



# **Intake Manifold Upgrade Kit**



<u>Applications:</u> All Yamaha 1.8 Liter supercharged models 2008-2017, 2013+ FX-HO, VXR/S and 1050 three cylinder models (TR-1)

Approximate Installation Time: 2.0 Hrs.

Recommended Specialty Tools: Part #

N/A

Required Materials:

N/A

NOTE: These installation instructions are broken up into 2 sections.

Section 1: All 1.8L Supercharged Models Begins on page 2

Section 2: 2013+ FX-HO, VXR/S, and 1050 Three Cylinder Models

Begins on page 3

We strongly recommend the use of a service manual to familiarize yourself with the various components and procedures involved with this installation. Please note that some of the original hardware removed in the disassembly process will be used in the installation process. These instructions have been written in step-by-step format and refer to illustrations. Read through instructions entirely before performing installation. Please follow these step-by-step instructions and illustrations carefully.

\*\*\* ALLOW ENGINE TO COOL COMPLETELY BEFORE PERFORMING INSTALLATION \*\*\*

\*\*\* NO SMOKING \*\*\* NO SMOKING \*\*\* NO SMOKING \*\*\*

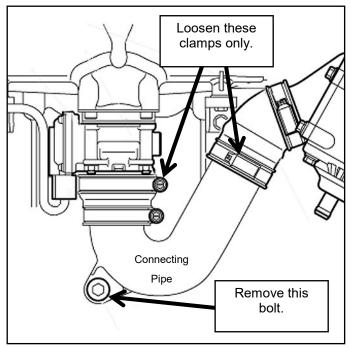
### - INSTALLATION INSTRUCTIONS -

## Section 1: All 1.8L Supercharged Models Only

Disconnect lanyard. Remove seats.

Remove plastic engine cover.

At right side of engine locate rubber hose between the



intercooler and throttle body.

Remove bolt securing connecting pipe to engine. Loosen hose clamps and remove pipe.

At the front of the intake manifold remove bolt securing oil dip stick tube to manifold

A – Oil dip stick tube bolt.

B – Bolts securing manifold to support brackets.

5 & 6 – Cap nuts securing manifold to cylinder.

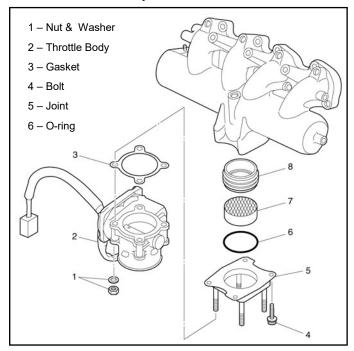
1~4 & 7~8 – Bolts securing manifold to cylinder.

Torque in sequence starting with 1 and ending with 8.

At underside of intake manifold remove the two bolts securing manifold to manifold support bracket.

At top of intake manifold remove the 2 cap nuts securing manifold to cylinder. Loosen the remaining six bolts securing intake manifold to cylinder.

Remove the four nuts and washers securing throttle body to throttle body joint. Pull intake manifold away from motor and remove throttle body.



Remove the four M8 bolts securing throttle body joint to intake manifold. Remove throttle body joint. **NOTE: Be careful not to lose or damage o-ring.** 

Remove ribbon with holder from intake manifold inlet. Remove outer rubber holder and discard ribbon.

Place holder around outside of supplied billet sleeve.

NOTE: Direction of rubber holder in relation to marking on supplied billet sleeve is critical.

### Holder ribs flare at bottom





Arrow points toward throttle body, not air flow.

### - INSTALLATION INSTRUCTIONS -

Install billet sleeve with rubber holder into intake manifold inlet. NOTE: Direction of supplied billet sleeve is critical. Arrow points to side that must face throttle body, not direction of air flow.

Replace throttle body joint making sure o-ring is in place between joint and intake manifold. Secure with stock hardware. NOTE: Apply blue Loctite to bolts. Torque to 13 N•m (9.6 lb•ft).

Replace throttle body making sure gasket is in place between throttle body and throttle body joint. Secure with stock hardware. NOTE: Apply blue Loc-tite to bolts. Torque to 13 N•m (9.6 lb•ft).

Replace cap nuts and secure intake manifold to cylinder. **NOTE: Torque in sequence to 20 N·m (14.8 lb•ft).** 

Replace the 2 bolts securing intake manifold to manifold support bracket and the 1 bolt securing oil dip stick tube to manifold. **NOTE: Apply blue Loctite to bolts. Do not over tighten bolts.** 

Replace pipe connecting intercooler to throttle body. **NOTE: Do not over tighten clamps. Apply blue Loctite to bolt.** 

Check bilge for tools, rags, etc. Run craft on a flush kit to check for proper operation.

