

# Warehouse Automation Analytics

Performance metrics and automation optimization insights

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Use Case: warehouse-automation

## Automation Overview

Total Warehouses: 5  
Total Robots: 45  
Average Utilization: 81.2%  
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	67.5%	1,620	3,979	97.5%	93.8%	Optimized
	Dallas, TX	60.5%	2,787	1,681	98.9%	90.3%	Optimized
Distribution Center B	Atlanta, GA	84.2%	2,620	3,283	99.0%	66.1%	Improvement Needed
Distribution Center C	Los Angeles, CA	70.7%	2,644	1,921	96.2%	80.0%	Optimized
Distribution Center D	Newark, NJ	95.7%	2,188	3,922	99.1%	76.0%	Improvement Needed
Distribution Center E							

## 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