

[POWER COMMANDER V]

2010-2011 Aprilia RSV4

Installation Instructions



PARTS LIST

- 1 Power Commander
- 1 USB Cable
- 1 Installation Guide
- 2 Power Commander Decals
- 2 Dynojet Decals
- 2 Velcro strips
- 1 Alcohol swab
- 2 Posi-taps
- 1 Secondary Fuel Module
- 1 CAN link cable
- 1 CAN Termination Plug

**THE IGNITION MUST BE TURNED
OFF BEFORE INSTALLATION!**

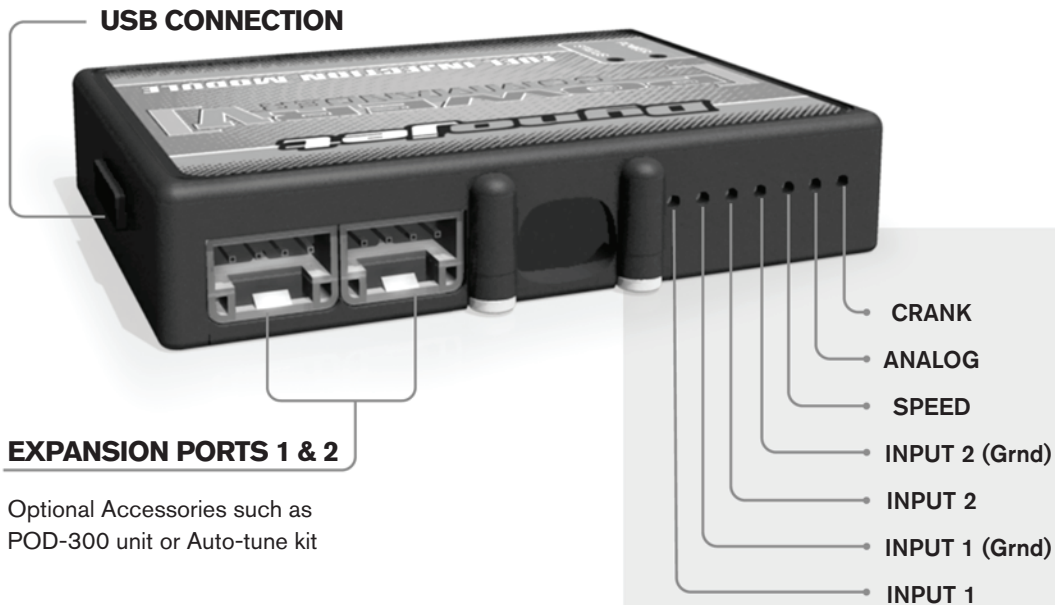
THE LATEST POWER COMMANDER
SOFTWARE AND MAP FILES CAN BE
DOWNLOADED FROM OUR WEB SITE AT:
www.powercommander.com

PLEASE READ ALL DIRECTIONS BEFORE STARTING INSTALLATION

Dynojet

2191 Mendenhall Drive North Las Vegas, NV 89081 (800) 992-4993 www.powercommander.com

POWER COMMANDER V INPUT ACCESSORY GUIDE

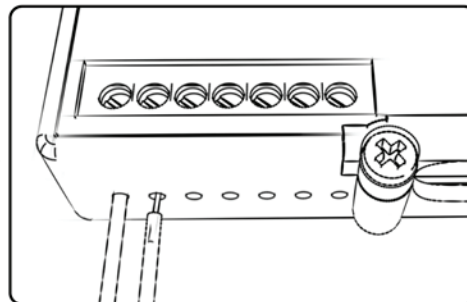


Optional Accessories such as
POD-300 unit or Auto-tune kit

Wire connections:

To input wires into the PCV first remove the rubber plug on the backside of the unit and loosen the screw for the corresponding input. Using a 22-24 gauge wire strip about 10mm from its end. Push the wire into the hole of the PCV until it stops and then tighten the screw. Make sure to reinstall the rubber plug.

