

# Warehouse Automation Analytics

Performance metrics and automation optimization insights

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Use Case: warehouse-automation

## Automation Overview

Total Warehouses: 5  
Total Robots: 44  
Average Utilization: 70.8%  
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	78.9%	1,258	3,607	97.6%	79.5%	Improvement Needed
Distribution Center B	Dallas, TX	85.7%	2,103	3,174	98.2%	69.8%	Improvement Needed
Distribution Center C	Atlanta, GA	47.1%	2,859	3,911	98.7%	71.1%	Improvement Needed
Distribution Center D	Los Angeles, CA	94.7%	2,453	3,308	99.2%	60.5%	Improvement Needed
Distribution Center E	Newark, NJ	52.7%	2,422	3,624	95.6%	73.0%	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