## **Gradall Forklift Part**

Gradall Forklift Parts - The Gradall excavator was the idea of two brothers Koop and ray Ferwerda. The excavator was established In the 1940's through World War II, when there was a scarcity of workers. Partners in a Cleveland, Ohio construction company called Ferwerda-Werba-Ferwerda, the brothers faced a huge dilemma when a lot of men left the labor force and signed up in the military, depleting existing laborers for the delicate finishing work and grading on highway projects. The Ferwerda brothers opted to build a machine which will save their company by making the slope grading work more efficient, less manual and easier.

The first excavator prototype consisted of a device with two industrial beams on a rotating platform fixed to a second-hand truck. There was a telescopic cylinder that was used to move the beams backward and forward. This enabled the fixed blade at the far end of the beams to push or pull the dirt. Soon enhancing the first design, the brothers made a triangular boom in order to add more strength. Also, they added a tilt cylinder which let the boom turn 45 degrees in both directions. A cylinder was positioned at the back of the boom, powering a long push rod to allow the machinery to be outfitted with either a blade or a bucket attachment.

The year 1992 marked a momentous year for Gradall with their launch of XL Series hydraulics, the most remarkable change in the company's excavators since their creation. These top-of-the-line hydraulics systems allowed Gradall excavators to provide high productivity and comparable power on a realistic level to traditional excavators. The XL Series ended the original Gradall equipment power drawn from gear pumps and low pressure hydraulics. These traditional systems effectively handled finishing work and grading but had a hard time competing for high productivity work.

Gradall's new XL Series excavators showed more ability to dig and lift materials. With this series, the models were produced along with a piston pump, high-pressure system of hydraulics that showed noticeable improvement in boom and bucket breakout forces. The XL Series hydraulics system was also developed with a load-sensing capability. Conventional excavators utilize an operator in order to select a working-mode; where the Gradall system could automatically adjust the hydraulic power meant for the work at hand. This makes the operator's whole work easier and likewise conserves fuel at the same time.

When the new XL Series hydraulics reached the market, Gradall was thrust into the extremely competitive industrial machinery market which are designed to tackle pavement removal, excavating, demolition and different industrial work. The introduction of the new telescoping boom helped to further improve the excavator's marketability. The telescoping boom gives the excavator the ability to work in low overhead areas and to better position attachments.