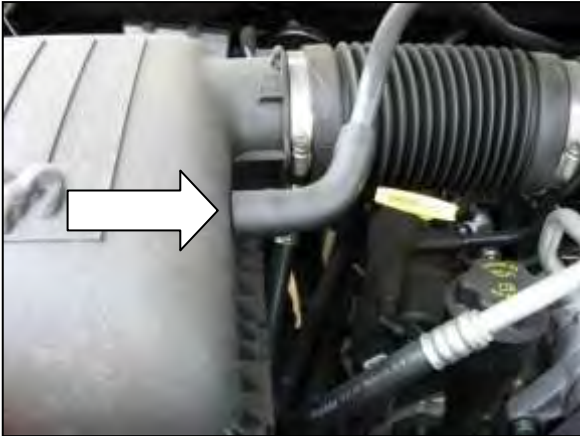
Description	Qty.	Part Number
Air Filter Assy. 3.50 X 9" Dry Ele.	1	21-2049DK
Inlet Pipe	1	2-82141
Heat Shield	1	20-8212
Hose, Adapter 3.50/3.25x2.50	1	5-352
Edge Trim, 22"	1	8-4022
Grommet, 1/2"	1	784634
Rubber Edge Trim 34"	1	8-3034
Mount, Rubber 1" X 8mm	1	1228560
Washer, 8mm Soft Mount	1	559960
Nut, M8 Hex Serrated	1	444.460.08
1/2" Bnd. Hose Clamp, 3.15"-4.00"	1	9456
1/2" Bnd. Hose Clamp, 3.31"-4.25"	2	9460
Hose Clamp, 1 1/16" Narrow	1	4093-6

Read and understand these instructions **BEFORE** attempting to install this product. Failure to follow installation instructions and not using the provided hardware may damage the intake tube, throttle body and engine.

1. Preparing Vehicle

- a. Make sure vehicle is parked on level surface.
- b. Set parking brake.
- c. If engine has run in the past two hours, let it cool down.
- d. Disconnect negative battery terminal.
- e. Do not discard stock components after removal of the factory system.

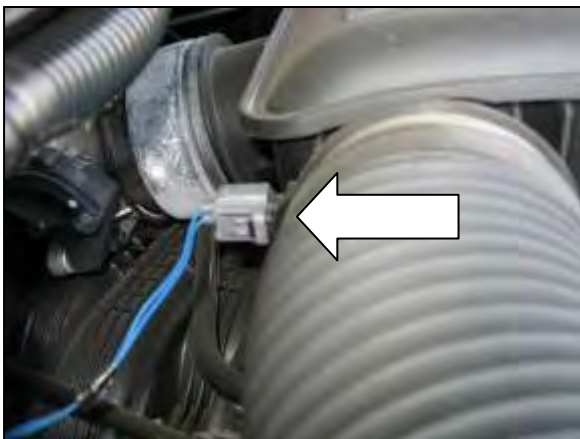
2. Removal of stock system



a. Disconnect the PCV breather hose at the air box lid.



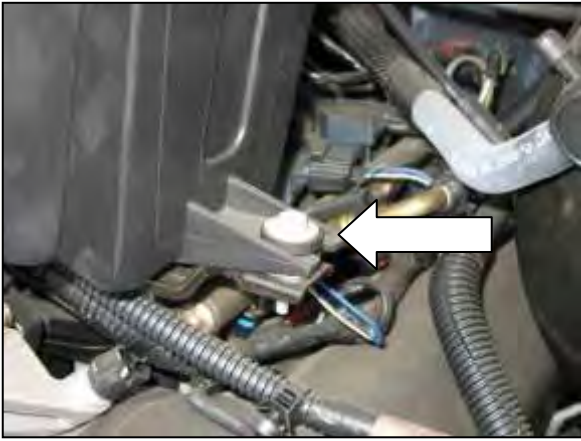
b. Loosen the hose clamp at the throttle body.



c. Disconnect the Inlet Air Temperature (IAT) sensor harness connector.



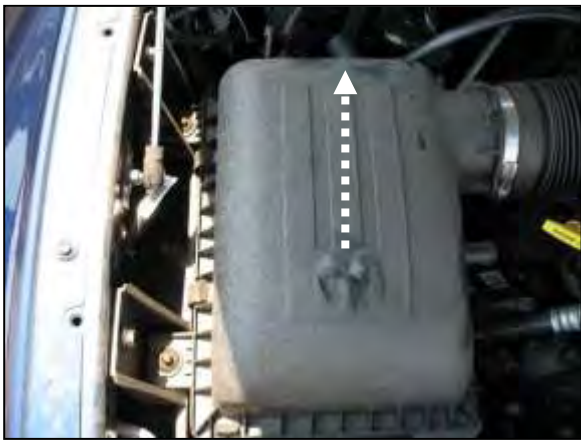
d. Loosen and remove the mounting bolt to the intake plenum.



e. Loosen and remove the remaining mounting bolt.



