



Equipped with AEM® Dryflow™ Filter
No Oil Required!

INSTALLATION INSTRUCTIONS

PART NUMBER: 21-8306

2006	JEEP Commander	V8-5.7L	C.A.R.B. E.O. # D-670
2005-2006	JEEP Grand Cherokee	V8-5.7L	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 #
A/F Assy. 3.50 X 9" Dry Ele.	1	21-2049DK
Inlet Pipe	1	2-83061
Heat Shield	1	20-8306
Hose, Silicone 3.50x2" Black	1	5-351
Hose; 1/2"ID X 22"L	1	5-5022
Edge Trim, 13"	1	8-4013
Mount, Rubber 1" X 8mm	1	1228560
Helical Bundling Wrap, 1/2" Bl.	1	8-8006
Zip Tie, 6 Long	1	1-113
Grommet, 1/2"	1	784634
Stand, Aluminum	1	2-670
Bolt, Hex 1/4-20 X 1 3/4	1	1-2072
Washer, 1/4 X 1-1/4 Fender	1	1-3027
Washer, 1/4 SAE Flat	1	1-3028
Washer, 8mm Soft Mount	2	559960
Nut, M8 Hex Serrated	2	444.460.08
Nut, 1/4-20 Nylock	1	1-2074
Nut, 1/4-20	1	1-2073
Nut, M6 Hex Serrated	1	444.460.04
1/2" Bnd. Hose Clamp, 3.15"-4.00"	2	9456
Hose Clamp, 1"	2	99024.032

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.

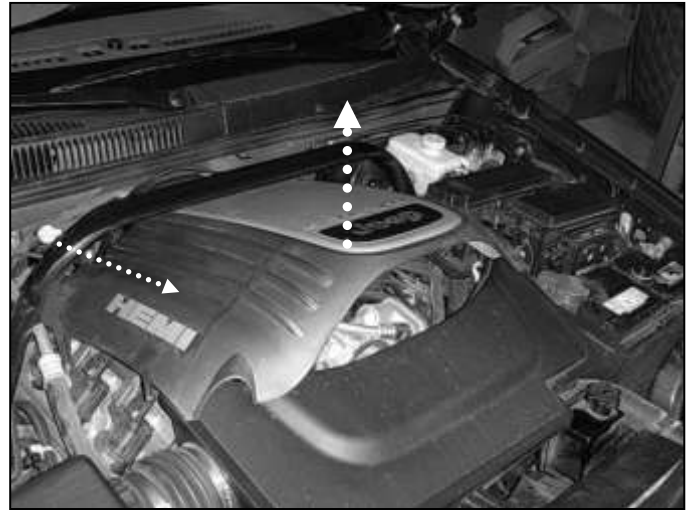
1. Preparing Vehicle

- 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 all negative battery terminals.
- e. Do not discard stock components after removal of the factory system.

2. Removal of stock system



a. Start by making sure the area around and on the oil filler cap is clear of debris. Remove oil filler cap.



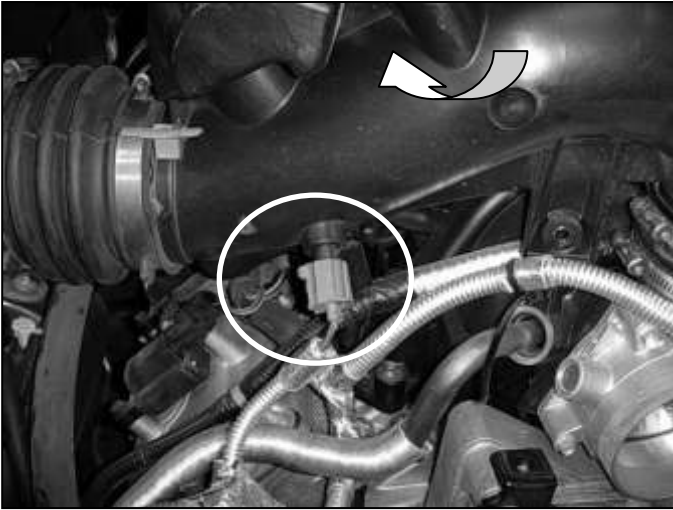
b. With the oil filler cap removed, remove the plastic engine cover. Pull up on the front and then out of the engine bay. Replace oil filler cap.



