## **Warehouse Automation Analytics**

### Performance metrics and automation optimization insights

Generated by: Vanguard Warehouse Controller

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#### **Automation Overview**

Total Warehouses: 5 Total Robots: 58

Average Utilization: 78.0% 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	n Status
Distribution Chicago, IL Center A	90.6%	1,795	2,433	96.2%	72.6%	Improvemen t Needed
Distribution Dallas, TX Center B	37.5%	1,071	3,790	96.8%	69.1%	Improvemen t Needed
Distribution Atlanta, GA	42.2%	2,259	3,568	96.4%	92.0%	Optimized
Center C Distribution Los Center D Angeles, CA	71.7% A	1,412	3,542	97.5%	73.4%	Improvemen t Needed
Distribution Newark, NJ Center E	83.2%	1,498	1,523	98.5%	82.7%	Optimized

# Optimiz ation O pportun ities

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

ment voicepicking 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 highvelocity SKUs