

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:02:01 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 56
Average Utilization: 73.3%
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	94.0%	2,083	1,988	98.7%	61.3%	Improvement Needed
Distribution Center B	Dallas, TX	73.5%	2,027	2,682	98.5%	69.2%	Improvement Needed
Distribution Center C	Atlanta, GA	69.8%	1,104	3,290	95.3%	66.1%	Improvement Needed
Distribution Center D	Los Angeles, CA	69.6%	1,835	3,421	99.0%	81.2%	Optimized
Distribution Center E	Newark, NJ	73.8%	1,992	3,997	99.2%	88.5%	Optimized

Optimization Opportunities

- 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
high-
velocity
SKUs