c. Loosen hose clamp at the throttle body.



d. Loosen hose clamp at the air box.



e. Rotate the inlet pipe up and away from the front side of the vehicle to access the IAT Sensor. Unplug the IAT sensor.



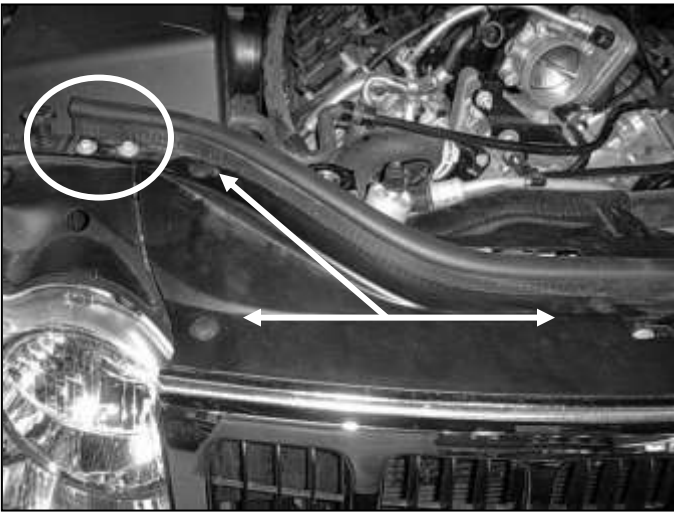
f. Disconnect the breather hose at the air box.



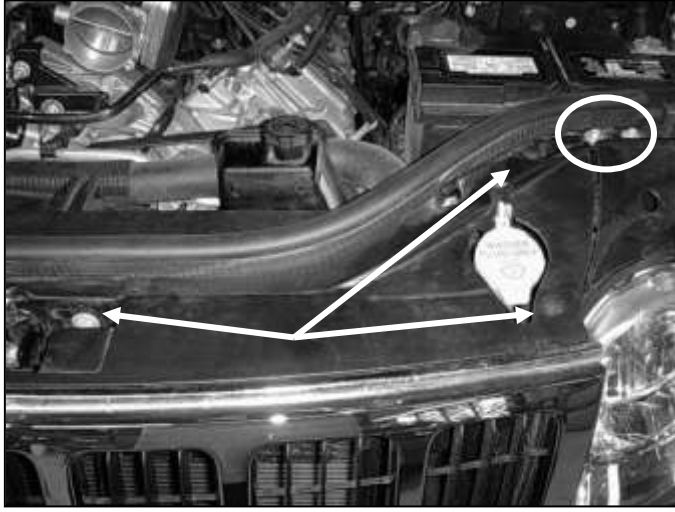
g. Disconnect the other end of the breather hose at the crankcase. This hose will not be reused.



h. There is a bolt located between the coolant reservoir and the air box. Loosen and remove this bolt in order to remove the air box.



