

# Warehouse Automation Analytics

Performance metrics and automation optimization insights

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Use Case: warehouse-automation

## Automation Overview

Total Warehouses: 5  
Total Robots: 49  
Average Utilization: 79.1%  
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	89.4%	2,716	3,228	97.8%	91.3%	Optimized
	Dallas, TX	59.5%	1,770	1,654	95.7%	65.7%	Improvement Needed
Distribution Center B	Atlanta, GA	46.4%	2,713	1,998	97.2%	81.7%	Optimized
Distribution Center C	Los Angeles, CA	76.7%	1,061	2,302	97.6%	76.1%	Improvement Needed
	Newark, NJ	77.5%	2,137	2,026	96.6%	80.8%	Optimized
Distribution Center D							
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