

Warehouse Automation Analytics

Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller
Date: 8/3/2025, 8:07:47 AM
Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 80
Average Utilization: 77.0%
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	63.6%	1,029	1,528	97.4%	92.4%	Optimized
	Dallas, TX	52.0%	2,064	2,362	95.4%	60.5%	Improvement Needed
Distribution Center B	Atlanta, GA	64.9%	2,234	2,479	96.2%	71.5%	Improvement Needed
Distribution Center D	Los Angeles, CA	92.6%	1,227	1,629	95.8%	82.1%	Optimized
Distribution Center E	Newark, NJ	47.3%	1,037	1,586	98.8%	78.3%	Improvement Needed

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