SERVICE BULLETIN

MARCH 10, 1989



883 AND 1200 ALUMINUM MANIFOLD KIT

General

M-976

The purpose of this bulletin is to advise you of a design improvement to the 1988/1989 Sportster intake manifold. The "rubber" intake manifold currently being used in production will be replaced with an aluminum manifold. This change is scheduled to be put into effect in mid March. The new aluminum manifold will be available from our Parts/Accessory Dept. and can be ordered by using P/N 27004-88A. When ordering this part number you will receive the aluminum manifold along with (1) carburetor ring seal and (2) intake manifold seals.

In the interest of customer satisfaction, if your customer experiences cracking with the old-style manifold, the new kit can be installed under warranty. Vehicles beyond the warranty period will not require a prior authorization.

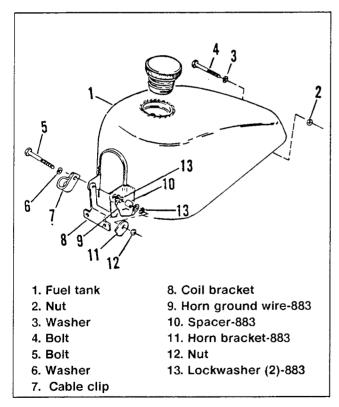


Figure 1. Fuel Tank Assembly

Removal

WARNING

Gasoline is extremely flammable and highly explosive under certain conditions. Do not smoke or allow open flame or sparks anywhere in the area when refueling or servicing the fuel system.

- Turn fuel supply to off. Remove fuel hose at the fuel valve.
- See Figure 1. Remove the two bolts with hardware (2 through 13) that attach fuel tank to frame. Remove fuel tank (1).

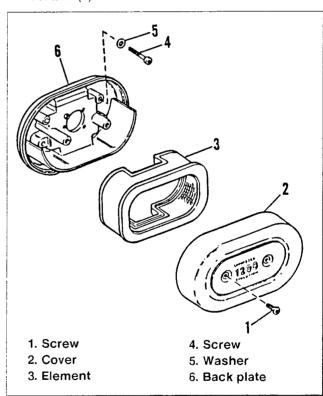


Figure 2 Air Cleaner Assembly

 Free enrichner cable at mounting bracket by loosening nut at back of cable and sliding enrichner cable out of slot.

R	ROUTING	SERVICE MANAGER	SALES MANAGER	PARTS Manager	LEAD TECHNICIAN	TECHNICIAN NO. 1	TECHNICIAN NO. 2	TECHNICIAN NO. 3	TECHNICIAN NO.4	RETUR N THIS TO
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- 4. See Figure 2. Remove two screws (1), air cleaner cover (2) and air cleaner element (3)
- 5. Remove two large Allen screws (4) and washers (5) that attach air cleaner backing plate to cylinder head.
- See Figure 3. Loosen hose clamp (4) securing carburetor to manifold.
- 7. Disconnect VOES hose from carburetor.
- 8. Swing carburetor and backing plate assembly free of manifold. Leave enrichner and control cables attached. Remove and discard hose clamp (4).
- On 1200cc vehicles only, remove the nut that secures the horn and ignition switch to the top center engine mount. Swing the ignition switch/horn assembly out of the way.
- 10. Remove manifold flange nuts (9) washers (8) from studs (7) in cylinder head.
- 11. Using 1/4 in. Bondhus driver, Snap-on Part No. FABL8, remove manifold socket head screws (5) securing manifold flanges to cylinder heads.
- 12. Remove manifold (3).
- 13. Pry out inserts (6) that are inserted inside manifold and remove manifold flanges (1) and (2).

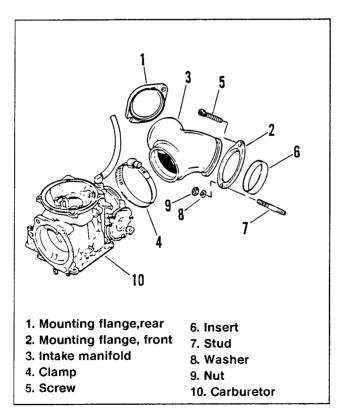


Figure 3. Carburetor Assembly

Installation

- See Figure 4. Place flanges (1) and (2) removed from original manifold onto aluminum manifold (8).
- 2. Place new intake manifold seals (3) onto each spigot of manifold with chamfered edge against flanges (1) and (2)
- Place channel of seal ring (9) over inlet end of manifold.
- 4. Position manifold (8) against intake ports of cylinder head with slotted hole in flanges (1) and (2) around studs (4) in cylinder head. Place washers (5) on studs (4). Loosely thread nuts (6) on studs (4). Insert Allen screws (7) through manifold flanges (1) and (2) and loosely thread into tapped holes in cylinder head.

NOTE

The fit between the carburetor and the seal ring is tight. For ease of installation it is recommended that the mating surfaces, carburetor body and seal ring, be lubricated prior to assembly to reduce surface friction. Use liquid dish soap or tire mounting lube for this purpose.

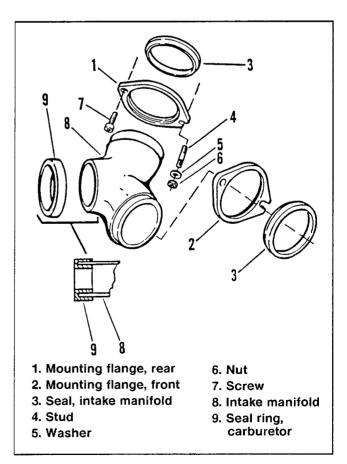


Figure 4. Aluminum Manifold Assembly

- Lubricate only the inside surface of seal ring (9) that will be in contact with the carburetor. Also apply a light coat of lubricant to the spigot of the carburetor body. Push carburetor body into seal ring (9). Carburetor and air cleaner back plate are still assembled.
- 6. Reconnect VOES hose.
- 7. See Figure 2. Install Allen screws (4) through air cleaner backing plate (6) and thread into tapped holes in cylinder head. Tighten to 10-12 ft. lbs torque.
- 8. See Figure 4. Tighten manifold flange nuts (6) and allen screws (7) to 6-10 ft lbs torque.
- 9. On 1200cc models, attach horn/ignition switch assembly to motor mount and torque to 20-25 ft lbs.
- Slide enrichner control in slot in bracket and tighten nut.

- 11. See Figure 1. Install fuel tank and secure to frame with bolts and hardware (2 through 13). Tighten fuel tank mounting bolts to 19 ft lbs torque. Connect fuel supply hose to fuel valve and install new hose clamp.
- 12. See Figure 2. Place element (3) in air cleaner backing plate (6) and position cover (2) over element. Secure with screws (1) and tighten to 3-5 ft. lbs torque.

Credit Procedure

Return the "rubber" intake manifolds, that were removed from the vehicles, together with a properly prepared warranty claim form referencing this bulletin. Attach a return address p-label form No. 1248 to the outside of the package. Upon receipt you will receive credit for the parts along with credit for return postage. You will also be credited with 0.4 hour for each vehicle serviced. Your unused parts inventory of old style intake manifolds part No. 27004-88 and inserts part No. 29049-88 should be returned to the factory at your earliest convenience for credit following normal warranty claim procedure. Postage credit will also be issued for the return of unused parts.

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