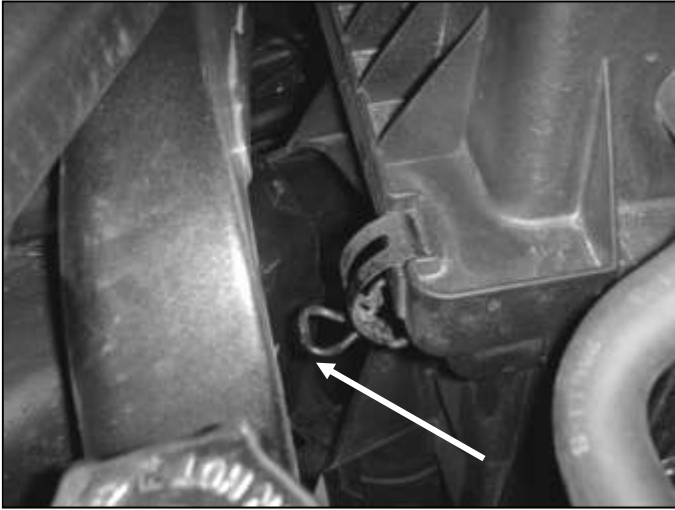
i. Remove tabs from the front of the grille. Loosen and remove the grill mounting bolts.



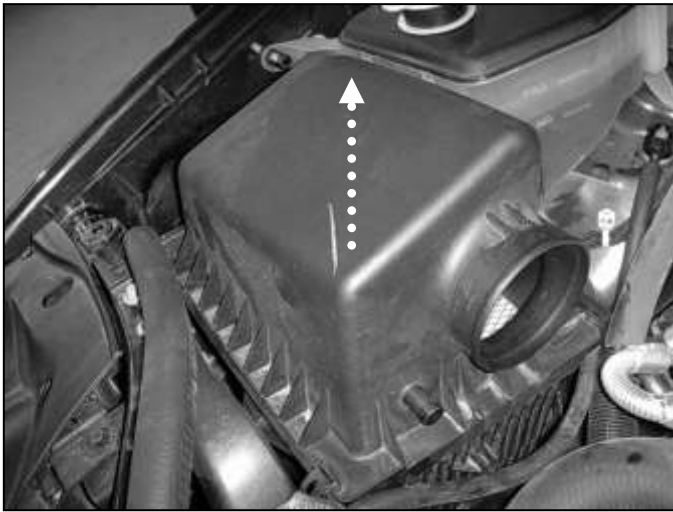
j. Remove tabs on the grill on the opposite side. Loosen and remove the grill mounting bolts.



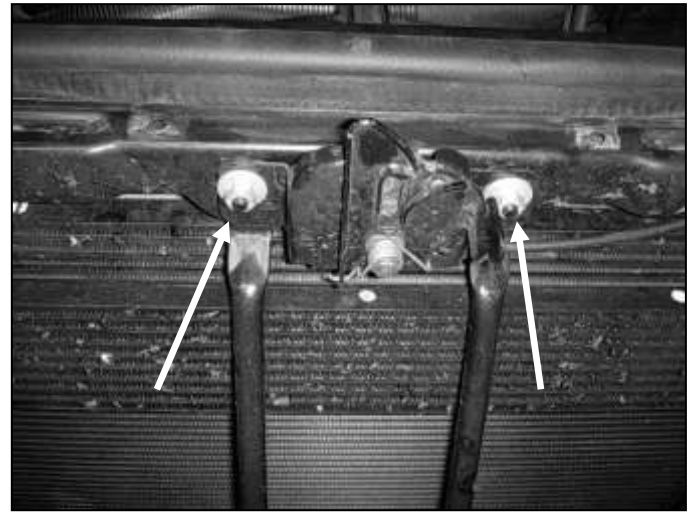
k. With the tabs and remaining mounting hardware removed, pull forward on the grill. Then pull up to remove.



l. Disconnect the air tube on the lower half of the air box by pulling towards the front of the vehicle.



m. Remove air box by pulling straight up.



