Forklift Hydraulic Pump

Hydraulic Pump for Forklift - Hydraulic pumps can be either hydrostatic or hydrodynamic. They are normally used within hydraulic drive systems.

Hydrodynamic pumps could be considered fixed displacement pumps. This means the flow through the pump for each pump rotation cannot be adjusted. Hydrodynamic pumps could even be variable displacement pumps. These kinds have a much more complex composition which means the displacement is capable of being changed. On the other hand, hydrostatic pumps are positive displacement pumps.

Most pumps work as open systems drawing oil at atmospheric pressure from a reservoir. It is vital that there are no cavities happening at the suction side of the pump for this method to work smoothly. So as to enable this to function correctly, the connection of the suction side of the pump is larger in diameter than the connection of the pressure side. With regards to multi pump assemblies, the suction connection of the pump is typically combined. A general option is to have free flow to the pump, that means the pressure at the pump inlet is a minimum of 0.8 bars and the body of the pump is often in open connection with the suction portion of the pump.

In a closed system, it is acceptable 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, usually axial piston pumps are used. Because both sides are pressurized, the pump body requires a separate leakage connection.