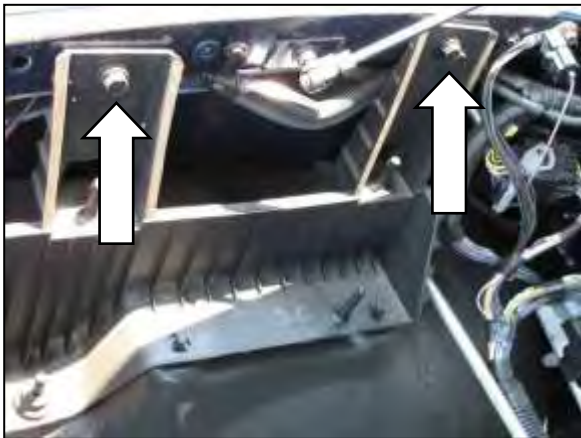
f. Loosen the hose clamp at the intake plenum.



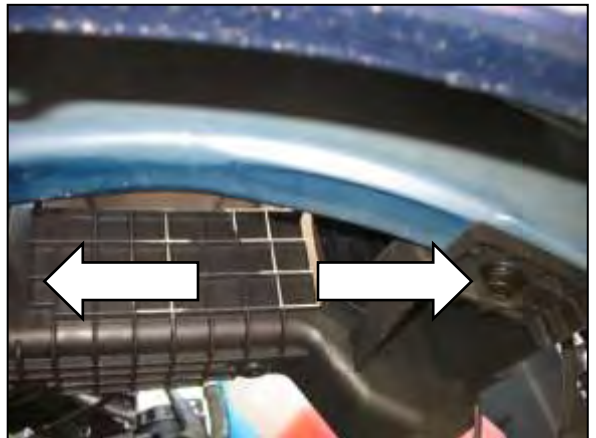
g. Pull the air box straight up along with the inlet tube. Remove the intake plenum and the coupler at the throttle body.



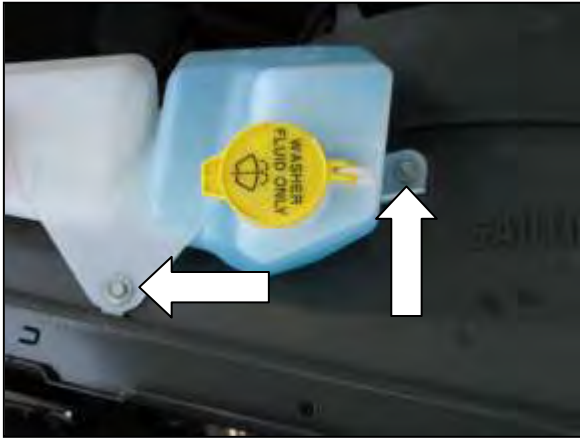
h. Remove the fender liner on the passenger side to access the air box mount.



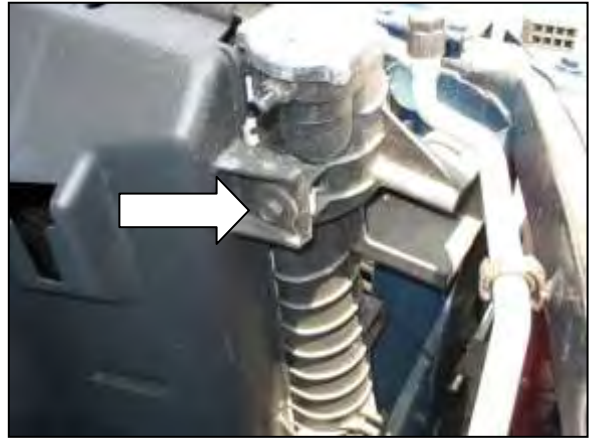
i. Loosen and remove the air box mounting bolts from the air box mount at the fender.



j. Loosen and remove the lower two remaining mounting bolts.



k. Loosen and remove washer bottle / overflow mounting bolts. Disconnect the overflow hose from the reservoir.



l. With the reservoir removed, loosen and remove the fan shroud bolt.

