

# How Indoor Location Enables Mobile Retail

## *Place London 2014*

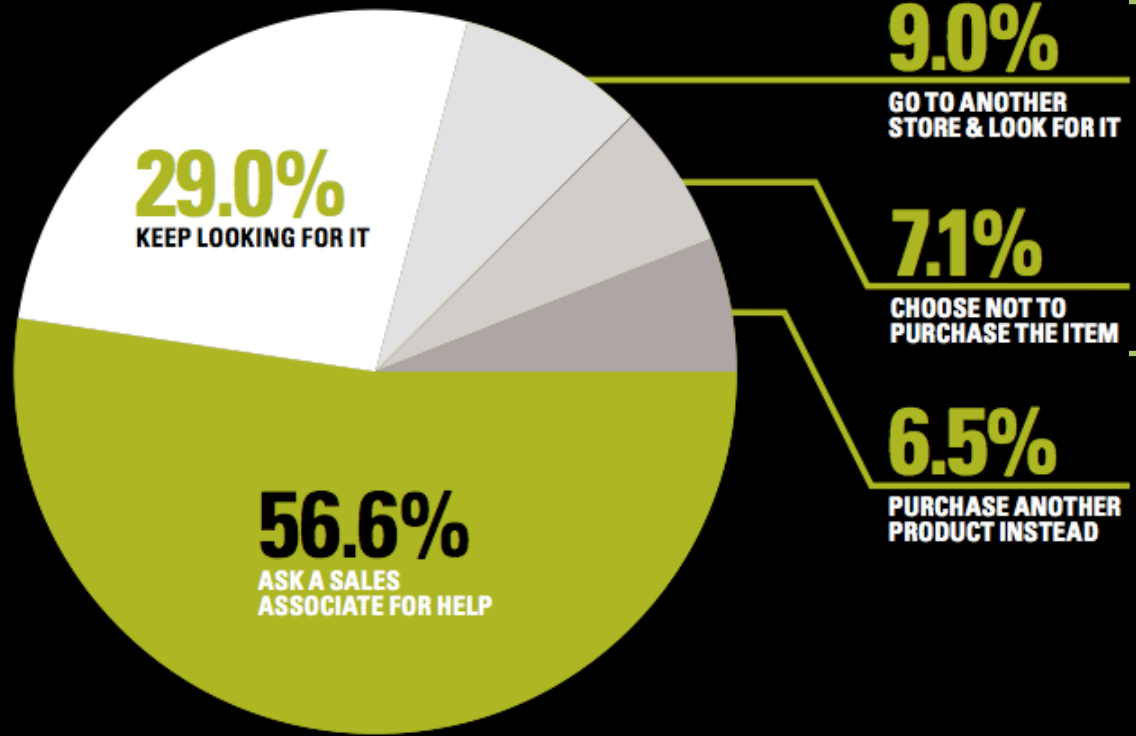


Nathan Pettyjohn | CEO | Aisle411

**\$608,000,000,000**  
**Lost In Retail Walk-Out Sales in 2014**



# WHAT DO CONSUMERS TYPICALLY DO WHEN THEY CAN'T FIND A PARTICULAR ITEM?



aisle411 National Online  
Research Study – Feb. '14

**16% Loss of Sales = \$608 Billion Globally**

**Top 250 Retailers do \$3.8 Trillion of In-Store Sales**

Marketline, 2014



# Imagine Delighting In-Store Shoppers within Seconds of their “Mobile Moment”

---

**Delighting Shoppers with Indoor Location**

**=**

**More Store Visits & Bigger Baskets**

# Agenda

---

## Indoor Location Is Enabling Retail and Mobile

- Key market drivers for Indoor Location
- How Retailers can implement now
  - Use cases
  - Early adopter retailer KPIs
  - How to choose vendors

