Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller

Date: 8/3/2025, 8:07:34 AM Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 68

Average Utilization: 77.8% 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 Center A	76.3%	1,007	3,013	96.4%	68.3%	Improvemen t Needed
Distribution Dallas, TX	95.2%	1,061	3,431	97.6%	94.5%	Optimized
Center B Distribution Atlanta, GA Center C	70.5%	1,907	3,410	96.7%	70.5%	Improvemen t Needed
Distribution Los Center D Angeles, CA	37.9% A	1,564	2,100	96.9%	64.1%	Improvemen t Needed
Distribution Newark, NJ Center E	88.1%	1,032	3,284	95.5%	91.8%	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