Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller

Date: 8/3/2025, 8:07:46 AM Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 52

Average Utilization: 78.0% 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	67.9%	1,092	3,517	95.5%	86.0%	Optimized
Center A Distribution Dallas, TX Center B	74.2%	1,589	1,841	98.6%	69.8%	Improvemen t Needed
Distribution Atlanta, GA	38.4%	2,935	2,750	97.7%	86.2%	Optimized
Center C Distribution Los Center D Angeles, CA	55.8% \	1,637	3,547	98.1%	67.1%	Improvemen t Needed
Distribution Newark, NJ Center E	69.7%	1,928	1,827	95.8%	80.8%	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