

Warehouse Automation Analytics

Performance metrics and automation optimization insights

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Use Case: warehouse-automation

Automation Overview

Total Warehouses: 5
Total Robots: 26
Average Utilization: 82.4%
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	98.6%	1,691	2,081	98.5%	65.3%	Improvement Needed
Distribution Center B	Dallas, TX	92.8%	1,528	3,623	95.3%	92.7%	Optimized
Distribution Center C	Atlanta, GA	67.3%	1,435	2,337	98.3%	89.2%	Optimized
Distribution Center D	Los Angeles, CA	45.5%	2,855	2,611	97.0%	87.1%	Optimized
Distribution Center E	Newark, NJ	48.2%	1,244	3,107	96.6%	77.4%	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