

Equipped with AEM<sup>®</sup> Dryflow<sup>™</sup> Filter No Oil Required!

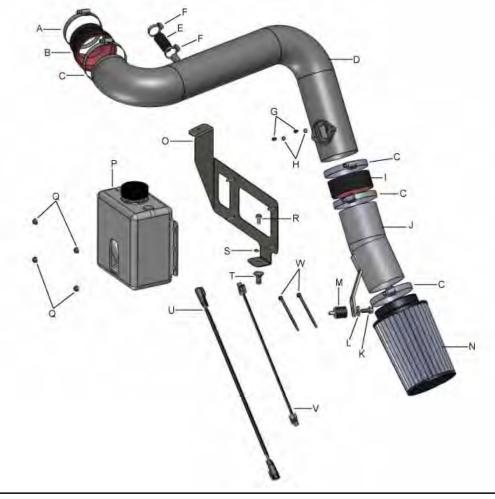
# INSTALLATION INSTRUCTIONS PART NUMBER: 21-8028

2010-2011 CHEVROLET Camaro V6-3.6L SEE \* NOTE

\* NOTE: Legal in California <u>only</u> for racing vehicles which may <u>never</u> be used upon a highway

## PARTS LIST

	Description	Qty.	Part Number
А	1/2" Bnd. hose Clamp, 2.56"-3.50"	1	9448
В	Hose, Adapter 3.00/3.50x3 Blk.	1	5-353
С	1/2" Bnd. Hose Clamp, 3.15"-4.00"	4	9456
D	Tube; Chev. Camaro - Upper	1	2-1430
Е	Hose; 5/8"ID X 2"L	1	5-7002
F	Hose Clamp, 1"	2	99024.032
G	Bolt, Socket M47 X 16mm	2	1-2097
Н	Washer; 4mm Flat	2	08278
Ι	Hose, Silicone 3.50 X1.5" Blk.	1	5-355N
J	Tube; Chev. Camaro	1	2-1437
К	Bolt, Hex/Flange M8-1.25 X 20	1	1-2025
L	Washer, 8mm Soft Mount	1	559960
Μ	Mount, Rubber 1" X 8mm Male/Fem	1	1228559
Ν	Element Parts Kit 3.5" X 7" Dry Media	1	21-2047DK
0	Bracket; Washer Bottle	1	32-3073
Р	Washer Bottle	1	9-0375
Q	Nut, M6 Hex Serrated	4	444.460.04
R	Bolt, Hex M6 X 1.0 X 16mm	1	1-2030
S	Washer, M6 Split Lock Zinc	1	1-3025
Т	Nipple, Heat Shield Mount Pres Anodize Black	1	2-780
U	Extension Harness	1	8-193
V	Extension Harness	1	21635-1
W	Zip Tie,6 Long	2	1-113



Read and understand these instructions <u>BEFORE</u> 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.

The AEM<sup>®</sup> intake system is a performance product that can be used safely during mild weather conditions. During harsh and inclement weather conditions, you must return your vehicle to stock OEM air box and intake tract configuration. Failure to follow these instructions will void your warranty.

#### 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.
- f. This intake system includes a replacement windshield washer system.
- g. Do not discard stock components after removal of the factory system.

### 2. Removal of stock system



a. Open the vehicle hood. Remove the engine cover. Remove the oil filler cap.



c. Replace the oil cap.



b. Pull up on the engine cover until it pops off its anchors. Remove it from the engine bay.



d. Disconnect the MAF sensor wiring harness. Slide the yellow tab lock back to unlock it, then depress the tab and pull off the connector.



e. Locate the stock air intake system and unclip the 2 plastic tabs retaining the airbox lid.



g. Loosen the large hose clamp at the engine throttle body and disconnect the inlet tube.



i. To remove the stock lower airbox, remove the 2 retaining nuts near the shock tower bracket (Retain these, they will be used to install the AEM<sup>®</sup> intake system).



f. Disconnect the rubber breather hose from the plastic breather pipe.



h. Remove the inlet tube and airbox lid from the engine bay. Remember, you will need the factory MAF sensor for your new intake system.



j. Carefully pull up on the lower airbox until it pops free from its retaining anchor. Make sure the rubber anchor stays in the frame rail, it will be be needed to properly install the AEM<sup>®</sup> intake system.

