

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:01:23 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 63
Average Utilization: 73.6%
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	68.5%	1,726	2,877	96.0%	62.9%	Improvement Needed
Distribution Center B	Dallas, TX	35.5%	1,787	2,269	98.2%	70.6%	Improvement Needed
Distribution Center C	Atlanta, GA	71.6%	2,617	1,625	98.9%	61.2%	Improvement Needed
Distribution Center D	Los Angeles, CA	121.4%	2,593	2,255	99.3%	86.5%	Optimized
Distribution Center E	Newark, NJ	44.8%	2,744	1,720	98.7%	86.8%	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