# Powering indoor maps, search, location and analytics



Coverage:  
13,500 retail locations  
2.3 Million products

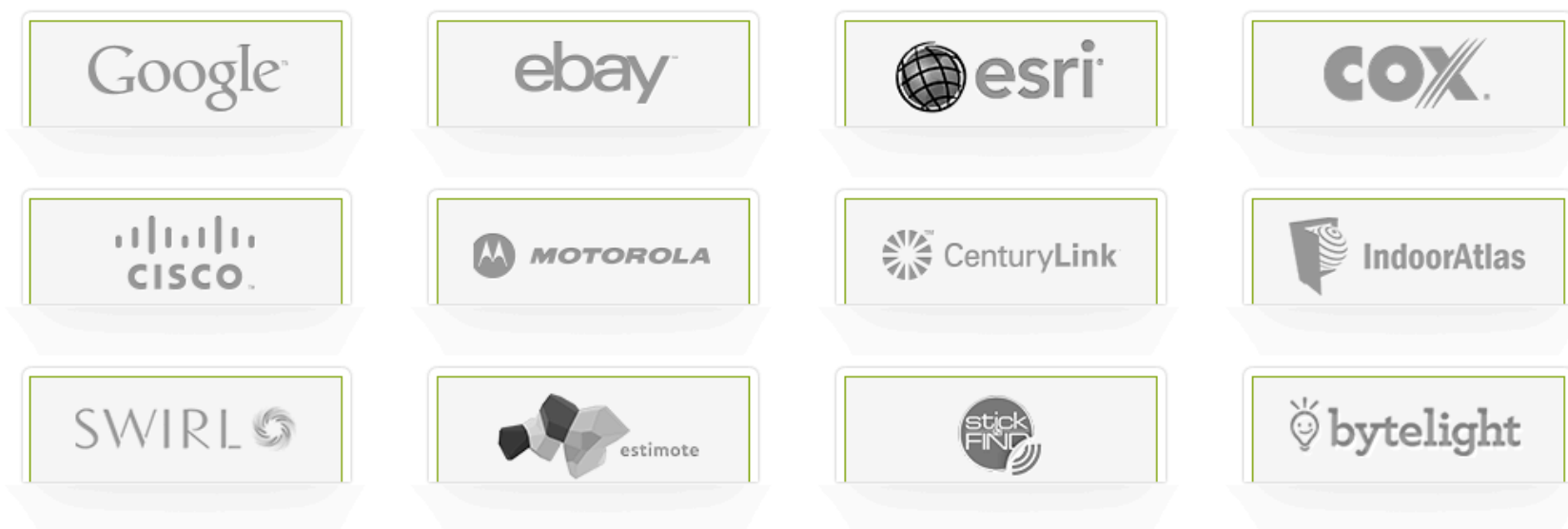




# Aisle411 Solutions



## Key relationships within Search, Shopping and Location

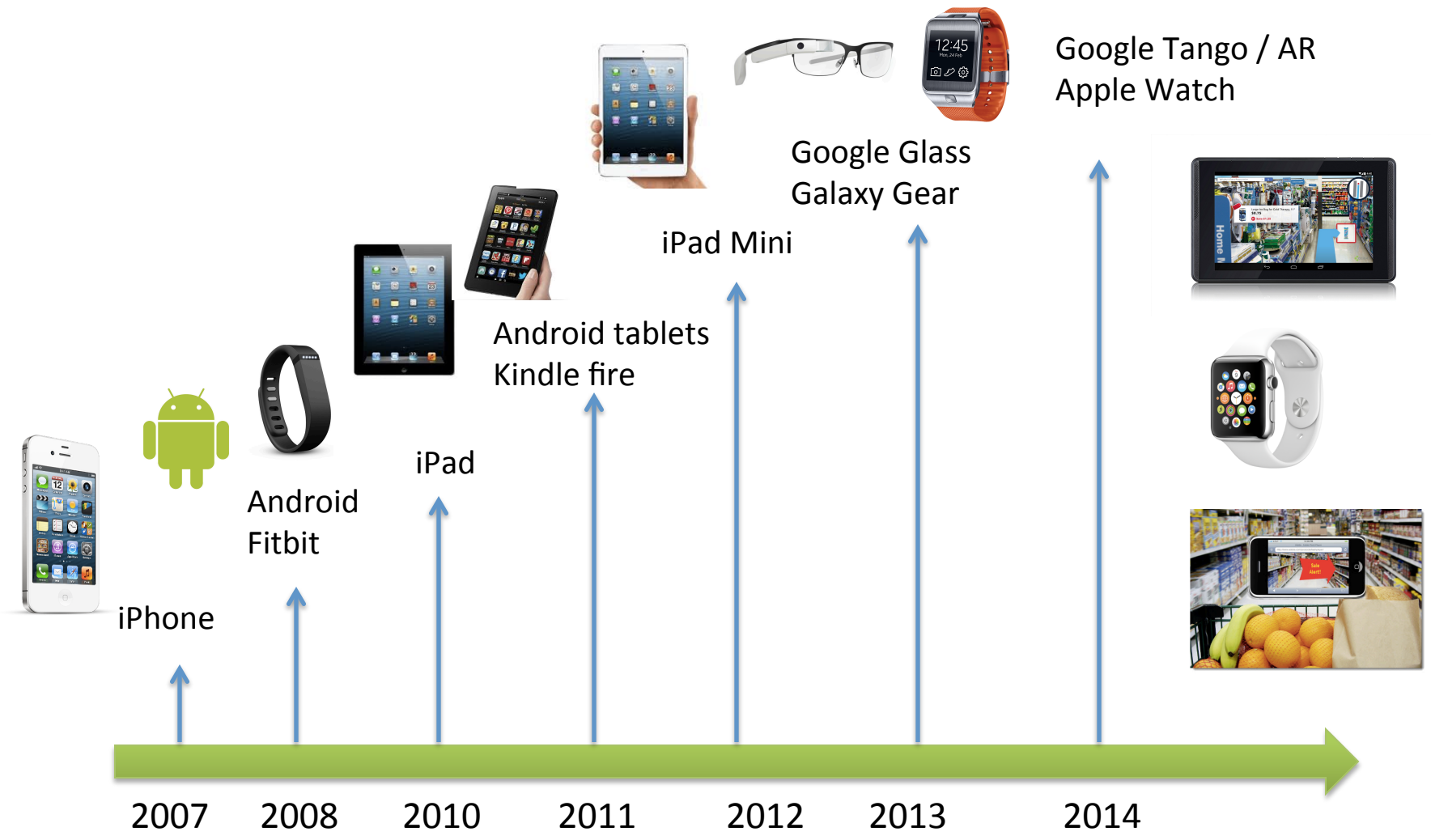


...and many more.