3. Installation of AEM® intake system.

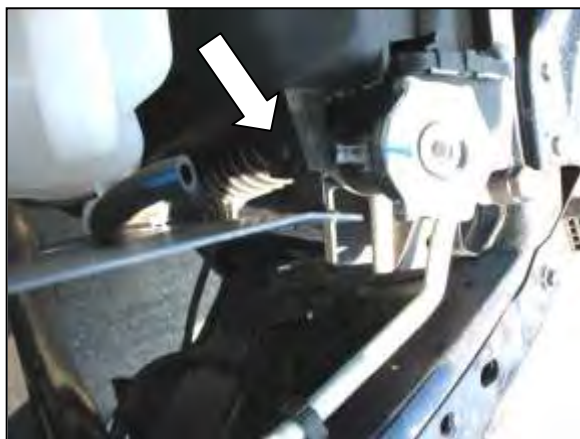
a. When installing the intake system, do not completely tighten the hose clamps or mounting hardware until instructed to do so.



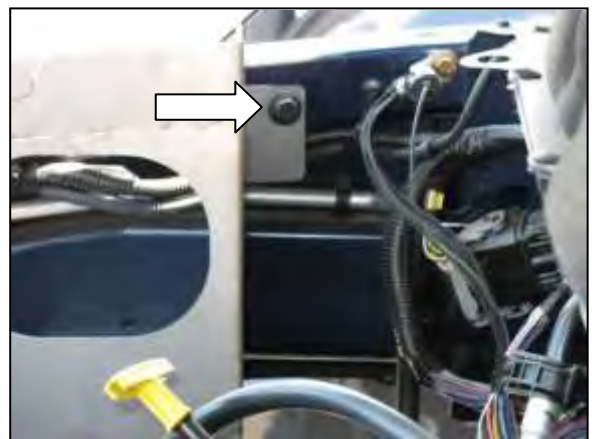
b. Install the supplied rubber mount into the passenger side fender.



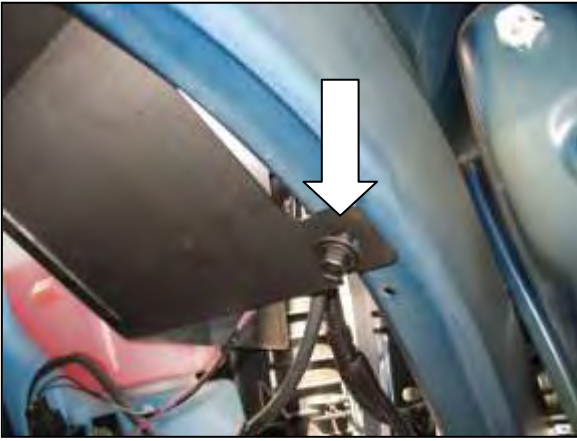
c. Insert the heat shield as shown.



d. Secure the heat shield with the bolt from step (21).



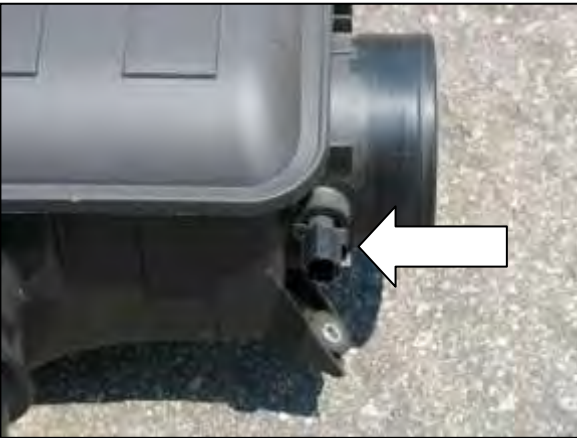
e. Secure the rear heat shield mount.



f. Secure the lower heat shield mount.



h. Attach the coupler to the throttle body and secure with the #56 hose clamp.



j. Remove the IAT sensor from the intake plenum by twisting the sensor counter clockwise. Gently pull out the sensor and remove the o-ring.



g. Reinstall the washer/coolant overflow reservoir.



i. Insert the rubber grommet into the inlet pipe.



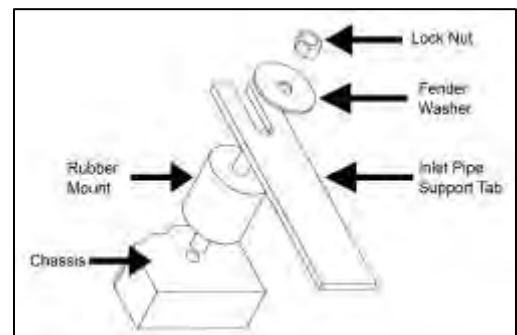
k. Insert the IAT sensor into the inlet pipe



l. Attach the rubber edge trim to the heat shield opening.



m. Insert the inlet pipe as shown. Secure at the throttle body with a #60 hose clamp. Align the bracket with the rubber mount. See diagram for proper assembly.