#### 3. Removal of stock windshield washer bottle assembly

a. Raise the front of the vehicle with a jack. Refer to your owner's manual for proper jack and jack stand placement to properly support vehicle. Support your vehicle using properly rated jack stands before wheel removal or while work ing under the vehicle.

NEVER WORK UNDER A VEHICLE WITHOUT USING JACK STANDS.



b. Remove the driver's side front wheel.



d. Locate and remove the retaining tab at the shock tower with a flat blade screwdriver as shown.



c. Remove the 3 lower Torx T20 retaining screws from the plastic fender well cover.



e. Carefully pull the fender well cover away from the fender lip to gain access to the stock washer reservoir.



f. Disconnect the washer pump cable at the pump connector.



h. Pull the washer hose away from its retaining tabs in the reservoir. From the top of the engine bay, pull the hose up and out of the retaining loop in the reservoir and set it on top of the fender well.



j. Lower the washer bottle and remove it from the vehicle.



g. Carefully disconnect the washer fluid hose at the pump nipple by rotating it back and forth as you pull. Quickly install a plug using a small piece of washer hose and a bolt (as shown) or allow the reservoir to drain from the nipple into a clean bucket.



i. Locate and remove the 3 mounting bolts on the washer bottle using a 13mm socket.

### 4. AEM<sup>®</sup> Windshield Washer Bottle Assembly



a. Attach the black mounting nipple onto the lower end of the bracket using the provided 15mm M6 bolt and lock washer, fully tighten.



c. Remove the stock washer pump from the stock washer bottle by pulling it outward and then upward. Install the pump onto the AEM<sup>®</sup> washer bottle and position the nipple as shown.



b. Mount the AEM<sup>®</sup> washer bottle onto the bracket using the (4) M6 nuts, then fully tighten.

#### 5. Installation of AEM<sup>®</sup> 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 M8 rubber mount into the factory washer bottle-mounting nut in the frame rail. Partially thread a M8 bolt and washer into the rubber mount as shown.



d. Install the MAF sensor onto the MAF mounting pad on the upper intake pipe (2-1430) with the M4 bolts (Qty. 2) and the small washers (Qty. 2).



c. Remove the factory MAF sensor from the stock air intake system by removing the two mounting bolts.



e. Install the straight silicone coupler onto the lower end of the upper intake pipe using (1) #56 hose clamp. Completely tighten this hose clamp.



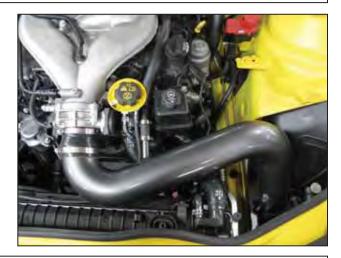
f. Loosely install another #56 hose clamp over the coupler, then insert the lower intake pipe (2-1437) into the straight coupler. Rotate the mounting bracket to the approximate position as shown. Leave the lower hose clamp loose enough to allow the lower intake pipe to rotate.



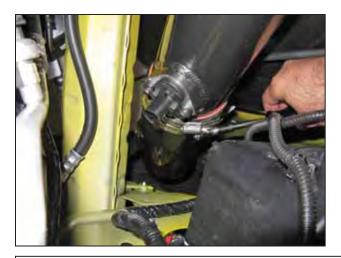
h. Install the intake assembly into the engine bay. Carefully lower the assembly into the engine bay so the lower intake pipe is positioned along the outside of the frame rail. The mounting bracket of the lower intake pipe should align with the M8 rubber mount that was installed during step 3b. Rotate the lower pipe as needed to align it with the rubber mount.



g. Install the reducer coupler onto the upper end of the upper intake pipe (near the breather nipple). Fully seat the coupler onto the pipe. Loosely install one #56 hose clamp and a smaller #48 hose clamp onto the end of the coupler as shown.



i. Mount the reducer coupler on the upper intake pipe onto the throttle body. Ensure the intake pipe does not contact the radiator. Lightly tighten the hose clamps to hold the intake assembly in place.



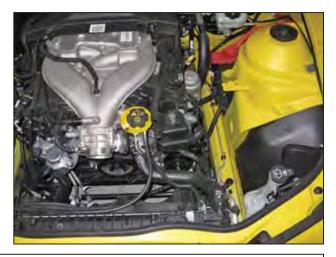
j. Once the lower pipe's bracket has been aligned with the rubber mount, adjust the lower pipe and hose clamp into their final position. Tighten the hose clamp securing the lower pipe to the straight coupler.