# Key Market Drivers for Indoor Location

---

# Tech Evolution: Mobile and Wearables

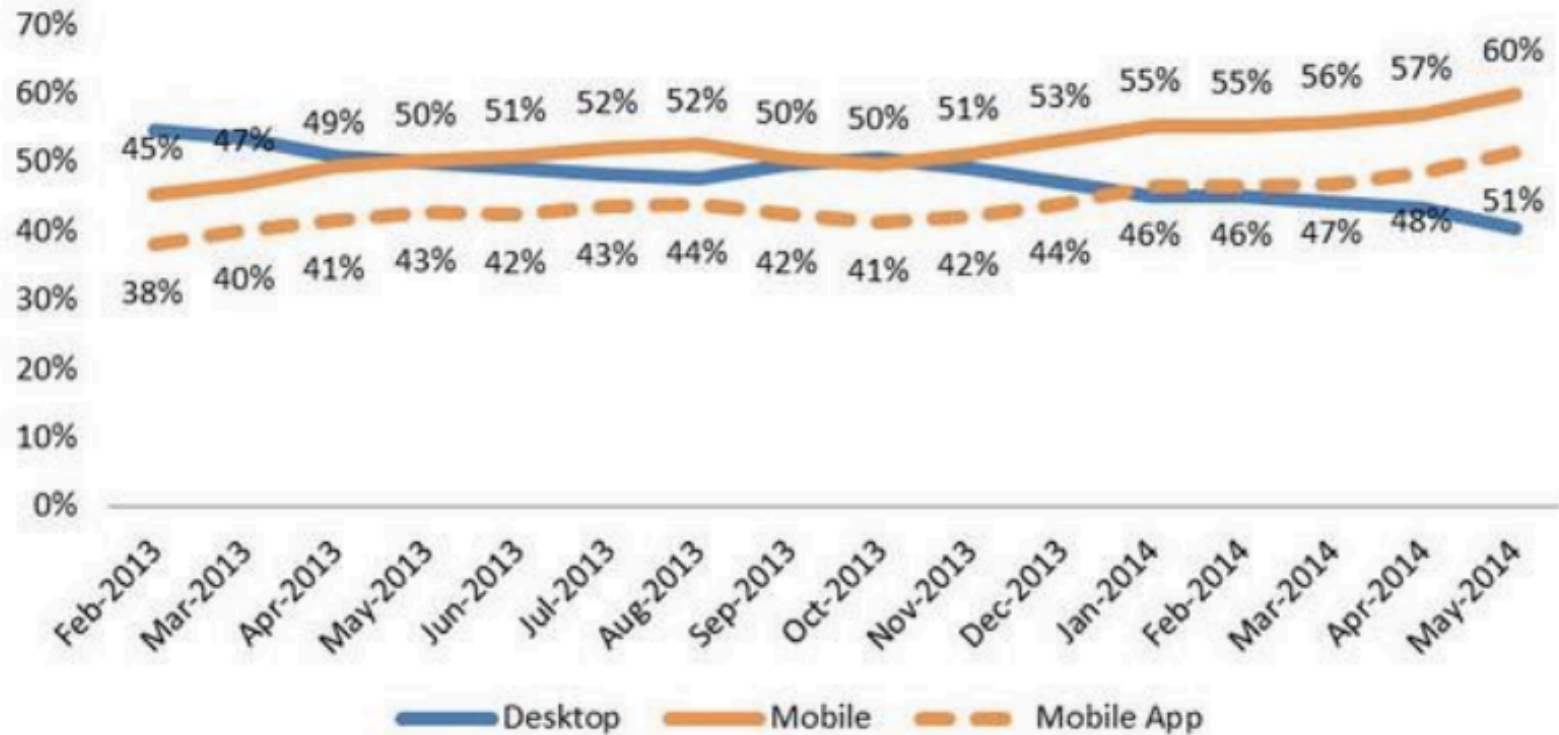




# Mobile Overtakes Desktop

## Share of U.S. Digital Media Time Spent by Platform

Source: comScore Media Metrix Multi-Platform, U.S., Feb 2013 - May 2014



**I'd rather give up a, like, a kidney than my phone.**

Teenager Quoted in *The Guardian*

# Trust, Speed and Timing

---

# Shoppers Trust their Mobile Devices

---

73%

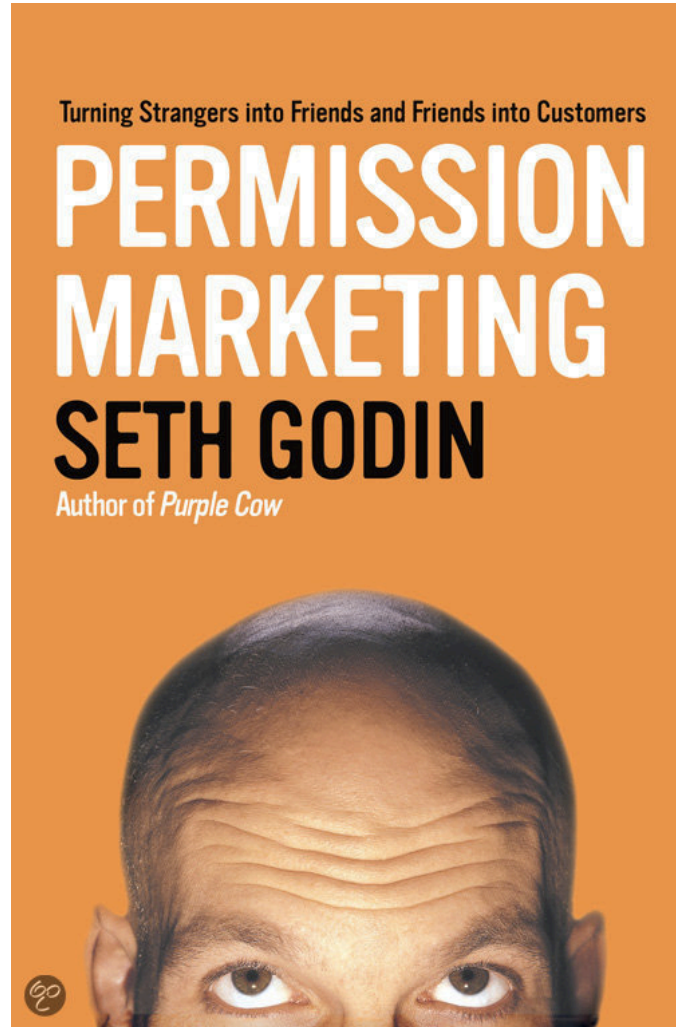
Of Smartphone shoppers prefer to use their mobile for assistance in-store vs. an associate!!

*Delloite Digital, 2014*



# Why Shoppers Trust Mobile

---



Familiarity and frequent interactions provide the basis for trust.

## The take-away:

Shoppers turn to mobile because they use it frequently, and trust it to give them the best information.

# Shoppers Will Share Positioning “If”

---

77%

Willing to share location if it provides enough value

*Swirl, 2014*

# Shoppers Demand Speed

---

80%

of consumers will abandon an in-store purchase if they have to wait more than five minutes for services like helping them find products, answering questions, or checkout.

