

# Warehouse Automation Analytics

## Performance metrics and automation optimization insights

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Use Case: warehouse-automation

### Automation Overview

Total Warehouses: 5  
Total Robots: 57  
Average Utilization: 75.9%  
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%	1,093	2,242	98.7%	80.0%	Optimized
	Dallas, TX	50.7%	1,116	2,636	96.8%	77.6%	Improvement Needed
Distribution Center B	Atlanta, GA	119.7%	2,717	3,321	96.3%	89.2%	Optimized
Distribution Center C	Los Angeles, CA	70.4%	1,849	2,692	98.0%	71.2%	Improvement Needed
	Newark, NJ	96.0%	2,541	1,955	95.6%	61.3%	Improvement Needed

### Optimization Opportunities

- Deploy 5 additional AGVs in Warehouse 3 to increase throughput by 20%
- Imple

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