Proper rubber mount assembly



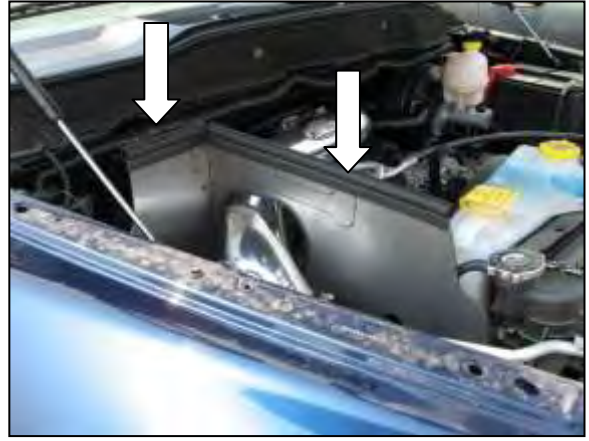
n. Attach the breather hose to the inlet pipe as shown. Secure with the provided hose clamp. Make sure that the rubber elbow is not kinked for air flow.



o. Attach the air filter as shown. Secure with #60 hose clamp. Check for clearance around the heat shield and A/C lines.



o. Reattach the IAT sensor harness connector.



p. Attach the sponge gasket to the top of the heat shield.



AEM® intake system installed

4. Reassemble Vehicle

- a. **Fender liner:** Install the passenger fender liner and any hardware that was removed in steps 2h.
NOTE: Failure to install the fender liner will result in diminished performance and increase the potential for engine damage due to water ingestion in rainy conditions.
- b. Position the inlet pipes for the best fitment. Be sure that the pipes or any other components do not contact any part of the vehicle. Tighten the rubber mount, all bolts, and hose clamps.
- c. Check for proper hood clearance. Re-adjust pipes if necessary and re-tighten them.
- d. Inspect the engine bay for any loose tools and check that all fasteners that were moved or removed are properly tightened.
- e. Reconnect negative battery terminals and start engine. Let the vehicle idle for 3 minutes. Perform a final inspection before driving the vehicle.

5. CARB Sticker Placement

- a. The C.A.R.B. exemption sticker, (attached), must be visible under the hood so that an emissions inspector can see it when the vehicle is required to be tested for emissions. California requires testing every two years, other states may vary.

6. Service and Maintenance

- a. It is recommended that you service your AEM[®] Dryflow™ filter every 20,000 miles for optimum performance. Use AEM Dryflow cleaning kit part # 21-110.
- b. Use aluminum polish to clean your polished AEM[®] intake tube.
- c. Use window cleaner to clean your powder coated AEM[®] intake tube. **(NOTE: DO NOT USE aluminum polish on powder coated AEM intake tubes).**

For technical inquiries
e-mail us at
sales@aemintakes.com
or
call us at
800.992.3000

AEM Air Intake System Warranty Policy

AEM[®] warrants that its intake systems will last for the life of your vehicle. AEM will not honor this warranty due to mechanical damage (i.e. improper installation or fitment), damage from misuse, accidents or flying debris. AEM will not warrant its powder coating if the finish has been cleaned with a hydrocarbon-based solvent. The powder coating should only be cleaned with a mild soap and water solution. Proof of purchase of both the vehicle and AEM intake system is required for redemption of a warranty claim.

This warranty is limited to the repair or replacement of the AEM part. In no event shall this warranty exceed the original purchase price of the AEM part nor shall AEM be responsible for special, incidental or consequential damages or cost incurred due to the failure of this product. Warranty claims to AEM must be transportation prepaid and accompanied with dated proof of purchase. This warranty applies only to the original purchaser of product and is nontransferable. Improper use or installation, use for racing, accident, abuse, unauthorized repairs or alterations voids this warranty. AEM disclaims any liability for consequential damages due to breach of any written or implied warranty on all products manufactured by AEM. Warranty returns will only be accepted by AEM when accompanied by a valid Return Merchandise Authorization (RMA) number. Credit for defective products will be issued pending inspection. Product must be received by AEM within 30 days of the date RMA is issued.

If you have a warranty issue, please call (800) 992-3000 and our customer service department will assist you. A proof of purchase is required for all AEM warranty claims.