

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:09:11 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 27
Average Utilization: 77.3%
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	83.8%	1,097	2,767	97.8%	86.0%	Optimized
Distribution Center B	Dallas, TX	68.5%	2,828	2,813	99.3%	65.0%	Improvement Needed
Distribution Center C	Atlanta, GA	86.7%	2,119	2,004	95.6%	68.9%	Improvement Needed
Distribution Center D	Los Angeles, CA	75.6%	1,556	1,858	97.4%	71.9%	Improvement Needed
Distribution Center E	Newark, NJ	71.8%	2,597	2,183	96.0%	94.9%	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