

Warehouse Automation Analytics

Performance metrics and automation optimization insights

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Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 43
Average Utilization: 72.5%
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	61.0%	2,845	3,861	95.3%	68.4%	Improvement Needed
Distribution Center B	Dallas, TX	82.7%	2,317	2,984	95.2%	66.6%	Improvement Needed
Distribution Center C	Atlanta, GA	94.4%	1,125	3,555	95.3%	78.5%	Improvement Needed
Distribution Center D	Los Angeles, CA	47.4%	2,859	2,061	97.2%	79.9%	Improvement Needed
Distribution Center E	Newark, NJ	43.3%	2,269	3,728	95.3%	69.3%	Improvement Needed

Optimization Opportunities

- Deploy 5 additional AGVs in Warehouse 3 to increase throughput

by 20%

- Implement voice-picking system to improve accuracy to 99.8%

- Upgrade WMS integration for real-time inventory visibility

- Add automated sortation system for small package handling

- Implement predictive analytics for demand-based staffing

- Consider AS/RS system for high-velocity SKUs