Drive Axle for Forklifts

Forklift Drive Axles - A forklift drive axle is actually a piece of machinery that is elastically affixed to a vehicle frame with a lift mast. The lift mast is fixed to the drive axle and is capable of being inclined around the axial centerline of the drive axle. This is done by at the very least one tilting cylinder. Frontward bearing parts combined with rear bearing components of a torque bearing system are responsible for fastening the vehicle and the drive axle framework. The drive axle could be pivoted around a swiveling axis oriented transversely and horizontally in the vicinity of the back bearing components. The lift mast is also capable of being inclined relative to the drive axle. The tilting cylinder is connected to the vehicle frame and the lift mast in an articulated fashion. This allows the tilting cylinder to be oriented practically parallel to a plane extending from the axial centerline and to the swiveling axis.

Unit H40, H45 and H35 forklifts, that are made by Linde AG in Aschaffenburg, Germany, have a mounted lift mast tilt on the vehicle framework itself. The drive axle is elastically attached to the frame of the lift truck by numerous various bearings. The drive axle consists of tubular axle body along with extension arms connected to it and extend backwards. This particular kind of drive axle is elastically connected to the vehicle frame utilizing rear bearing elements on the extension arms together with forward bearing tools located on the axle body. There are two back and two front bearing tools. Each one is separated in the transverse direction of the forklift from the other bearing tool in its respective pair.

The braking and drive torques of the drive axle on this unit of lift truck are sustained using the extension arms through the back bearing elements on the frame. The forces created by the load being carried and the lift mast are transmitted into the floor or road by the vehicle frame through the front bearing elements of the drive axle. It is essential to make sure the parts of the drive axle are configured in a firm enough method to be able to maintain immovability of the forklift truck. The bearing components could reduce small road surface irregularities or bumps through travel to a limited extent and offer a bit smoother function.