

## 4-Post Mechanical Freight Lift Moves Retail Merchandise



### The Challenge

Our dealer, [Bastian Solutions](#) contacted us about the challenges IKEA was facing with storage needs and increased inventory demands for two of their California store locations. It was becoming essential to improve inventory space. IKEA used their overhead space to install a custom mezzanine for storing their inventory. The next challenge was adding a vertical lift to move inventory to and from the mezzanine level, but designing it to fit within the facilities small footprint and work around the ceiling obstructions.

### The Autoquip Solution

Because of the application requirements of moving heavy loads up to 6,600 lbs., travel up to 214 inches, and repeatable stopping and holding of the carriage for loading and unloading, we knew our 4 Post Mechanical Freight Lift would be the ideal lifting solution for IKEA. However, we had to review the existing design to look for a way to relocate the single drive assembly due to the customer's overhead clearance issue. This involved moving the single drive assembly which typically is centered over the carriage atop of the 4-Post Mast to installing a nested drive assembly to each mast individually. The design utilizes shaft encoders for synchronizing each drive assembly to determine the rate of speed and positioning. HMI monitoring makes sure the lift is operating and running smoothly.

Specifications:

Model# FL4M-8



Capacity: 6,600

Platform: 73X126

Travel: 214

Actuation: Mechanical

Features: HMI Control Panel, Platform Laser positioning

## The Solution Benefits

With our extensive design library and engineering experience, we were able to make modifications to an existing design in order to meet the customer's application requirements. IKEA is now in position to have inventory on hand, easily access it and move it quickly from the mezzanine level to ground, and into the store.