



Internet of Things SL
Sensing Assets

RETAIL INVENTORY TRACKING AND EAS AN RFID USE CASE

LANDSCAPE

- Several retail stores
- Multiple warehouses
- Disparate IT systems
- Seasonal merchandise

BUSINESS DRIVERS

- Reduce out of stock
- Increase sales
- Real-time product breakeven analysis
- Reduce labor costs and eliminate errors in receiving, put-away & pick operations
- Reduce shrinkage at front and back doors
- Improve demand visibility for better forecasting

CHALLENGES

- Shrinkage of low & high cost products
- Visibility of multi-store shopper traffic, sales, inventory
- Inefficiencies in store & warehouse inventory, receive and put-away processes
- Shoppers arrive in groups, presenting challenges to real time buying pattern resulting in OOS and lost sales

A regional retailer with multiple warehouses and several outlets sought to reduce high costs associated with “lost sales” and “out of stock” situations. The retailer’s unique business model created uneven bursts of demand with a large percentage of business from one-time shoppers. Having the right product stocked and displayed when shoppers arrive was a key business driver.



HIGHLIGHTS

With RFID deployed at the item level to cover 100% of the products carried in stores, linked to the IoT demand-based inventory replenishment system, out of stock situations on the sales floor were eliminated.

The RFID tags also doubled as Electronic Article Surveillance (EAS), serving as a theft deterrent, providing increased ROI. With the IoT software platform, depletion of inventory from shelves was instantly visible, ensuring prompt restocking.

Strategic placement of RFID readers in stores and warehouses resulted in real time inventory visibility throughout the store – from the shelf to fitting room to the back room. This enabled pick slips to be generated for back room and warehouses to move inventory to the sales floor based on demand – Demand-based Inventory Replenishment. This resulted in an increase in sales and profits by eliminating out of stock situations as well as minimizing shrinkage.

Inefficiencies in the manual stocking process, locating in-stock merchandise at the store, and the lack of real time visibility in store inventory and sales resulted in excess stocking, higher inventory carrying costs and lower profits. With RFID, tracking merchandise movement across checkout counters and doors offered real time analytics of store performance.

OUTCOME

Our clients are very pleased with the value delivered from our deployment of item-level RFID tagging within the company. They are expanding their use of this technology and the management analytics it affords.

The visibility and operational efficiency now available is essential to their continued growth and profitability.