I. Mount the replacement washer bottle assembly in the engine bay. Lower the assembly into place so the upper bracket's mounting hole aligns with the shock tower's factory stud.



n. Installed washer bottle/bracket assembly.



k. Loosen the throttle body hose clamp and carefully remove the entire intake assembly from the engine bay. Set aside in a safe area.



m. Push the lower mounting nipple into the factory rubber anchor in the frame rail until it 'pops' in. DO NOT trap any wiring harnesses or the washer hose under the washer bottle or bracket.



o. Attach the factory washer hose to the pump. Connect the new washer-pump extension harness to the pump as shown.



p. Connect the washer pump extension harness to the factory harness as shown.



r. Fasten the upper mounting bracket of the washer bottle assembly to the shock tower's factory stud with the factory retaining nut, fully tighten.



t. Connect the intake pipe's nipple to the plastic breather pipe with the short  $\frac{1}{2}$ " hose. Secure in place with the provided small hose clamps, and fully tighten.



q. Under the vehicle, route the washer fluid hose and pump harness away from the engine. Use one 6" zip tie to retain the washer fluid hose and extension harness as shown. Ensure the washer hose does not rub the edge of the frame rail.



s. Install the intake assembly into the engine bay. Use care not to scratch the intake pipes against the washer bottle bracket. Do not fully tighten any hose clamps.



u. From underneath the vehicle, secure the lower intake pipe's bracket to the rubber mount by completely tightening the M8 bolt and washer.



v. Install the AEM<sup>®</sup> air filter onto the intake pipe, secure in place with the provided hose clamp.



x. Completely tighten the two hose clamps on the throttle body's reducer coupler.



w. Ensure there is clearance between the intake pipe and the corner of the washer bottle bracket. Readjust the intake assembly if necessary.



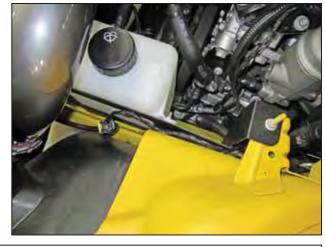
y. Connect the extension MAF harness to the factory MAF connector. Slide the yellow tab in to lock it in place.



z. Route the extension MAF harness under the intake pipe and plug it into the MAF sensor. Fully seat the connector into the sensor and slide the yellow tab to lock it in place. Route the harness away from the engine and use the other 6" zip tie to secure the harness in a safe position.



ab. Remove the protective film on the AEM<sup>®</sup> decal as shown. (Actual decal in kit may vary from photo.)



aa. Alternate MAF extension harness routing: Route the MAF harness behind the washer bottle bracket as shown. Use the provided zip tie to hold it down if necessary.



AEM<sup>®</sup> intake system installed

#### 6. Reassemble Vehicle

- a. Fender liner: Install the fender liner and any hardware that was removed during steps 3c through 3d.
  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. Wheel: Install the driver side wheel using the factory torque specification (see owner's manual).
- c. Washer Bottle: Fill the new AEM® washer bottle with the windshield washer fluid captured in step 3g.
- d. Test the windshield washer system. It may take a few seconds to refill the stock pump and hose with fluid.
- e. Engine Cover: Remove the oil cap, mount the engine cover on its rubber anchors, and replace the oil cap.
- f. 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.
- g. Check for proper hood clearance. Re-adjust pipes if necessary and re-tighten them.
- h. Inspect the engine bay for any loose tools and check that all fasteners that were moved or removed are properly tightened.
- i. Reconnect the negative battery terminal and start the engine. Let the vehicle idle for 3 minutes. Perform a final inspection before driving the vehicle.

### 7. Service and Maintenance

- a. It is recommended that you service your AEM<sup>®</sup> Dryflow<sup>™</sup> filter every 20,000 miles for optimum performance. Use AEM Dryflow cleaning kit part # 21-110.
- b. Use aluminum polish to clean your polished  $\mathsf{AEM}^{\texttt{®}}$  intake tube.
- c. Use window cleaner to clean your powder coated AEM<sup>®</sup> 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<sup>®</sup> 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.