

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:03:37 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 42
Average Utilization: 84.3%
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	62.0%	2,535	2,215	98.9%	90.5%	Optimized
	Dallas, TX	72.2%	1,590	2,723	96.8%	93.6%	Optimized
Distribution Center B	Atlanta, GA	70.4%	2,870	3,529	98.5%	75.6%	Improvement Needed
Distribution Center C	Los Angeles, CA	105.5%	2,719	3,101	95.2%	94.0%	Optimized
Distribution Center D	Newark, NJ	107.0%	2,571	3,790	98.0%	68.0%	Improvement Needed
Distribution Center E							

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