Forklift Gear

Forklift Gear - A gear pump is among the most common types of pumps for applications of hydraulic fluid power. A gear pump operates by utilizing the meshing of gears so as to pump fluid by displacement. These machines are generally utilized in chemical installations in order to pump fluid with specific viscosity. Two basic types of gear pumps exist. Internal gear pumps utilize an an internal and an external spur gear and external gear pumps make use of two external spur gears. Gear pumps pump a constant amount of fluid for each revolution. This defines them as positive or fixed displacement. Several gear pump machines are designed to function as either a motor or a pump.

While the gears on the pump turn, they divide on the pump's intake side. This creates a suction and void which is filled by fluid. This fluid is carried by the gears to the discharge side of the pump, and this is whereby the meshing of the gears functions in order to displace the fluid. There are tight and very small mechanized clearances, that along with the speed of rotation effectively avoid the fluid from leaking backwards. The rigid construction of the houses and gears gives the pump its ability to be able to pump highly viscous liquids and allow for extremely high pressures.