Inventory Report											
SKU	DESC	Description	Color	Qty	Unit	Min Stock	Max Stock	Reorder Pt	Vendor	Cost	Value
23000004001	0000000000	T-SHIRT		100	EA	10	100	10	ABC INC	1.00	100.00
23000004002	0000000000	T-SHIRT		50	EA	5	50	5	ABC INC	2.00	100.00
23000004003	0000000000	T-SHIRT		20	EA	2	20	2	ABC INC	5.00	100.00
23000004004	0000000000	T-SHIRT		10	EA	1	10	1	ABC INC	10.00	100.00
23000004005	0000000000	T-SHIRT		5	EA	0.5	5	0.5	ABC INC	20.00	100.00
23000004006	0000000000	T-SHIRT		2	EA	0.2	2	0.2	ABC INC	50.00	100.00
23000004007	0000000000	T-SHIRT		1	EA	0.1	1	0.1	ABC INC	100.00	100.00
23000004008	0000000000	T-SHIRT		0.5	EA	0.05	0.5	0.05	ABC INC	200.00	100.00
23000004009	0000000000	T-SHIRT		0.2	EA	0.02	0.2	0.02	ABC INC	500.00	100.00
23000004010	0000000000	T-SHIRT		0.1	EA	0.01	0.1	0.01	ABC INC	1000.00	100.00
23000004011	0000000000	T-SHIRT		0.05	EA	0.005	0.05	0.005	ABC INC	2000.00	100.00
23000004012	0000000000	T-SHIRT		0.02	EA	0.002	0.02	0.002	ABC INC	5000.00	100.00
23000004013	0000000000	T-SHIRT		0.01	EA	0.001	0.01	0.001	ABC INC	10000.00	100.00
23000004014	0000000000	T-SHIRT		0.005	EA	0.0005	0.005	0.0005	ABC INC	20000.00	100.00
23000004015	0000000000	T-SHIRT		0.002	EA	0.0002	0.002	0.0002	ABC INC	50000.00	100.00
23000004016	0000000000	T-SHIRT		0.001	EA	0.0001	0.001	0.0001	ABC INC	100000.00	100.00
23000004017	0000000000	T-SHIRT		0.0005	EA	0.00005	0.0005	0.00005	ABC INC	200000.00	100.00
23000004018	0000000000	T-SHIRT		0.0002	EA	0.00002	0.0002	0.00002	ABC INC	500000.00	100.00
23000004019	0000000000	T-SHIRT		0.0001	EA	0.00001	0.0001	0.00001	ABC INC	1000000.00	100.00
23000004020	0000000000	T-SHIRT		0.00005	EA	0.000005	0.00005	0.000005	ABC INC	2000000.00	100.00
23000004021	0000000000	T-SHIRT		0.00002	EA	0.000002	0.00002	0.000002	ABC INC	5000000.00	100.00
23000004022	0000000000	T-SHIRT		0.00001	EA	0.000001	0.00001	0.000001	ABC INC	10000000.00	100.00
23000004023	0000000000	T-SHIRT		0.000005	EA	0.0000005	0.000005	0.0000005	ABC INC	20000000.00	100.00
23000004024	0000000000	T-SHIRT		0.000002	EA	0.0000002	0.000002	0.0000002	ABC INC	50000000.00	100.00
23000004025	0000000000	T-SHIRT		0.000001	EA	0.0000001	0.000001	0.0000001	ABC INC	100000000.00	100.00
23000004026	0000000000	T-SHIRT		0.0000005	EA	0.00000005	0.0000005	0.00000005	ABC INC	200000000.00	100.00
23000004027	0000000000	T-SHIRT		0.0000002	EA	0.00000002	0.0000002	0.00000002	ABC INC	500000000.00	100.00
23000004028	0000000000	T-SHIRT		0.0000001	EA	0.00000001	0.0000001	0.00000001	ABC INC	1000000000.00	100.00
23000004029	0000000000	T-SHIRT		0.00000005	EA	0.000000005	0.00000005	0.000000005	ABC INC	2000000000.00	100.00
23000004030	0000000000	T-SHIRT		0.00000002	EA	0.000000002	0.00000002	0.000000002	ABC INC	5000000000.00	100.00
23000004031	0000000000	T-SHIRT		0.00000001	EA	0.000000001	0.00000001	0.000000001	ABC INC	10000000000.00	100.00
23000004032	0000000000	T-SHIRT		0.000000005	EA	0.0000000005	0.000000005	0.0000000005	ABC INC	20000000000.00	100.00
23000004033	0000000000	T-SHIRT		0.000000002	EA	0.0000000002	0.000000002	0.0000000002	ABC INC	50000000000.00	100.00
23000004034	0000000000	T-SHIRT		0.000000001	EA	0.0000000001	0.000000001	0.0000000001	ABC INC	100000000000.00	100.00
23000004035	0000000000	T-SHIRT		0.0000000005	EA	0.00000000005	0.0000000005	0.00000000005	ABC INC	200000000000.00	100.00
23000004036	0000000000	T-SHIRT		0.0000000002	EA	0.00000000002	0.0000000002	0.00000000002	ABC INC	500000000000.00	100.00
23000004037	0000000000	T-SHIRT		0.0000000001	EA	0.00000000001	0.0000000001	0.00000000001	ABC INC	1000000000000.00	100.00
23000004038	0000000000	T-SHIRT		0.00000000005	EA	0.000000000005	0.00000000005	0.000000000005	ABC INC	2000000000000.00	100.00
23000004039	0000000000	T-SHIRT		0.00000000002	EA	0.000000000002	0.00000000002	0.000000000002	ABC INC	5000000000000.00	100.00
