Drive Axle for Forklifts

Forklift Drive Axle - A lift truck drive axle is actually a piece of machinery which is elastically fastened to a vehicle framework utilizing a lift mast. The lift mast is attached to the drive axle and could be inclined round the axial centerline of the drive axle. This is done by no less than one tilting cylinder. Forward bearing elements along with rear bearing components of a torque bearing system are responsible for fastening the drive axle to the vehicle frame. The drive axle could be pivoted around a swiveling axis oriented transversely and horizontally in the vicinity of the back bearing elements. The lift mast is likewise capable of being inclined relative to the drive axle. The tilting cylinder is attached to the lift truck frame and the lift mast in an articulated fashion. This enables the tilting cylinder to be oriented practically parallel to a plane extending from the swiveling axis to the axial centerline.

Forklift units such as H40, H45 and H35 that are made in Aschaffenburg, Germany by Linde AG, have the lift mast tilt ably mounted on the vehicle frame. The drive axle is elastically attached to the forklift frame using a multitude of bearing tools. The drive axle consists of tubular axle body along with extension arms affixed to it and extend backwards. This kind of drive axle is elastically affixed to the vehicle framework using back bearing elements on the extension arms together with forward bearing tools located on the axle body. There are two rear and two front bearing tools. Each one is separated in the transverse direction of the vehicle from the other bearing device in its respective pair.

The braking and drive torques of the drive axle on tis particular unit of lift truck are sustained by the extension arms through the rear bearing components on the frame. The forces created by the lift mast and the load being carried are transmitted into the floor or road by the vehicle framework through the front bearing components of the drive axle. It is important to make sure the parts of the drive axle are constructed in a firm enough manner so as to maintain immovability of the forklift truck. The bearing elements could reduce slight bumps or road surface irregularities through travel to a limited extent and give a bit smoother function.