

Building an RFID Business Case

Edited and Presented by

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Agenda

- Closed Loop vs. Open Loop
- RFID as Infrastructure
- Building a Business Case
- Evaluation & Prioritization
- Pilot Phase
- ROI Models

Firstly..... Answer this

- Question 1:

- Do you want to deploy RFID as a point solution or as infrastructure ?
 - Point solution solves one problem
 - Infrastructure can be used to support multiple applications

Business case

- What does the solution look like !!
 - Required at both strategic and operational levels
 - Required across individual business units (SBU's)
 - Required across geographies

Plan and consider at product / process level

Building a Business Case

- Pay attention to business **processes**
- Draft a clear understanding of the business **requirements**
- Identify appropriate **technologies** that will help address identified requirements
- Deploy pilot project
 - Observe performance of selected technologies
 - Uncover challenges that might have been unaccounted during initial planning stages

Building a Business Case

- Communicate, communicate, communicate...
- Revisit initial assumptions and update based on current information
- Spend time and effort on data management

Acting on real time information will enable operational benefits

RFID as Infrastructure

- Multiple applications can be supported using same infrastr
 - Remember “Question 1” from earlier
- Think across SBU’s (think broad !)
- Support costs shared over multiple applications
 - **Example:** premises access solution deployed to identify vehicles can be used to enable better records keeping for vehicle maintenance

**THINK
BIG!**

Remember: Set goals

➤ Implement RFID



➤ Production tracking / asset visibility



➤ Accurate Inventory



➤ Meet standards



➤ Prevent out of stock



Evaluation & Prioritization

- What are the quantifiable costs & benefits?
- Will the initiative be critical in enabling bottom-line benefits?
- Will the initiative create a strategic point of difference or enable better quality of service?

Consider - Open Loop vs Closed Loop

- Open Loop Solutions
 - Applications / assets span multiple organizations and/or locations and **do not return**
 - More Challenging ROI
- Closed Loop Solutions
 - Applications / assets span single chain and **do return**
 - Less Challenging ROI

Closed Loop Solutions

- Closed loop solutions solve a specific problem
 - Lost, stolen, misplaced assets
 - Manufacturing errors
 - Improved warehousing throughput
 - Time wasted searching for documents

Closed Loop Solutions

- Business case is easier to develop
- Identify pain points within the organization
- Quantify loss (assets, productivity)
- Evaluate potential benefits
- Organization paying for deployment experiences the benefits!

Open Loop Solutions

- Open loop solutions tend to benefit last trading partner in the chain (provided data is accessible)
 - Item tracking in retail
 - Pharmaceutical tracking
 - Traceability initiatives
 - Ideal for vertical ownership (easier to implement and get ROI)

Business Case – Open Loop

- Business case is complex to develop
- Identify pain points within the entire supply chain
- Quantify value of information at various points and for various stakeholders
- Evaluate potential benefits
- Determine an appropriate mechanism for sharing deployment costs!

Evaluate Potential Challenges

- Even across identical products, no two value chains are the same.. They can differ in terms of....
 - Costings
 - Span
 - Level of automation

.... Each case is different..... Each ROI may be different !!

Evaluate Potential Challenges

- What processes will be impacted in one or multiple businesses units and/or functions?
- Are new processes being created, and/or current processes being significantly retooled?
 - If yes – Can / Are you willing to adopt

Evaluate Potential Challenges

- How many people / employees are impacted?
- Are reporting relationships and performance measures affected?
- Are there dependencies on long-term integrated solutions and/or significant data conversions?

Analyze Current Processes

- Break down the way you are doing things today
- Analyze gaps or weaknesses in those processes
- Examine how they might be addressed, given the ability to gather RFID data at key points in those processes

Pilot Phase

- ✓ Limit the scope
- ✓ Run the pilot - then run it again....
- ✓ Examine assumptions
- ✓ Examine other changes going on to confirm benefits came from RFID and not other factors
- ✓ Determine the return on investment (ROI)

Pilot Phase

- Confirm the benefits that can be achieved
- Make sure the hardware and software perform the way they did in the field test
- Make sure people are trained properly
- Prepare for the roll out

ROI Models

- Measurable enhancements should be determined based on functional area and goals (from earlier)
 - **Operational enhancements**
 - Cost savings due to more efficient processes
 - **Strategic enhancements**
 - Overall corporate performance

ROI Models

- **Security enhancements**
 - Increased security; cost savings might not be an objective
- Need flexible ROI models based on maturity of project

ROI – Model types

- Innovative Project applications
- Mature Project applications

.....Know the difference

ROI Models – Innovative Projects

- Realistic cost savings might be hard to predict
- Lack of experiential knowledge
 - Lots of assumptions to build initial ROI
- Track project success based on defined deliverables
 - Freeze requirements to avoid scope creep
 - Tangible deliverables based on requirements

ROI Models – Mature Projects

- Ability to predict cost savings based on experiential knowledge
- Well defined requirements & deliverables
- Project success measured based on initial calculations
- $ROI = (Benefits - Costs) / Costs$

