

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:02:44 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 43
Average Utilization: 74.7%
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	Status
Distribution Center A	Chicago, IL	54.4%	2,777	3,505	95.1%	70.6%	Improvement Needed
Distribution Center B	Dallas, TX	98.0%	2,612	3,259	98.9%	84.4%	Optimized
Distribution Center C	Atlanta, GA	94.4%	2,323	3,526	98.9%	64.3%	Improvement Needed
Distribution Center D	Los Angeles, CA	44.7%	1,468	1,744	95.4%	85.6%	Optimized
Distribution Center E	Newark, NJ	69.0%	1,240	1,975	95.8%	68.8%	Improvement Needed

Optimization Opportunities

- Deploy 5 additional AGVs in Warehouse 3 to increase throughput by 20%
- Implement predictive maintenance for robotic arms

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