

# Warehouse Automation Analytics

Performance metrics and automation optimization insights

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Use Case: warehouse-automation

## Automation Overview

Total Warehouses: 5  
Total Robots: 67  
Average Utilization: 83.0%  
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	69.6%	2,279	2,118	97.4%	81.7%	Optimized
	Dallas, TX	106.1%	2,381	3,504	96.8%	77.9%	Improvement Needed
Distribution Center B	Atlanta, GA	93.7%	1,656	2,930	96.5%	92.1%	Optimized
Distribution Center C	Los Angeles, CA	64.5%	1,814	1,910	99.3%	88.7%	Optimized
Distribution Center D	Newark, NJ	82.1%	2,528	3,088	97.8%	74.6%	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