

Steer Axles for Forklift

Forklift Steer Axle - The definition of an axle is a central shaft used for turning a gear or a wheel. Where wheeled vehicles are concerned, the axle itself may be attached to the wheels and revolve with them. In this situation, bushings or bearings are provided at the mounting points where the axle is supported. On the other hand, the axle may be attached to its surroundings and the wheels may in turn rotate around the axle. In this case, a bearing or bushing is located within the hole within the wheel to enable the wheel or gear to turn around the axle.

Whenever referring to trucks and cars, some references to the word axle co-occur in casual usage. Normally, the word refers to the shaft itself, a transverse pair of wheels or its housing. The shaft itself turns along with the wheel. It is normally bolted in fixed relation to it and called an 'axle' or an 'axle shaft'. It is likewise true that the housing around it which is generally referred to as a casting is likewise referred to as an 'axle' or at times 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. Hence, even transverse pairs of wheels in an independent suspension are frequently called 'an axle.'

The axles are an integral component in a wheeled vehicle. The axle serves in order 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 motor vehicle body. In this system the axles must even be able to bear the weight of the motor vehicle plus any cargo. In a non-driving axle, like for instance the front beam axle in some two-wheel drive light trucks and vans and in heavy-duty trucks, there would be no shaft. The axle in this condition works only as a steering component and as suspension. Several front wheel drive cars have a solid rear beam axle.

There are other types of suspension systems wherein the axles serve 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 often found in the independent suspension seen in most new SUV's, on the front of several light trucks and on nearly all new cars. These systems still consist of a differential but it does not have fixed axle housing tubes. It could be attached to the motor vehicle frame or body or even can be integral in a transaxle. The axle shafts then transmit driving torque to the wheels. The shafts in an independent suspension system are similar to a full floating axle system as in they do not support the motor vehicle weight.

The vehicle axle has a more vague description, meaning that the parallel wheels on opposing sides of the vehicle, regardless of their kind of mechanical connection to one another.