

Hyster Forklift Hydraulic Pumps

Usually utilized within hydraulic drive systems; hydraulic pumps could be either hydrodynamic or hydrostatic.

A hydrodynamic pump could even be considered a fixed displacement pump as the flow throughout the pump for every pump rotation could not be altered. Hydrodynamic pumps can also be variable displacement pumps. These types have a more complicated assembly which means the displacement can be altered. On the other hand, hydrostatic pumps are positive displacement pumps.

Most pumps work as open systems drawing oil from a reservoir at atmospheric pressure. It is essential that there are no cavities taking place at the suction side of the pump for this particular process to work efficiently. In order to enable this to work correctly, the connection of the suction side of the pump is bigger in diameter as opposed to the connection of the pressure side. With regards to multi pump assemblies, the suction connection of the pump is usually combined. A general choice is to have free flow to the pump, that means the pressure at the pump inlet is at least 0.8 bars and the body of the pump is normally within open connection with the suction portion of the pump.

In the cases of a closed system, it is acceptable for both sides of the pump to be at high pressure. Frequently in these situations, the reservoir is pressurized with 6-20 bars of boost pressure. In the case of closed loop systems, normally axial piston pumps are used. Since both sides are pressurized, the pump body requires a separate leakage connection.