NOTE: If you tin the wires with solder it will make inserting them easier.



ACCESSORY INPUTS

Map -

(Input 1 or 2) The PCV has the ability to hold 2 different base maps. You can switch on the fly between these two base maps when you hook up a switch to the MAP inputs. You can use any open/close type switch. The polarity of the wires is not important. When using the Autotune kit one position will hold a base map and the other position will let you activate the learning mode. When the switch is "CLOSED" Autotune will be activated. (Set to Switch Input #1 by default.)

Shifter-

(Input 1 or 2) These inputs are for use with the Dynojet quickshifter. Insert the wires from the Dynojet quickshifter into the SHIFTER inputs. The polarity of the wires is not important. (Set to Switch Input #2 by default.)

Speed-

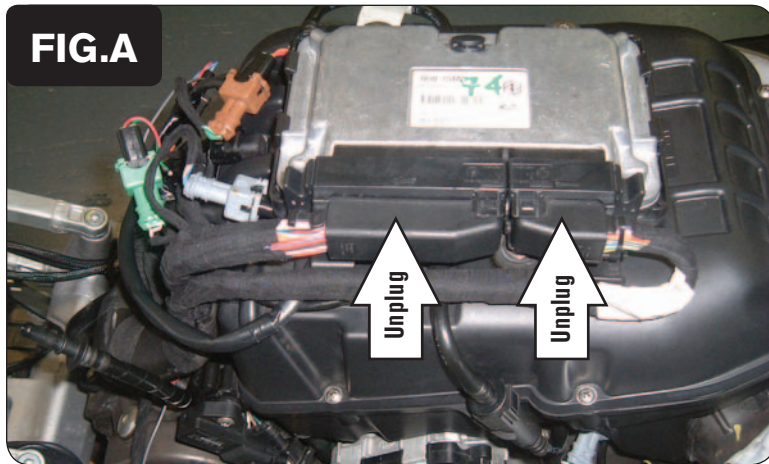
If your application has a speed sensor then you can tap into the signal side of the sensor and run a wire into this input. This will allow you to calculate gear position in the Control Center Software. Once gear position is setup you can alter your map based on gear position and setup gear dependent kill times when using a quickshifter.

Analog-

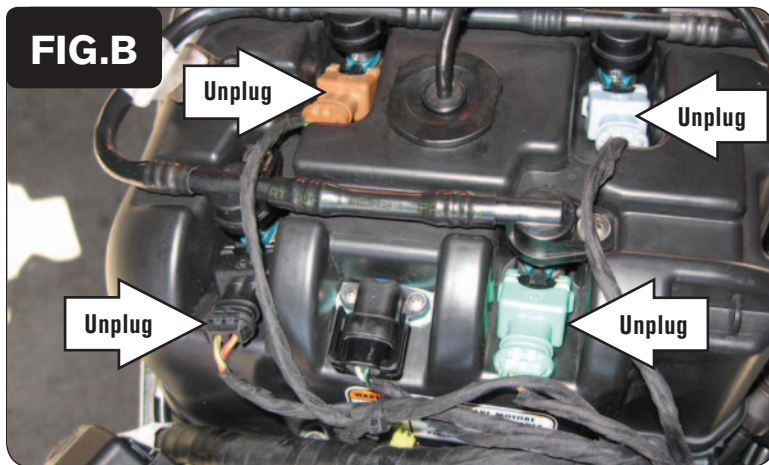
This input is for a 0-5v signal such as engine temp, boost, etc. Once this input is established you can alter your fuel curve based on this input in the control center software.

Crank-

Do **NOT** connect anything to this port unless instructed to do so by Dynojet. It is used to transfer crank trigger data from one module to another.

