Steer Axles for Forklift

Forklift Steer Axle - The definition of an axle is a central shaft meant for rotating a gear or a wheel. Where wheeled motor vehicles are concerned, the axle itself can be connected to the wheels and rotate along with them. In this instance, bearings or bushings are provided at the mounting points where the axle is supported. Conversely, the axle can be connected to its surroundings and the wheels may in turn turn around the axle. In this particular instance, a bearing or bushing is situated in the hole inside the wheel to enable the wheel or gear to rotate all-around the axle.

With trucks and cars, the word axle in several references is used casually. The word usually means shaft itself, a transverse pair of wheels or its housing. The shaft itself turns with the wheel. It is normally bolted in fixed relation to it and known as an 'axle shaft' or an 'axle.' It is equally true that the housing around it that is normally called a casting is otherwise known as an 'axle' or at times an 'axle housing.' An even broader definition of the term refers to every transverse pair of wheels, whether they are attached to one another or they are not. Therefore, even transverse pairs of wheels inside an independent suspension are often referred to as 'an axle.'

In a wheeled vehicle, axles are an essential part. With a live-axle suspension system, the axles serve so as to transmit driving torque to the wheel. The axles also maintain the position of the wheels relative to one another and to the motor vehicle body. In this particular system the axles should even be able to bear the weight of the vehicle along with whatever load. In a non-driving axle, like the front beam axle in various two-wheel drive light trucks and vans and in heavy-duty trucks, there will be no shaft. The axle in this particular condition works only as a steering part and as suspension. Many front wheel drive cars have a solid rear beam axle.

There are other types of suspension systems wherein the axles serve just to transmit driving torque to the wheels. The angle and position of the wheel hubs is a function of the suspension system. This is normally found in the independent suspension seen in nearly all brand new SUV's, on the front of numerous light trucks and on nearly all brand new cars. These systems still consist of a differential but it does not have fixed axle housing tubes. It can be connected to the motor vehicle frame or body 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.

To finish, in reference to a motor vehicle, 'axle,' has a more ambiguous description. It means parallel wheels on opposing sides of the motor vehicle, regardless of their mechanical connection type to one another and the vehicle body or frame.