

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:05:00 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 75
Average Utilization: 72.2%
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	69.3%	2,284	1,961	95.9%	65.7%	Improvement Needed
Distribution Center B	Dallas, TX	36.7%	1,811	2,496	99.4%	93.2%	Optimized
Distribution Center C	Atlanta, GA	90.0%	1,495	1,676	98.6%	72.5%	Improvement Needed
Distribution Center D	Los Angeles, CA	50.6%	2,539	3,681	98.2%	62.3%	Improvement Needed
Distribution Center E	Newark, NJ	98.9%	1,151	3,835	99.0%	67.2%	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