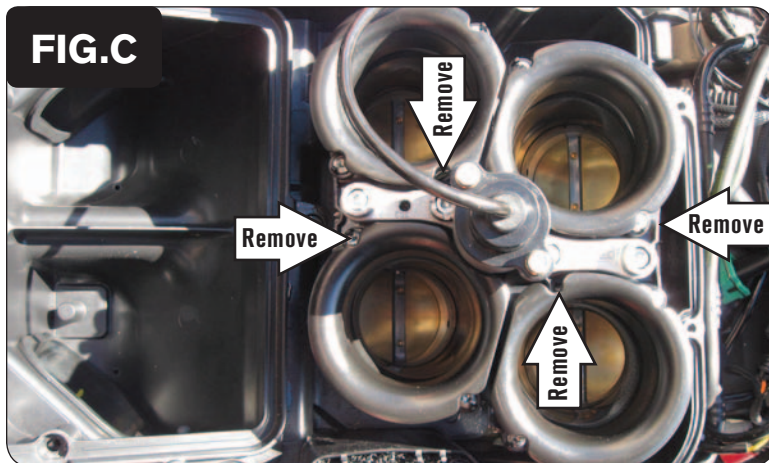


- 1 Remove the seat.
- 2 Remove the fuel tank.
- 3 Unplug the stock wiring harness from the ECU and remove the ECU and tray.

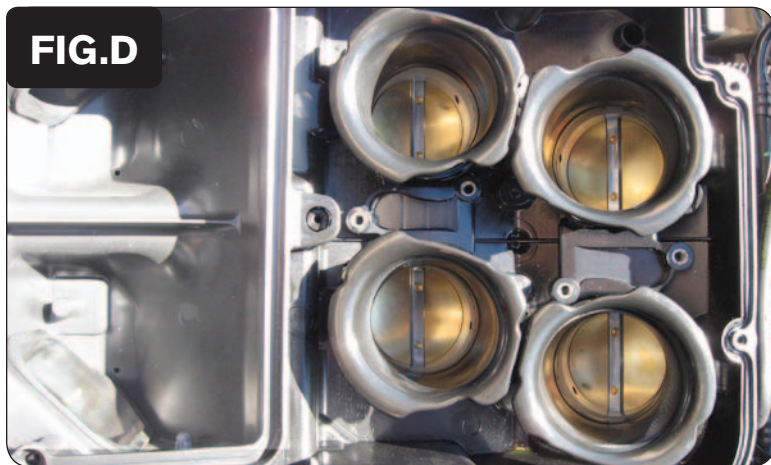


- 4 Unplug the stock wiring harness from each of the 4 upper fuel injectors.
- 5 Remove the entire air box.

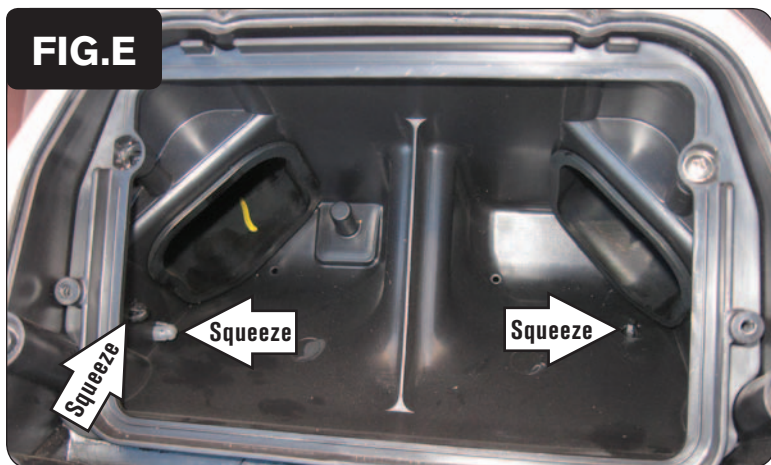
It is best to refer to the service manual for the proper removal procedure



