Improving Inventory Accuracy with Aerial Inventory Robotics (Drones)

Presented by:
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CEO, PINC
Inventory checks are done manually:

>90%

Inventory accuracy:

89%-99%

VIDEO
Inventory accuracy is still a manual process

- Manual repetitive tasks by humans are the norm
- Operations still lack sophistication & technology enablement
- Enhancing humans with technology doesn’t eliminate errors
- Checks are time consuming, risky & utilize expensive equipment
- There’s never enough time with existing staff
- Accuracy lacks precision
Aerial robots for Inventory Tracking

Automatic, accurate, efficient, and safe inventory checks in hard to reach locations.
Industrial Revolutions 1.0 to 4.0

- Autonomous Vehicles and Robots
- Sensor Fusion
- Deep-Learning Computer Vision
- Machine <> Human Collaboration
- Big Data & Artificial Intelligence

Picture by Christoph Roser
Design Principles for an Industry 4.0 Solution

- Augment Existing Operations & Investments
- Packaged as Self-Contained Robot Solution
- Robots Need to be Fully Autonomous
- No Additional Infrastructure Investment to Operate Robots
- No Change in the Way Inventory is Labelled
- Robot Sensors Understand/React to Changes in the Environment
- Computer Vision is Able to Understand/Interpret What the Robot is Looking At
- Robots & Humans Can Interact and Collaborate
- Rich Data Generated in Real-Time
Automation Redefines the Process

1. Physical Inventory
2. Cycle Count
3. Automated Inventory Management
DEMO
MAKE YOUR BUSINESS FUTUREPROOF.

CLOUD + EDGE PLATFORM
AUTONOMOUS NAVIGATION
INVENTORY IDENTIFICATION
ENHANCED POWER
ADVANCED FRAME
Key Benefits

• **Improved Inventory Accuracy Rates**
  – Frequent automatic inventory checks
  – Reduced losses due to inventory shrinkage
  – More reliable financial reporting and conversion-cycle key performance indicators (KPIs)
  – Better decision making about reorder points, out-of-stock inventory and excess inventory

• **Greater operational efficiency**
  – Savings in personnel costs or operations downtime
  – Elimination of resources and equipment
  – Staff retrained to handle more

• **Employee safety**
### Union City - Missions

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<th>State</th>
<th>Mission ID</th>
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For More Information:

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Or visit MODEX Booth B2620