# Eagle Poly-V Belts Replace Roller Chain



Roller chain can handle a lot of weight, but it has some significant downsides. It's noisy and needs regular maintenance. It's expensive, and when it breaks, workers can be injured.

Even its performance is a problem. To make it an endless loop, the fit must be loose, which causes a lag between the time the motor starts and when the rollers start to move. Over time, the chain stretches, making positioning less accurate and the conveyor less efficient. To fix it, you either adjust the take-up sprockets or remove a link.

Recognizing the noise, cost, maintenance, and poor performance, one of the leading EV car battery manufacturers was looking for an alternative for RS 50 roller-chain to drive a one-metric-ton pallet conveyor. The roller conveyor had 76mm rollers with 56mm end caps interlocking by 8EPJ536.

A local sales representative suggested redesigning the roller conveyor system to use Fenner Industrial Motion's Eagle Poly-V belts. Made from polyurethane, Eagle Poly-V belts are available for all kinds of power transmission applications with designs and reinforcements to fit every need.

By eliminating chain, the battery manufacturer could reduce noise and eliminate the downtime, labor, and maintenance costs the chain drive requires.

> Using an Eagle Poly-V belt is safer, cleaner, and less likely to cause bodily injuries in the event of a failure.



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### The company purchased the Eagle Poly-V belts and installed them on the conveyor. It has documented the following improvements:

- LESS NOISE. Eagle Poly-V had a significant reduction in decibels, compared to roller-chain.
- **IMPROVED PERFORMANCE.** Unlike the roller chain, the Eagle Poly-V belt maintains consistent tension, transmitting the motor's action immediately to the roller. That means it provides more efficient power transmission.
- **REDUCED COMPONENT COSTS.** Switching to Poly-V saved the EV plant 10-15% in initial build and annual maintenance costs for roller sprockets and pulleys required for chain drives.
- REDUCED MAINTENANCE COST. Overall reduction in total maintenance costs due to less loss of tension and no greasing needed.
- **ENHANCED SAFETY.** The Eagle Poly-V eliminated safety concerns associated with chain, especially injuries associated with accidents.



 A CLEANER WORKING ENVIRONMENT. A major benefit for EV plants is the elimination of debris within the facility. Chains becomes corroded when exposed to moisture, dust, and chemicals in the typical industrial environment. Even traditional rubber poly-v belts generate dust. Unlike rubber poly-v belts, Eagle Poly-V belts are a clean, dust-free solution that is optimal for EV plants.

### **EAGLE POLY-V BELTS**

Eagle Poly-V belts are designed to support your performance requirements and outperform conventional rubber poly-v belts. Eagle Poly-V's rugged durability, and resistance to abrasion and harsh environments lead to longer belt life. Higher productivity. Consistent performance. Less downtime.

# Find out how Eagle Poly-V belts can help you extend belt life, cut downtime, and improve performance. <u>Visit the our website to learn more!</u>



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