

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:04:46 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 30
Average Utilization: 74.5%
Throughput Increase: 34.2%
Labor Cost Reduction: 28.5%
ROI Period: 2.3 years

Warehouse Performance

Warehouse Location		Capacity Used	Inbound/Day	Outbound/Day	Picking Accuracy	Automation Level	Status
Distribution Center A	Chicago, IL	44.3%	1,529	2,947	95.9%	75.2%	Improvement Needed
Distribution Center B	Dallas, TX	76.9%	2,254	1,957	95.4%	62.7%	Improvement Needed
Distribution Center C	Atlanta, GA	67.6%	2,577	2,465	96.1%	77.4%	Improvement Needed
Distribution Center D	Los Angeles, CA	81.2%	2,295	2,875	98.2%	81.3%	Optimized
Distribution Center E	Newark, NJ	125.6%	1,525	2,464	95.2%	76.0%	Improvement Needed

Optimization Opportunities

- Deploy 5 additional AGVs in Warehouse 3 to increase throughput by 20%

- Implement voice-picking system to improve accuracy to 99.8%

- Upgrade WMS integration for real-time inventory visibility

- Add automated sortation system for small package handling

- Implement predictive analytics for demand-based staffing

- Consider AS/RS system for high-velocity SKUs