Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller

Date: 8/3/2025, 8:03:33 AM Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5 Total Robots: 49

Average Utilization: 83.8% 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	n Status
Distribution Chicago, IL	69.0%	2,766	2,883	98.9%	92.5%	Optimized
Center A Distribution Dallas, TX Center B	70.1%	2,442	2,224	96.5%	74.4%	Improvemen t Needed
Distribution Atlanta, GA Center C	102.7%	1,398	2,816	95.1%	73.8%	Improvemen t Needed
Distribution Los	77.4%	1,568	3,184	97.2%	93.2%	Optimized
Genter D Distribution Newark, NJ Center E	¹ 109.8%	1,266	3,320	97.4%	85.1%	Optimized

Optimiz ation O pportun ities

Deploy 5
additional
AGVs in
Warehouse
3 to
increase
throughput
by 20%
• Imple
ment voice-

picking system to improve accuracy to 99.8%

• Upgra de WMS integration for real-time inventory visibility

• Add au tomated sortation system for small package handling

• Imple ment predictive analytics for demand-based staffing

• Consid er AS/RS system for highvelocity SKUs