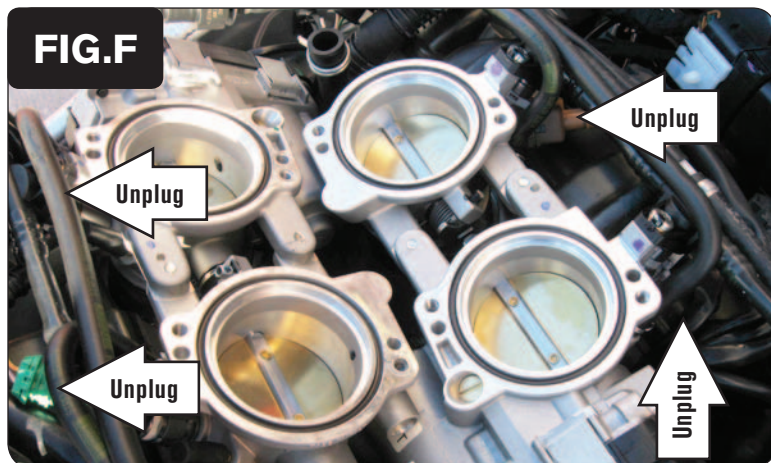
- 6 Remove the 4 bolts that hold the upper velocity stacks in place.
*Do **NOT** remove the 4 bolts that hold the actuator to the air box.*



- 7 Remove the 4 bolts that hold the lower stacks in place.
These bolts can NOT be seen in Figure D.



- 8 There are 3 pins that must be squeezed to be removed (Fig. E).



- 9 Unplug the stock wiring harness from each of the 4 lower injectors.

FIG.G



FIG.H

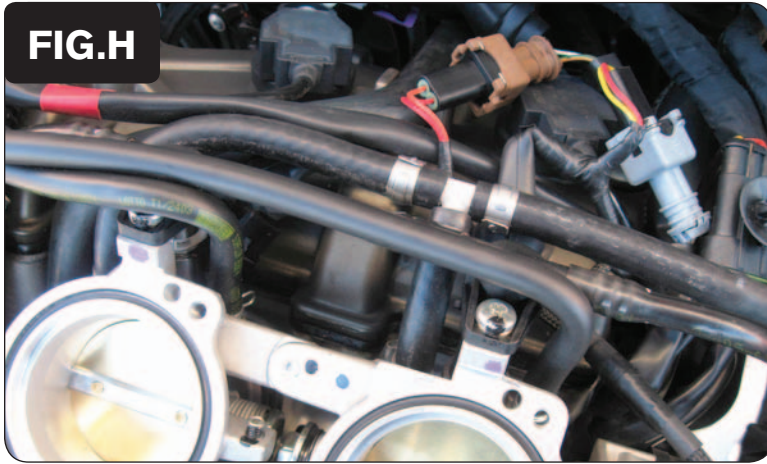
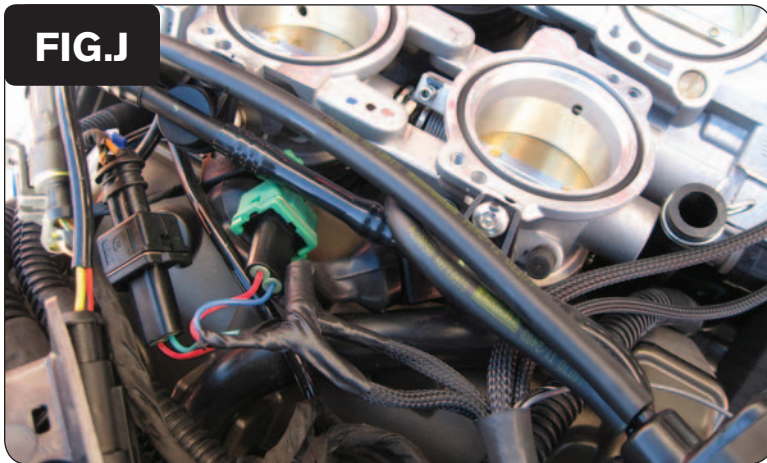


FIG.J



- 10 Secure both of the ground wires of the two modules with the ring lugs to the negative (-) terminal of the bike's battery.
- 11 Plug one end of the supplied CAN link cable into one of the expansion ports of the PCV module. Plug the opposite end of the CAN link cable into an expansion port on the SFM module. Plug the supplied CAN termination plug into the other expansion port on the PCV module.