Business Case



Business Case

FINANCE

- INVENTORY – HOLD/COST/TURNOVER (9.6%)
- LABOR REDUCTION (26%)
- INVOICING (65%)
- SAFETY STOCK (27%)

Business Case

OPERATIONS

- PROCESS / LOGISTICS EFFICINECY (15%)
- LEAD TIMES (70%)
- INVENTORY COUNT ASSET VISIBILITY (72%)

Business Case

CRM

- PROCESSING / VERIFYING NEW EXISTING ORDERS (25%)
- STOCK OUTAGES (22%)

Some headlines

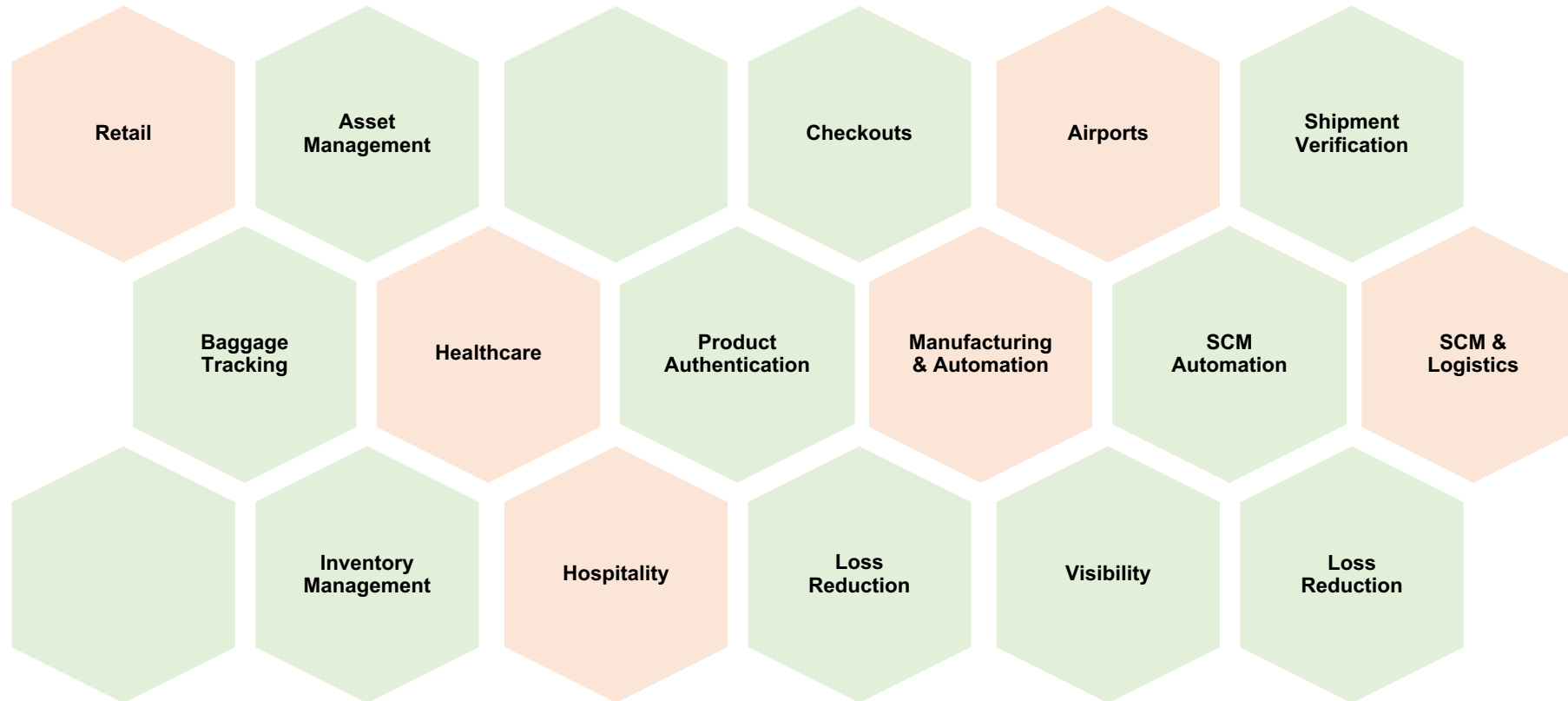
- 10 fold reduction in asset inventory time using RFID
- Porcelain & Ceramics achieved 12 month ROI
- Download free Apparel calculators
- Finland Apparel store – less than 6 month ROI
- Increase quality checks to 100% (Medical Industry)
- Inventory reduced to 10% of time using barcode over RFID
- More Information @ - <https://www.rfidjournal.com/>



Where do we see RFID

APPLICATION

SECTOR



Questions ?

Thank you

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RFID JOURNAL LIVE!

MAY 9-11, 2023 | ORLANDO, FLORIDA

THE FUNDAMENTALS OF RFID: BASICS AND MORE 2023

The end !!

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THANK YOU

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