Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller

Date: 8/3/2025, 8:07:19 AM Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 23

Average Utilization: 77.7% 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 Center A	91.3%	1,462	3,172	95.8%	71.9%	Improvemen t Needed
Distribution Dallas, TX	37.3%	1,243	3,623	99.5%	91.6%	Optimized
Center B Distribution Atlanta, GA Center C	88.9%	1,683	3,672	99.4%	73.2%	Improvemen t Needed
Distribution Los Center D Angeles, CA	53.8% A	2,267	1,621	98.8%	69.4%	Improvemen t Needed
Distribution Newark, NJ Center E	47.7%	1,918	3,957	99.0%	82.4%	Optimized

Optimiz ation O pportun ities

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

ment voicepicking 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