*2014 Future Stores Conference - Seattle, WA*

# Shoppers Demand Answers in “Mobile Moments”

---

200

times per day

people on average check their mobile device, i.e. “mobile moments”

*“In these mobile moments, they expect companies to understand their context and offer relevancy as well as both curated and streamlined experiences on mobile devices.”*

*- Julie Ask, Forrester Research*

*2014 Forester, Re-Engineer Your  
Business For Mobile Moments*

# In-Store Buying Is Here to Stay

---

90%

Of retail purchases take place in-store

# Shoppers Use Mobile In-Store

---

84%

Of smartphone shoppers use their devices to help them shop while in-store

# Local Search Drives In-Store Visits

---

3 in 4



Who find local information in search results helpful are **more likely to visit stores**

# Mobile Use Frequency In-Store Drives Sales

---

25%

Increase in spending with shoppers who frequently use mobile in-store vs. those who only occasionally use.



# Indoor Location is Affecting Purchase Behavior

---

\$10 Billion

in consumer spending will be touched or directly affected by indoor location by 2018

*Opus Research 2014*

# How Retailers Can Implement Indoor Location Solutions Now

---

# Myth

---

Indoor Location is a point-solution, that tracks a Shopper's Indoor Position In-Store

# Reality

---

Indoor Location is an ecosystem  
of data optimization, technology and  
content management

# Indoor Location Key Elements

## Data Optimization

Store Floor Map

Product Location Data

Store Inventory Data

Sales Data

Marketing Data

## Location Technology

Positioning Technology

Proximity Technology

## Actionable Solutions

Product Search & Discovery

Interactive Store Maps

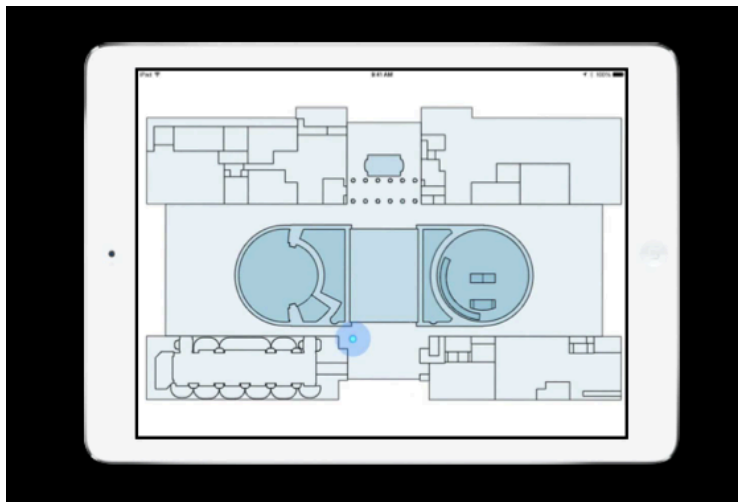
Navigation

Content & Notification Management

Analytics & Insights

# Apple: Positioning vs. Proximity

## Positioning



### Core Indoor Location API

Cell + GPS + Wi-fi + Motion

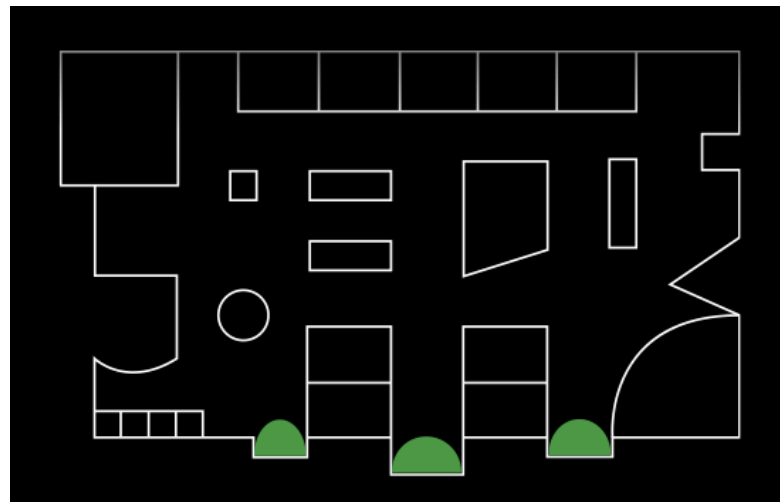
2-3 meters + floor

Wi-fi AP dependencies

Wayfinding

Analytics

## Proximity



### iBeacon

iBeacon Protocol

2-3 meters proximity

Beacon dependent

Trigger Notifications

Analytics

# Retailer KPIs

---

## Top Key Performance Indicators for Early Adopter Retailers

- Increase foot traffic
- Increase conversion rates
- Increase Basket Size
- Increase Customer Satisfaction and Loyalty
- Track digital's impact on in-store sales

