

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:01:33 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 58
Average Utilization: 68.4%
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	46.7%	2,947	2,395	97.2%	74.7%	Improvement Needed
Distribution Center B	Dallas, TX	75.8%	2,032	2,537	98.2%	60.2%	Improvement Needed
Distribution Center C	Atlanta, GA	89.6%	1,361	3,680	97.0%	66.7%	Improvement Needed
Distribution Center D	Los Angeles, CA	57.5%	2,672	2,462	97.1%	75.0%	Improvement Needed
Distribution Center E	Newark, NJ	81.6%	2,333	2,491	96.2%	65.2%	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