

Polyurethane Forklift Wheels & Pallet Jack Rollers

Title	Polyurethane Forklift Wheels & Pallet Jack Rollers
Thumb	
Address	Anfeng Industrial Park, Dongtai City, Jiangsu, China
Website	https://www.poly-wheels.com/
Email	sale06@kfqizhongji.com

Description

In modern material handling systems, Polyurethane (PU) forklift wheels are critical PU and cold chain logistics. the gold standard for warehousing, automotive manufacturing,



1. Core Advantages of Polyurethane Forklift Wheels

Why are leading global forklift brands (such as Linde, Toyota, and Jungheinrich) prioritize polyurethane?

Example Load Capacity & Durability: With a hardness range typically between 80A deformation, ensuring stability during high-lift stacking.

Chemical & Oil Resistance: Unlike rubber wheels, significantly extending service life in harsh factory environments.

Noise Reduction & Vibration Damping: The high elasticity of PU ensures high frequency transportation of fragile goods.

Non-Marking & Clean Room Compliance: Polyurethane formulas are ideal for pharmaceutical and food processing facilities requiring sterile environments.

2. Functional Classification of Forklift Wheels

Forklift wheels are engineered differently based on their position and mechanical function.

Category	Primary Function	Technical Highlights
Wheels / Guide	Maneuver the forklift during entry and lifting.	Common diameter, peel debonding under pressure.
Wheels (Power	Transmit motor torque to acceleration.	High traction tread patterns; resistance, maximum shear
Wheels (Bearing	Support the bulk of the forklift and cargo weight.	Large diameter (300mm+); rotation rings for smooth
Swivel Wheels (Casters)	Provide 360° directional control and balance during turns.	Shock absorbing PU skins; surfaces, low maintenance

3. Industry-Specific Custom Solutions

A. High-Frequency Logistics & Distribution Centers

For continuous, high-speed shuttle operations, we provide heat-resistant polyurethane. The pros of the standard high traffic warehouses, which is the leading cause of

B. Food & Pharmaceutical (Clean Rooms)

We offer non-marking, anti-static (ESD) polyurethane wheels in these sensitive environments.

C. Cold Chain Logistics (-40°C Environments)

Standard materials become brittle and lose traction below -40°C, preventing surface cracking and ensuring grip on icy floors.

D. Heavy Manufacturing & Automotive

In environments with metal shavings or oil spills, Philson wheels feature high tear resistance, preventing debris from embedding in the tread and damaging expensive

4. Why Choose Philson Polyurethane Solutions?

Optimized for performance, we don't just sell parts; we engineer performance. Our forklift wheels are

Available Formulations: Anti-static, flame-retardant, and extreme temperature options

Superior Bonding: Advanced casting processes ensure the highest bonding strength between the PU and the core to eliminate delamination.

Precision Engineering: Strict tolerance control ensures 100% compatibility with your existing fleet.

Searching for a more durable, high-performance solution for your fleet? Contact our engineering team today for a technical consultation and quote.