

Warehouse Automation Analytics

Performance metrics and automation optimization insights

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Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 51
Average Utilization: 74.3%
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	81.6%	1,786	2,444	97.5%	78.0%	Improvement Needed
Distribution Center B	Dallas, TX	46.9%	2,350	3,383	97.2%	60.7%	Improvement Needed
Distribution Center C	Atlanta, GA	35.8%	1,594	1,890	96.6%	86.2%	Optimized
Distribution Center D	Los Angeles, CA	43.4%	2,411	2,879	99.4%	60.1%	Improvement Needed
Distribution Center E	Newark, NJ	47.2%	2,667	1,581	95.8%	86.4%	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