

# 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: 73.1%  
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	69.1%	2,681	1,740	98.2%	87.3%	Optimized
	Dallas, TX	88.5%	2,844	2,345	95.4%	69.3%	Improvement Needed
Distribution Center B	Atlanta, GA	55.2%	1,372	2,920	98.3%	67.5%	Improvement Needed
Distribution Center D	Los Angeles, CA	47.5%	2,729	2,312	98.6%	80.7%	Optimized
Distribution Center E	Newark, NJ	63.6%	2,507	2,886	97.5%	60.9%	Improvement Needed

## Optimization Opportunities

- Deploy 5 additional AGVs in Warehouse 3 to increase throughput by 20%
- Implement predictive maintenance for all automated systems

ment voice-  
picking  
system to  
improve  
accuracy to  
99.8%

- Upgra  
de WMS  
integration  
for real-time  
inventory  
visibility

- Add au  
tomated  
sortation  
system for  
small  
package  
handling

- Imple  
ment  
predictive  
analytics for  
demand-  
based  
staffing

- Consid  
er AS/RS  
system for  
high-  
velocity  
SKUs