

Hydraulic Pumps for Forklift

Forklift Hydraulic Pumps - Hydraulic pumps could be either hydrodynamic or hydrostatic. They are commonly used within hydraulic drive systems.

Hydrodynamic pumps could be regarded as fixed displacement pumps. This means the flow through the pump per each pump rotation cannot be adjusted. Hydrodynamic pumps can also be variable displacement pumps. These models have a more complicated assembly that means the displacement could be changed. On the other hand, hydrostatic pumps are positive displacement pumps.

The majority of pumps function as open systems drawing oil from a reservoir at atmospheric pressure. It is important that there are no cavities occurring at the suction side of the pump for this particular process to run smoothly. In order to enable this to function right, the connection of the suction side of the pump is larger in diameter compared to the connection of the pressure side. With regards to multi pump assemblies, the suction connection of the pump is usually combined. A common alternative is to have free flow to the pump, meaning the pressure at the pump inlet is a minimum of 0.8 bars and the body of the pump is frequently within open connection with the suction portion of the pump.

In a closed system, it is all right for there to be high pressure on both sides of the pump. Usually, in closed systems, the reservoir is pressurized with 6-20 bars of boost pressure. In the instance of closed loop systems, normally axial piston pumps are utilized. As both sides are pressurized, the pump body requires a separate leakage connection.