# Indoor Location Uses

---

- General Wayfinding & Navigation
- Shopper Product Location Mapping
- Shopper List Routing
- Associate Re-Stocking Efficiencies
- Associate routing shoppers
- Online order, in-store pick-up or delivery
- Store Layout and Planogram Compliance
- Notifications of Offers
- Analytics – Sales, Product Placement, Shopper Interaction



# Retail Indoor Location Landscape

---

## Indoor Maps for Retail

Aisle411

Point Inside

## Chipsets

Broadcom

Qualcomm

InvenSense (Motion Sensors)

STMicroelectronics

CSR

## Operating Systems

Apple

Google

Microsoft

## Cloud Positioning Systems

Indoor Atlas (Magnetics)

Bytelight (LED)

Qualcomm (LED)

Several wi-fi providers (accuracy is 4-6 meters)

## Beacons

Shopkick

Swirl

Zebra Technologies

Aruba

Estimote

Stick n Find

Sonic Notify

Gimbal

inmarket

## Content Management Systems

UrbanAirship

Most Beacon providers

# Use Case: Walgreens “Store Mode”

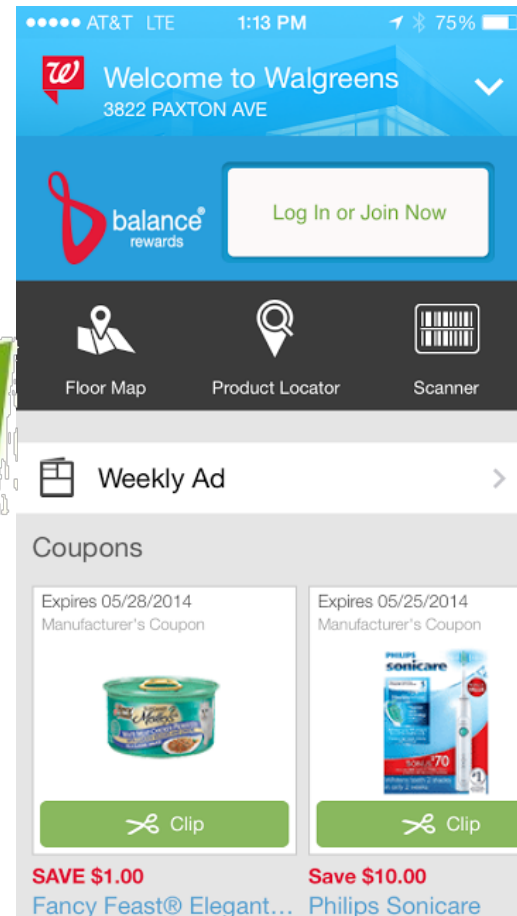
Stores + Online + **Mobile**

Shop Stores, Online  
and **MOBILE**

4-6X

“If customers engage across the stores, online AND **mobile**, they are **four to six times more valuable.**”

Walgreens app in “Store Mode”



Powered by aisle411

# Retailer Spotlight

---



“What we’ve learned from our customers is they need help with gift solutions, they don’t want to be overwhelmed and walk into a 200,000 square-foot store where they can’t find their way around and **they want us to make it easy for them,**”