<u>Section 2</u>: 2013 & Newer FX-HO, VXR/S & 1050 Three Cylinder Models ONLY

Remove seats.

At front of engine cut and remove zip tie securing fuel supply hose in mount on top of air hose [to throttle body].

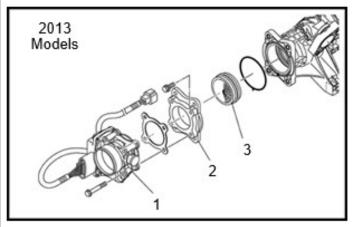


Remove fuel supply hose from mount by lifting up. (Rubber mount is split at top.)

Loosen hose clamp securing air hose to throttle body inlet. Remove air hose from throttle body inlet.



Remove hardware securing throttle body 1 and joint plate 2.

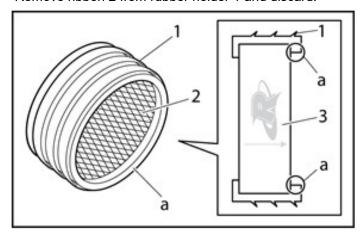


Carefully set throttle body aside in hull. Cover with a clean shop rag.

### - INSTALLATION INSTRUCTIONS -

Remove ribbon 3 with rubber holder from intake manifold.

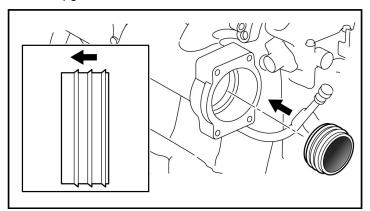
Remove ribbon 2 from rubber holder 1 and discard.



Place rubber holder 1 around outside of supplied billet sleeve 3. **NOTE: Direction of supplied billet sleeve 3 is critical.** Arrow points to side that must face throttle body, not direction of air flow.

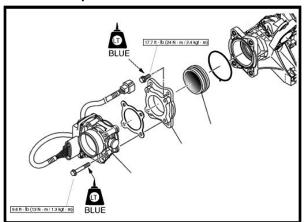
**TIP:** Make sure that the lip a on the holder 1 is hooked onto the billet sleeve 3.

Install Upgrade Kit into intake manifold.



NOTE: Direction is critical.

Replace joint plate and secure. NOTE: Apply blue Loctite to bolts. Torque to 17.7 lb-ft/ 24 N-m.



Replace throttle body and secure. **NOTE: Apply blue Loctite.** Torque to 9.6 lb•ft / 13 N•m.

Replace air hose and secure. **NOTE: Do not over tighten clamp.** 

Replace fuel supply hose and secure with supplied zip tie.

Check bilge for tools, rags, etc. Run craft on a flush kit to check for proper operation.

# Remember, the water belongs to everyone. Please ride responsibly! Technical Support

For answers to questions regarding installation or trouble shooting RIVA Performance Products contact:

RIVA Technical Support directly at (954) 247-0705 or by e -mail at tech support@rivamotorsports.com.

### **Limited Warranty**

RIVA Intake Manifold Upgrade Kits carry a 1-year limited warranty to the original purchaser. They are warranted to be free of defects in materials and workmanship under normal use and service. Customer modified components will be void of warranty. This warranty is limited to defects in the primary components only. Finish and/or wear marks in or on primary components are not covered under this warranty.

RIVA Racing's liability is expressly limited to the repair or replacement of the components contained within or associated with this kit. RIVA Racing agrees to repair or at RIVA's option, replace any defective unit without charge, if product is returned to RIVA Racing freight prepaid within the warranty period. Any equipment returned which, in RIVA's opinion, has been subjected to misuse, abuse, overheating or accident shall not be covered by this warranty.

RIVA Racing shall have no liability for special, incidental or consequential damages or injury to persons or property from any cause arising from the sale, installation or use of this product

No other warranty, express or implied, including, but not limited to the implied warranties of merchantability and fitness for a particular purpose, applies. Various states do not allow for the limitation of incidental or consequential damages and therefore the above exclusion or limitation may not apply to you.

Warranty does not include the expenses related to freight or transportation of parts or compensation for any inconvenience or loss of use while being repaired. A copy of the original invoice and a Return Authorization Number (RA#) must accompany all warranty claims.

Warranted replacement parts will be returned freight collect.