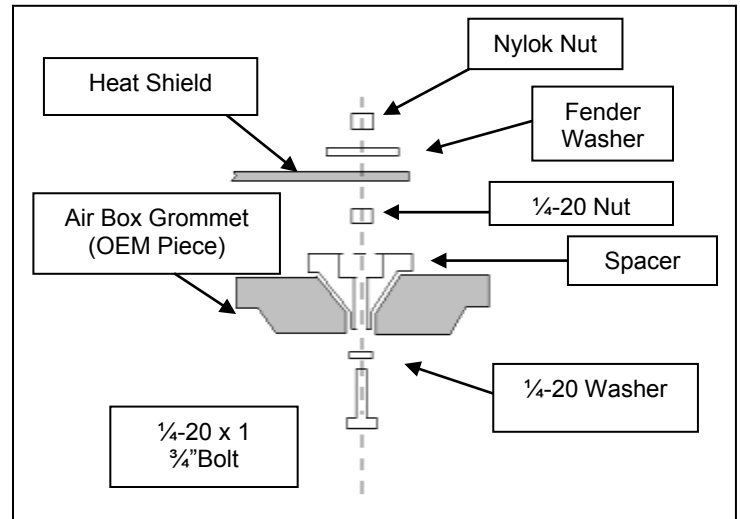
n. Loosen nuts on the hood latch. Do not remove.

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. Assemble the heat shield mount to the air box mounting tab. Refer to the following diagram, using the 1/4-20 bolt, washer, spacer, and nut. Reuse the rubber grommet from the air box mounting tab.

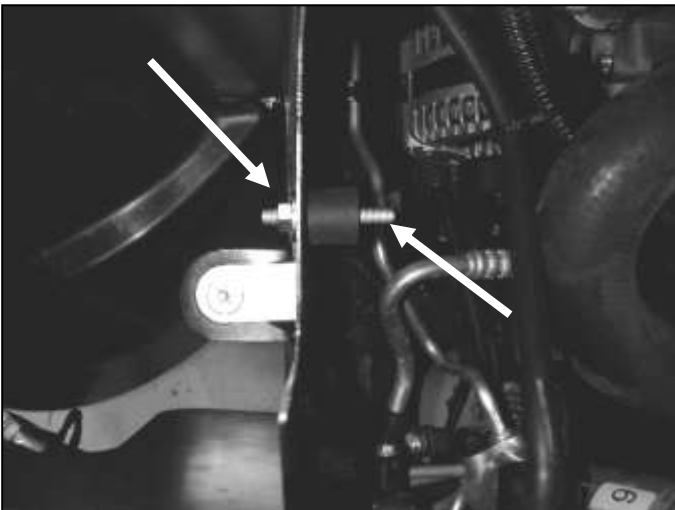




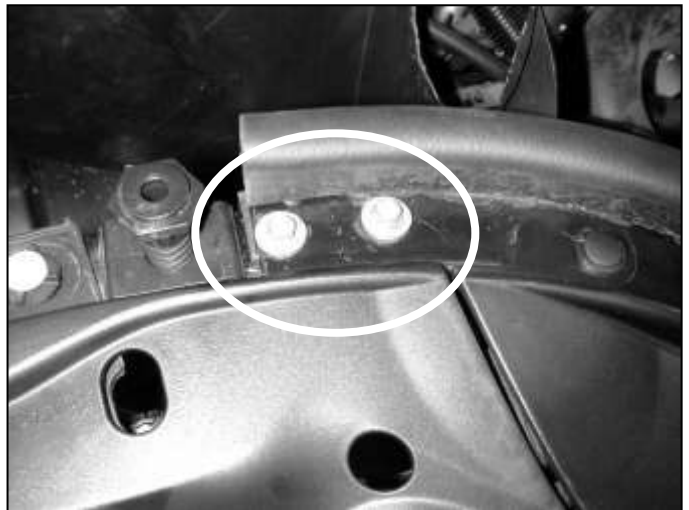
c. Secure the coupler to the throttle body with supplied hose clamps. Tighten hose clamp at the throttle body only.



d. Insert heat shield as shown. Line up mounting hole at the coolant reservoir and tighten with M6 Nylok nut. Attach rubber foam gasket.



