

Cushion Tire Forklift

Used Cushion Tire Forklift San Jose - Forklift trucks are commonly classified by the kind of work they complete as well as the kind of tire they use. The two types of tire classification for forklifts are: 1. Cushion; and 2. Pneumatic. When considering the benefits and drawbacks of cushion tires in forklift uses, it is important to discuss the benefits and drawbacks of the other available forklift tire option: the pneumatic tire. The benefits and potential drawbacks of the cushion tire models can only be compared when the pneumatic benefits and drawbacks are equally discussed.

Forklift Tire Classifications

Cushion Tires Cushion tires are comprised of treaded or smooth, solid rubber which is positioned around and affixed to a metal ring or baseband. These kinds of forklift tires are cheaper to make and easier to maintain. Cushion tires are designed for smooth surface applications such as work that takes place mostly indoors or around loading docks. These tires are designed to maneuver well within tight locations, due to their specific turning radius. Forklifts that use cushion tires can be lower to the ground compared to pneumatic tire models and the increase in vertical clearance is welcome for many applications. Pneumatic tires provide better traction compared to cushion tires; especially on wet surfaces and outdoor locations. Cushion tires forklifts are commonly used for organizing inventory, moving items to and from different loading docks, unloading shipments and similar applications.

Pneumatic Tires Pneumatic tires have two categorizations as either solid resilient pneumatic or standard air pneumatic. They are popular for rough terrain applications and uneven surfaces. The difference between these two pneumatic categories is that the first is made entirely of rubber, while the latter is a layered rubber, filled with air. Pneumatic tire forklifts are excellent choices for working in locations with uneven or unpaved ground outdoors. Locations that have sharp debris or objects that could puncture a standard air pneumatic tires such as junkyards or lumber yards will benefit from solid resilient pneumatic forklift tires.

Benefits of Cushion Tire Forklifts Cushion tire forklifts can be used inside and outside on smooth surfaces. The forklift designed for use with cushion tires, is intended to be used mostly indoors, with some limited outdoor use. Warehousing applications and manufacturing facilities often rely on cushion tire forklifts. Work which requires forklift operations in tight areas, such as narrow aisles, are ideal for the use of a cushion tire forklift. Some benefits of using a cushion tire forklift over a pneumatic tire forklift are:

- 1) **Maneuverability** Since cushion tire forklifts do not need to house a larger internal combustion engine, they are more compact and easier to maneuver.
- 2) **Lower Clearance** Forklifts built for indoor use with cushion tires generally have a lower clearance than pneumatic tire equipment, allowing the forklift to more easily navigate doorways and other obstacles such as lights and sprinkler systems.
- 3) **Durability** Cushion tires for forklifts are durable, easy to maintain and have little to no risk of puncture.
- 4) **Quiet** Because the majority of cushion tire forklifts are powered by battery or fuel cell, instead of an internal combustion engine, they are much less noisy than propane or diesel powered forklifts.
- 5) **Environmentally Friendly** Powered by electricity instead of relying on an internal combustion engine enables cushion tire forklifts to make zero dangerous emissions.

Forklift Tire Choice Most forklift frames only allow for either a cushion tire or a pneumatic tire. Tires and axles are specific to the lifting capacity and the machine's frame. Most forklift manufacturers design forklifts to operate safely with specific wheels and tires, namely cushion tires or pneumatic tires. Because of this, it is more useful to choose the best forklift type, considering the type of tires the forklift will require and how it fits the job application, rather than attempting to modify the forklift by choosing the right tire for the application.

Workplace Applications

Suitable Work Applications for Cushion Tires Cushion tire forklifts are usually the best option for many workplace applications. If there is moderate use of the forklift outside on smooth surfaces and the majority of the lifting, loading and transporting will be occurring inside on smooth floors, a cushion tire model is an excellent tool. Sitting closer to the ground, cushion tire forklifts have a tinier frame compared to pneumatic tire forklifts. This gives them better clearance for fitting through doorways and avoiding overhead obstacles. However, cushion tire forklifts also have less clearance to the

ground which can result in cushion tire forklifts getting easily hung up on outdoor obstacles where the surface is not cleared or even. To combat this issue, the cushion tire forklift can be fitted with traction tires on the front. Traction style tires will give better traction on rough terrains like asphalt or packed gravel or wet surfaces. These tires are not recommended for travelling on grass or dirt. Traction tires are utilized on the opposite sides, the steer and drive axles. The smaller turning radius on the cushion tire forklifts is one of their main advantages. Cushion tire forklifts are excellent for manufacturing facilities and warehouse operations that are compact with less space. Locations that rely on narrow aisles will benefit greatly from the smaller cushion tire forklifts and their tight turning capabilities. Cushion tire forklifts are also less expensive and are more readily available than pneumatic tire forklifts. Suitable Work Applications for Pneumatic Tire Forklifts

Pneumatic tires forklifts have air in them and are better for outdoor use such as in yard work or on gravel. Some interior locations may utilize pneumatic tire forklifts; however, they do not offer a small turning radius or the lower clearance and maneuverability that the cushion tires provide. Pneumatic tire forklifts operate with an internal combustion engine and these harmful emissions are dangerous for use indoors. Measuring wider and longer in comparison to cushion tire forklifts, pneumatic tire models are mostly utilized outside. There are two kinds of pneumatic tires; the air-filled pneumatic tire is less expensive than the solid pneumatic tire. The solid pneumatic tire is comprised of solid rubber without any air inside, making this type more resilient against gouges or punctures. Solid pneumatic tires are commonly used in lumber and scrap yards where there are tons of sharp, metal debris including nails. Air pneumatic tires work great outside on gravel and asphalt applications. Air-filled pneumatic tires can easily become punctured and their working environment needs to be evaluated carefully. It is essential to ensure the work site is free from any sharp materials before using a forklift with air pneumatic tires. Air tires are also known to give a bouncy ride, contributing to operator discomfort and fatigue. It is possible to foam fill the pneumatic forklift tires for a smoother ride. The foam filling option creates a more even ride compared to the solid pneumatic tires or the bounciness of the air-filled pneumatic tires. Flat tires can be filled with foam to keep them more durable and prevent flats. It takes roughly three days to fill and cure an air pneumatic tire with foam.

Difference in Load Capacity The load capacity on for pneumatic tire forklifts and cushion tire forklifts are fairly equal. Lift limits are given for certain electric-powered cushion tire forklifts. However, cushion and pneumatic tire forklifts can basically be obtained with just about any load capacity. Load capacities come in a wide range - from less than 2,000 pounds to more than 200,000 pounds.