23000004040	0000000000	T-SHIRT		0.00000000001	EA	0.000000000001	0.00000000001	0.000000000001	ABC INC	10000000000000.00	100.00
23000004041	0000000000	T-SHIRT		0.000000000005	EA	0.0000000000005	0.000000000005	0.0000000000005	ABC INC	20000000000000.00	100.00
23000004042	0000000000	T-SHIRT		0.000000000002	EA	0.0000000000002	0.000000000002	0.0000000000002	ABC INC	50000000000000.00	100.00
23000004043	0000000000	T-SHIRT		0.000000000001	EA	0.0000000000001	0.000000000001	0.0000000000001	ABC INC	100000000000000.00	100.00
23000004044	0000000000	T-SHIRT		0.0000000000005	EA	0.00000000000005	0.0000000000005	0.00000000000005	ABC INC	200000000000000.00	100.00
23000004045	0000000000	T-SHIRT		0.0000000000002	EA	0.00000000000002	0.0000000000002	0.00000000000002	ABC INC	500000000000000.00	100.00
23000004046	0000000000	T-SHIRT		0.0000000000001	EA	0.00000000000001	0.0000000000001	0.00000000000001	ABC INC	1000000000000000.00	100.00
23000004047	0000000000	T-SHIRT		0.00000000000005	EA	0.000000000000005	0.00000000000005	0.000000000000005	ABC INC	2000000000000000.00	100.00
23000004048	0000000000	T-SHIRT		0.00000000000002	EA	0.000000000000002	0.00000000000002	0.000000000000002	ABC INC	5000000000000000.00	100.00
23000004049	0000000000	T-SHIRT		0.00000000000001	EA	0.000000000000001	0.00000000000001	0.000000000000001	ABC INC	10000000000000000.00	100.00
23000004050	0000000000	T-SHIRT		0.000000000000005	EA	0.0000000000000005	0.000000000000005	0.0000000000000005	ABC INC	20000000000000000.00	100.00
23000004051	0000000000	T-SHIRT		0.000000000000002	EA	0.0000000000000002	0.000000000000002	0.0000000000000002	ABC INC	50000000000000000.00	100.00
23000004052	0000000000	T-SHIRT		0.000000000000001	EA	0.0000000000000001	0.000000000000001	0.0000000000000001	ABC INC	100000000000000000.00	100.00
23000004053	0000000000	T-SHIRT		0.0000000000000005	EA	0.00000000000000005	0.0000000000000005	0.00000000000000005	ABC INC	200000000000000000.00	100.00
23000004054	0000000000	T-SHIRT		0.0000000000000002	EA	0.00000000000000002	0.0000000000000002	0.00000000000000002	ABC INC	500000000000000000.00	100.00
23000004055	0000000000	T-SHIRT		0.0000000000000001	EA	0.00000000000000001	0.0000000000000001	0.00000000000000001	ABC INC	1000000000000000000.00	100.00
23000004056	0000000000	T-SHIRT		0.00000000000000005	EA	0.000000000000000005	0.00000000000000005	0.000000000000000005	ABC INC	2000000000000000000.00	100.00
23000004057	0000000000	T-SHIRT		0.00000000000000002	EA	0.000000000000000002	0.00000000000000002	0.000000000000000002	ABC INC	5000000000000000000.00	100.00
23000004058	0000000000	T-SHIRT		0.00000000000000001	EA	0.000000000000000001	0.00000000000000001	0.000000000000000001	ABC INC	10000000000000000000.00	100.00
23000004059	0000000000	T-SHIRT		0.000000000000000005	EA	0.0000000000000000005	0.000000000000000005	0.0000000000000000005	ABC INC	20000000000000000000.00	100.00
23000004060	0000000000	T-SHIRT		0.000000000000000002	EA	0.0000000000000000002	0.000000000000000002	0.0000000000000000002	ABC INC	50000000000000000000.00	100.00
23000004061	0000000000	T-SHIRT		0.000000000000000001	EA	0.0000000000000000001	0.000000000000000001	0.0000000000000000001	ABC INC	100000000000000000000.00	100.00
23000004062	0000000000	T-SHIRT		0.0000000000000000005	EA	0.00000000000000000005	0.0000000000000000005	0.00000000000000000005	ABC INC	200000000000000000000.00	100.00
23000004063	0000000000	T-SHIRT		0.0000000000000000002	EA	0.00000000000000000002	0.0000000000000000002	0.00000000000000000002	ABC INC	500000000000000000000.00	100.00
23000004064	0000000000	T-SHIRT		0.0000000000000000001	EA	0.00000000000000000001	0.0000000000000000001	0.00000000000000000001	ABC INC	100000000000000	