

AMERICAN MOTORS PULSAIR INJECTION SYSTEM

DESCRIPTION

The Pulsair Injection System is a non-pump type air injection system that uses engine exhaust pulses to siphon air into the exhaust system. The air is injected into the exhaust port nearest the exhaust valve to further reduce exhaust emissions. System consists of a grouping of check valves in a Pulsair valve assembly and related tubing. The Pulsair is used on all 4 cylinder engines.

OPERATION

Each one of the check valves in the pulse air valve is connected to an exhaust port. The firing of the engine creates a pulsating flow of exhaust gases. When positive exhaust pressure is felt, the check valve will be forced closed and no exhaust gas will flow past the valve into the manifold pipes. With negative exhaust pressure (vacuum), the check valve will open and fresh air will be drawn and mixed with exhaust gases. During high engine RPM, the check valve will remain closed (such as under heavy acceleration).

TESTING

FUNCTIONAL TEST

1) Disconnect vacuum hose from Pulsair valve fitting. Attach hand vacuum pump (J-23738 or equivalent) directly to fitting.

2) Apply more than 15 in. Hg and note the time required for vacuum level to drop from 15 in. Hg to 5 in. Hg. If vacuum drops 10 in. Hg in less than 2 seconds, replace valve.

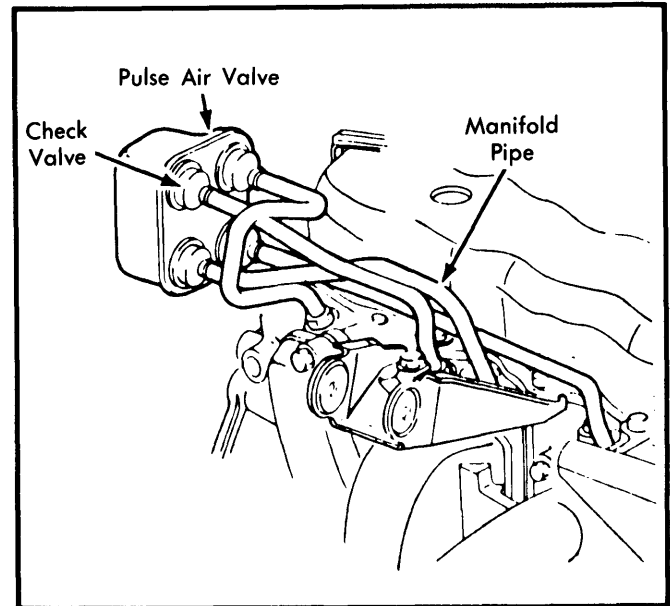


Fig. 1 Pulsair Mounting Location