Steer Axle for Forklifts

Forklift Steer Axles - Axles are defined by a central shaft which turns a wheel or a gear. The axle on wheeled motor vehicles may be attached to the wheels and turned with them. In this particular instance, bearings or bushings are provided at the mounting points where the axle is supported. On the other hand, the axle may be fixed to its surroundings and the wheels could in turn revolve around the axle. In this particular situation, a bushing or bearing is placed inside the hole inside the wheel so as to enable the wheel or gear to turn all-around the axle.

With cars and trucks, the word axle in several references is used casually. The term generally means shaft itself, a transverse pair of wheels or its housing. The shaft itself rotates with the wheel. It is usually bolted in fixed relation to it and known as an 'axle shaft' or an 'axle.' It is also true that the housing around it which is generally known as a casting is otherwise called an 'axle' or sometimes an 'axle housing.' An even broader sense of the term refers to every transverse pair of wheels, whether they are connected to one another or they are not. Therefore, even transverse pairs of wheels within an independent suspension are generally known as 'an axle.'

The axles are an important part in a wheeled motor vehicle. The axle serves to transmit driving torque to the wheel in a live-axle suspension system. The position of the wheels is maintained by the axles relative to one another and to the vehicle body. In this particular system the axles should also be able to support the weight of the motor vehicle along with whichever cargo. In a non-driving axle, like for instance the front beam axle in some two-wheel drive light vans and trucks and in heavy-duty trucks, there would be no shaft. The axle in this situation serves only as a steering component and as suspension. Various front wheel drive cars have a solid rear beam axle.

There are other types of suspension systems where the axles operate only to transmit driving torque to the wheels. The position and angle of the wheel hubs is a function of the suspension system. This is normally found in the independent suspension found in nearly all brand new SUV's, on the front of many light trucks and on the majority of brand new cars. These systems still consist of a differential but it does not have connected axle housing tubes. It could be fixed to the vehicle body or frame or also can be integral in a transaxle. The axle shafts then transmit driving torque to the wheels. The shafts in an independent suspension system are like a full floating axle system as in they do not support the vehicle weight.

Last of all, in reference to a motor vehicle, 'axle,' has a more vague classification. It means parallel wheels on opposing sides of the vehicle, regardless of their mechanical connection kind to one another and the vehicle body or frame.