Increasing Productivity and Quality Insights into Maintenance Activities
Retrofit sensor platform that turns legacy machines into “data storytellers”.
“The only true history is the history we’ll never know about.”
START WITH WHY

Too many organizations are flying blind.
OUR MISSION

Find hidden data that improves organizations.
WHAT WE DO

Makerswift converts previously unobtainable manufacturing data into actionable intelligence to improve quality and performance outcomes for SMMs and any organization with many low volume operations.
OUR PARTNERS

NCMS
NATIONAL CENTER FOR MANUFACTURING SCIENCES

DMDII
DIGITAL MANUFACTURING AND DESIGN INNOVATION INSTITUTE

GM

ACE
CLEARWATER

Georgia Tech

?
PROBLEM: Legacy machines don’t talk.

High maintenance & liability cost

Unexpected and long downtime

Lack of visibility = Uncertain quality + Low productivity

Not enough data to optimize

Uncertain quality + Low productivity

Not enough data to optimize

Unknown common root
High variability and complexity means data is even more important.
MAKERSWIFT SOLUTION

Fitbit for Manufacturing and Maintenance
Low-cost retrofit sensors acquire data; sensors are easy to install and maintain.

Data analysis platform delivers actionable insights for improved outcomes.

Top-floor to shop-floor real-time access from elegant mobile and desktop UI.
INITIAL DATA POINTS

1. On/off
2. Vibration frequency
3. Temperature
4. Pressure
5. Humidity
6. Audio (dB, frequency)
7. Custom data points

Real-time + Historical + Predictive
(Yesterday, Today, Tomorrow)
REAL-TIME VISIBILITY, ACTIONABLE INSIGHTS

1. How much time does the machine spend in cycle?
2. Is machine running consistently?
3. Is machine running to spec?
4. Where is a part or piece of equipment?
5. How is machine performing compared to its peers?
6. How is operator performing compared to her peers?
PLATFORM
USER EXPERIENCE

- Consumer-tested paradigm
- Subscribe to machines, people, etc.
- Real-time status alerts
- Sharing and Talk Tools
- Standard + Custom Dashboards
- Mobile Access

Tools:
- Temperature
- Machine on percentage (98%)

Graphs:
- Temperature
- Humidity (%)
HARDWARE DESIGN

- Machine-appropriate enclosures
- Houses circuit board, battery, and sensor(s)
- Easily scalable for different platforms
- Easily attached to any type of machine
- Data streaming in 15 minutes
Temperature

Temperature

Machine on percentage

98%
MAKERSWIFT ADVANTAGES

**Low-Cost, Easy Installation**
- Robust, low-cost hardware
- Plug & Play - minimal IT support needed

**Key Insights**
- Accurate and actionable
- Customizable by machine
- Alert system based on goals and limits
- Pattern recognition
- Predictive analytics

**Accessible and Scalable**
- Fits the CTMA paradigm
- Useful data for every role
- Mobile and web access
- Massively expandable
- Secure connectivity and data storage
BENEFITS

- Reduce downtime
- Improve quality
- Increase capacity and throughput
- Decrease waste and rework
- Improve visibility into machine and operator performance
UNIQUELY QUALIFIED

- Vetted by NCMS, DMDII, and GM
- Serial entrepreneurs, six companies started
- Manufacturing and data analytics background
- NCMS Board member, Dawn White
- Georgia Tech professor, Tom Kurfess
GET INVOLVED

- Looking for a few good partners...
- Tech validation and business value proposition
- Optimization testing
- Comprehensive results
- Ongoing service post-pilot
THANK YOU

Andrew Bank
Chief Marketing Officer
abank@makershift.com
734-531-8489