- Hank Mullany, President, Toys R Us U.S., Forbes 2014

# Retailer Spotlight



## Strategy:

Make shopping easy with store specific digital store guides

## Benefits:

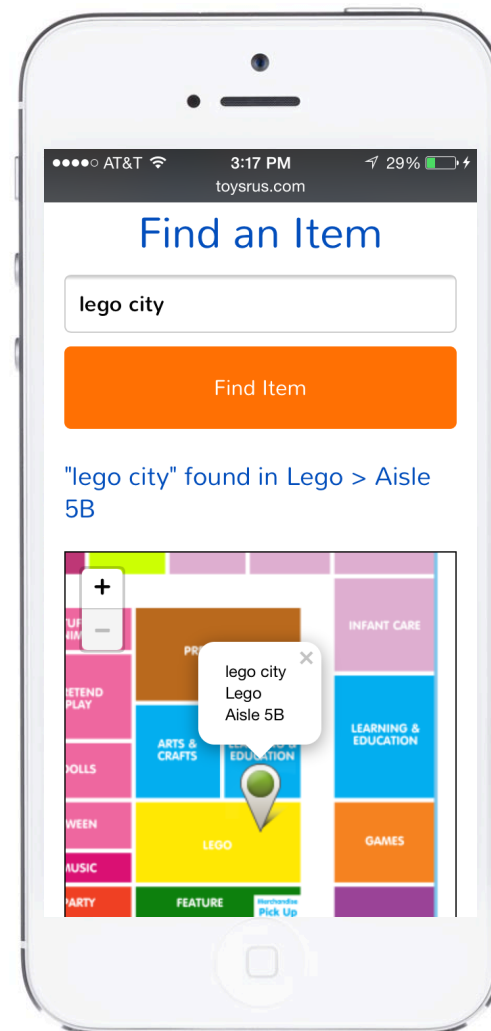
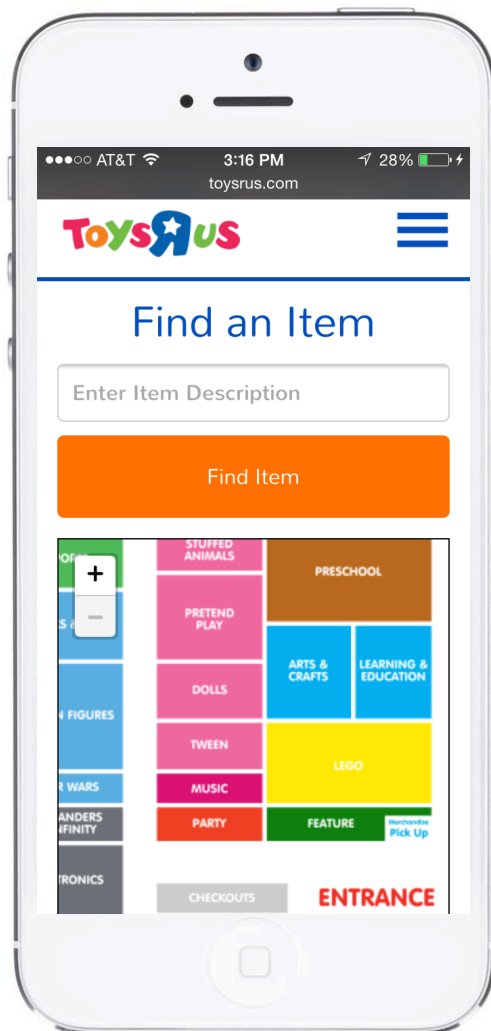
Increase store trips and conversion

## Deployment:

Mobile web and web  
590 + stores in U.S.

## Functionality:

Map products and deals to the aisle and shelf



# Indoor Maps, Search, and Beacons

---



Nathan Pettyjohn  
Founder/CEO

# Retailer Spotlight

*Walgreens*



## Strategy:

Make shopping more convenient in-store

## Benefits:

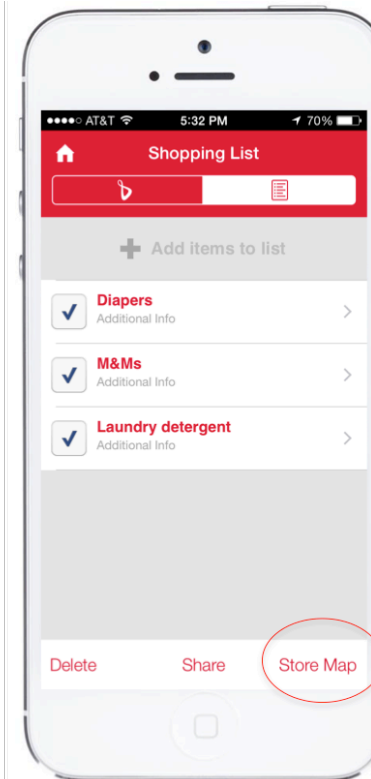
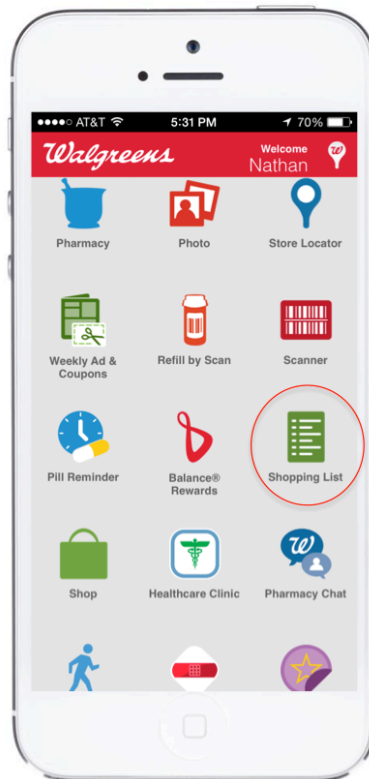
Increase store trips, conversion and loyalty

## Deployment:

Walgreens mobile apps, & Aisle411 app network  
8,000 + stores in U.S.