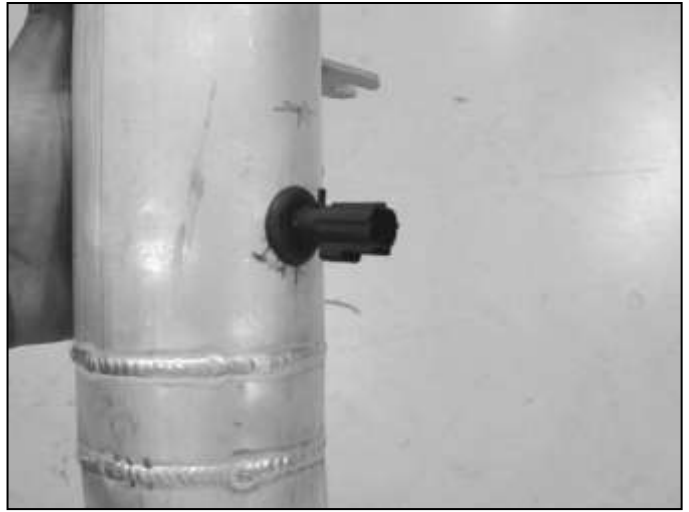
e. Secure the heat shield to the mount installed in step A with provided washer and Nylok nut. Insert rubber mount into the heat shield and secure with washer and M8 Nylok nut.



f. Secure the heat shield tab to the factory mounting point with the factory hardware. The heat shield should be tucked between the body and the latch support. **Tighten hood latch nuts loosened in step 2n.**



g. Zip tie the A/C line to the coolant overflow return line. Make sure not to pinch the hose.



h. Insert grommet into the inlet pipe. Remove O-ring from the IAT sensor. Carefully insert IAT sensor into the grommet.



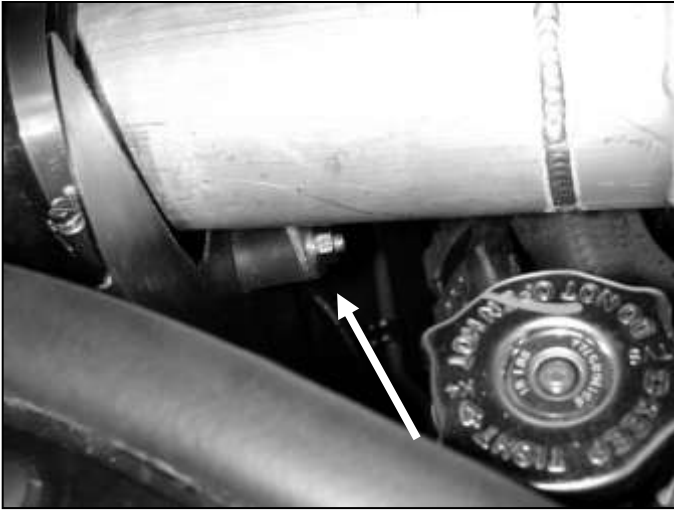
i. Attach the air filter element and secure.



j. Insert inlet pipe as shown into the coupler at the throttle body.



k. Rotate the inlet pipe counter clockwise. Align mounting bracket to the installed rubber mount.



l. Check pipe clearance at the heat shield. Check clearance around the filter. Secure the inlet pipe with the supplied washer and M8 Nylok nut.



m. Wrap the provided breather hose with the helical bundle wrap.



n. Insert breather hose close to the dipstick to provide clearance for the plastic engine cover.



o. Attach breather hose to the factory nipple and secure with provided hose clamp.



p. Attach the other end of the breather hose to the inlet pipe. Secure with provided hose clamp.



q. Reattach IAT sensor wire harness connector.



r. Remove oil cap. Insert plastic engine cover and install oil cap. Re-install grill.



AEM® intake system installed

4. Reassemble Vehicle

- a. 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.
- b. Check for proper hood clearance. Re-adjust pipes if necessary and re-tighten them.
- c. Inspect the engine bay for any loose tools and check that all fasteners that were moved or removed are properly tightened.
- d. 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.