## Throttle Body for Forklifts

Forklift Throttle Body - Where fuel injected engines are concerned, the throttle body is the component of the air intake system that controls the amount of air which flows into the motor. This particular mechanism operates in response to operator accelerator pedal input in the main. Generally, the throttle body is placed between the air filter box and the intake manifold. It is usually connected to or positioned close to the mass airflow sensor. The largest piece within the throttle body is a butterfly valve referred to as the throttle plate. The throttle plate's main task is in order to regulate air flow.

On nearly all vehicles, the accelerator pedal motion is transferred via the throttle cable, therefore activating the throttle linkages works to be able to move the throttle plate. In cars consisting of electronic throttle control, likewise known as "drive-by-wire" an electric motor regulates the throttle linkages. The accelerator pedal is attached to a sensor and not to the throttle body. This particular sensor sends the pedal position to the ECU or also known as Engine Control Unit. The ECU is responsible for determining the throttle opening based on accelerator pedal position along with inputs from different engine sensors. The throttle body consists of a throttle position sensor. The throttle cable is attached to the black part on the left hand side that is curved in design. The copper coil situated close to this is what returns the throttle body to its idle position once the pedal is released.

Throttle plates turn in the throttle body each and every time pressure is applied on the accelerator. The throttle passage is then opened to be able to permit more air to flow into the intake manifold. Typically, an airflow sensor measures this change and communicates with the ECU. In response, the Engine Control Unit then increases the amount of fluid being sent to the fuel injectors so as to produce the desired air-fuel ratio. Generally a throttle position sensor or TPS is attached to the shaft of the throttle plate to provide the ECU with information on whether the throttle is in the idle position, the wide-open position or "WOT" position or somewhere in between these two extremes.

Various throttle bodies may have adjustments and valves in order to regulate the lowest amount of airflow through the idle period. Even in units that are not "drive-by-wire" there will usually be a small electric motor driven valve, the Idle Air Control Valve or IACV which the ECU utilizes to control the amount of air which could bypass the main throttle opening.

It is common that many vehicles have one throttle body, even if, more than one can be used and attached together by linkages to be able to improve throttle response. High performance cars like the BMW M1, together with high performance motorcycles like the Suzuki Hayabusa have a separate throttle body for each cylinder. These models are referred to as ITBs or otherwise known as "individual throttle bodies."

A throttle body is similar to the carburetor in a non-injected engine. Carburetors combine the functionality of the throttle body and the fuel injectors together. They work by blending the air and fuel together and by modulating the amount of air flow. Vehicles which have throttle body injection, that is referred to as TBI by GM and CFI by Ford, situate the fuel injectors inside the throttle body. This enables an older engine the opportunity to be transformed from carburetor to fuel injection without considerably changing the engine design.