The CAN termination plug is a hard plastic CAN port connector without wires. It is supplied in the kit. It MUST be installed.

- 12 Using the supplied Velcro, secure the PCV and SFM to the side of the battery.

Make sure to clean the surfaces with the alcohol swab before attaching.

- 13 Route the PCV & SFM harnesses along the subframe and go towards the throttle bodies.

- 14 Plug the connectors from the **PCV** in-line of the LOWER fuel injectors and stock wiring harness.

PCV harness:

ORANGE - table #1 - Stock BROWN connector

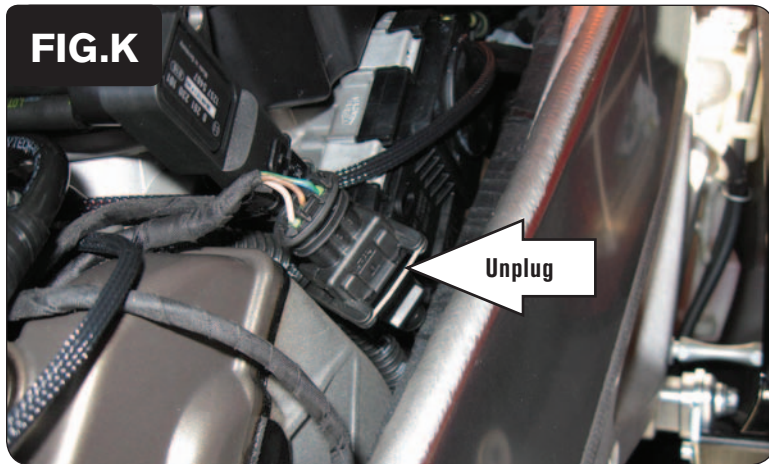
YELLOW - table #2 - Stock GREY connector

- 15 Plug the connectors from the **PCV** in-line of the LOWER fuel injectors and stock wiring harness.

PCV harness:

GREEN - table #3 - Stock BLACK connector

BLUE - table #4 - Stock GREEN connector



- 16 Locate and unplug the crank position sensor connectors.
This 3-pin BLACK connector pair is located on the right side of the engine.



- 17 Plug the 3-pin connectors from the PCV in-line of the stock crank position sensor connectors.
- 18 Reinstall the air box.



- 19 Plug the connectors from the **SFM** in-line of the UPPER fuel injectors and the stock wiring harness.

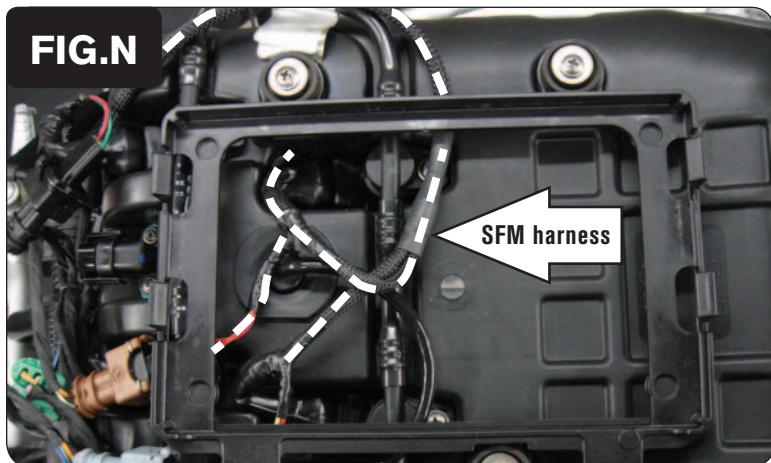
SFM harness:

ORANGE - table #1 - Stock BROWN connector

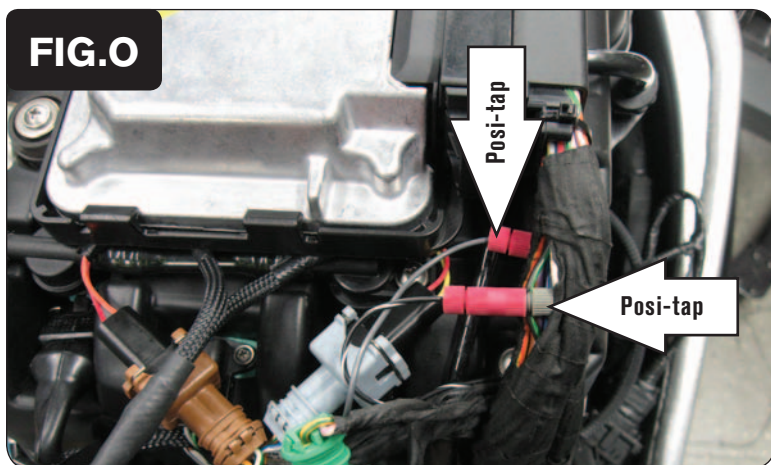
YELLOW - table #2 - Stock GREY connector

GREEN - table #3 - Stock BLACK connector

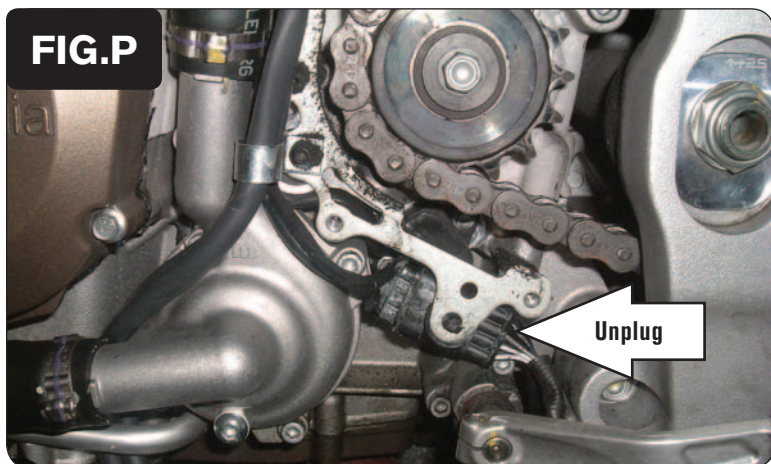
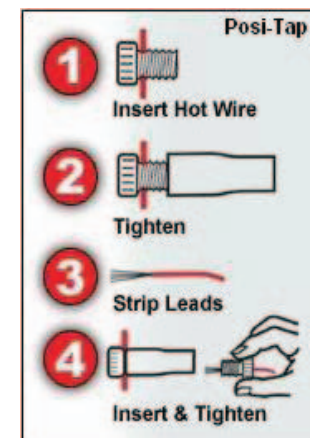
BLUE - table #4 - Stock GREEN connector



- 20 Reinstall the ECM tray making sure not to pinch the SFM harness.
- 21 Reinstall the ECM.



- 22 Cut back about 1" of tape from the stock ECU harness for the larger connector.
- 23 Attach the BLACK/WHITE wire from the PCV to the stock GREEN/BLACK wire of the stock wiring harness.
- 24 Attach the GREY wire from the PCV to the stock YELLOW/BLACK wire of the stock wiring harness.



- 25 Unplug the stock O2 sensor from the stock wiring harness.
This is a BLACK, 4-pin, flat connector pair located near the front sprocket. The stock O2 sensor will no longer be connected to anything and can be removed from the exhaust if desired and if you have a way to plug the hole in the exhaust.
- 26 Reinstall the fuel tank.

There are two wires coming out of the SFM harness (near the enclosure) that will not be used unless you are also using the Ignition Module. Refer to the instructions of the Ignition Module for directions.