## Functionality:

Map products, lists and offers to the aisle and shelf



**5-10% increase in profit  
from an Aisle411 user**



# Retailer Spotlight



## Strategy:

Make shopping more convenient in-store

## Benefits:

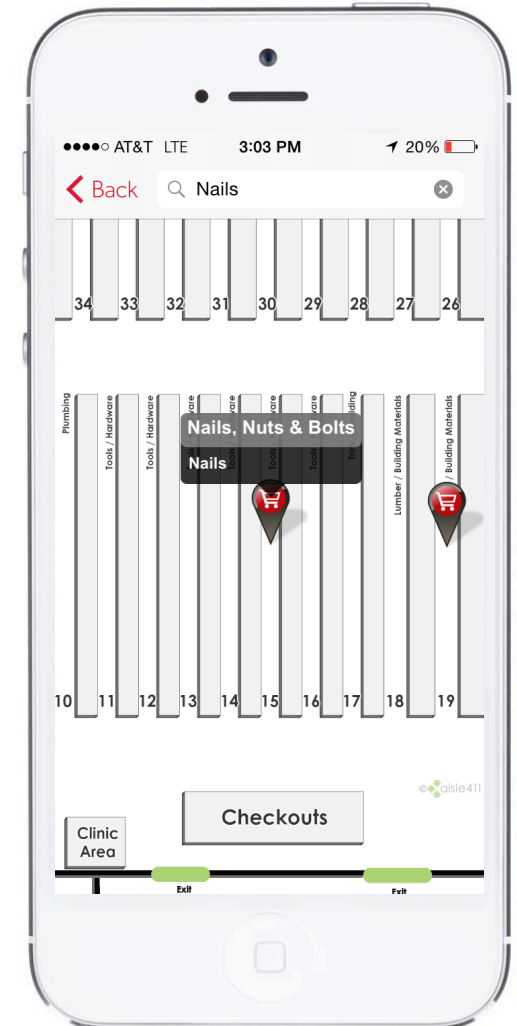
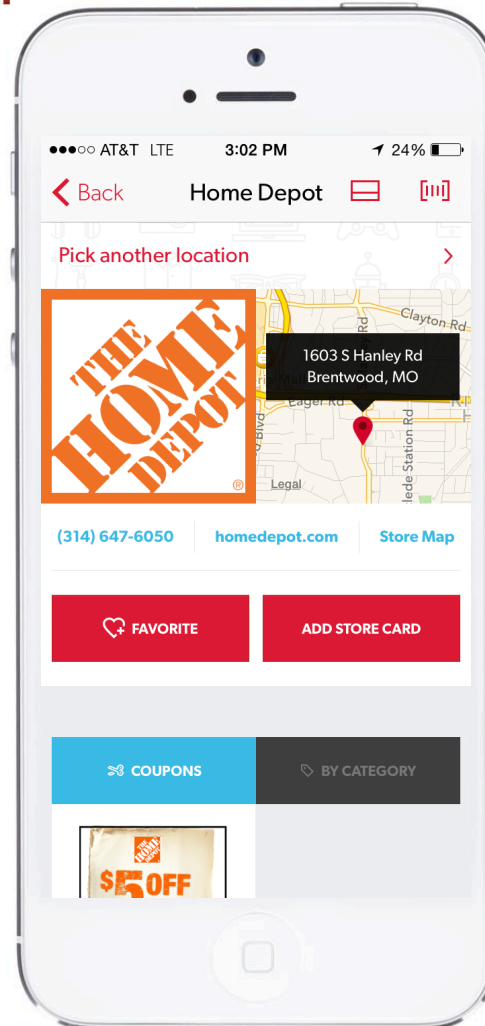
Increase store trips, conversion and loyalty

## Deployment:

Aisle411 app network and Aisle411 Local  
1,980 + stores in U.S.

## Functionality:

Map products, and lists to the store and aisle



# Store Mapping Value



## Increase Store Trips

28%

Shoppers are 28% more likely to make a trip to the store knowing Aisle411 is available.

## Increase Conversion In-Store

2X

Products recommended in-store, with location are 2X more likely to be purchased than products recommended out of store with no location.



# Retailer Spotlight



## Strategy:

Increase in-store mobile engagement/defend against showrooming.

## Benefits:

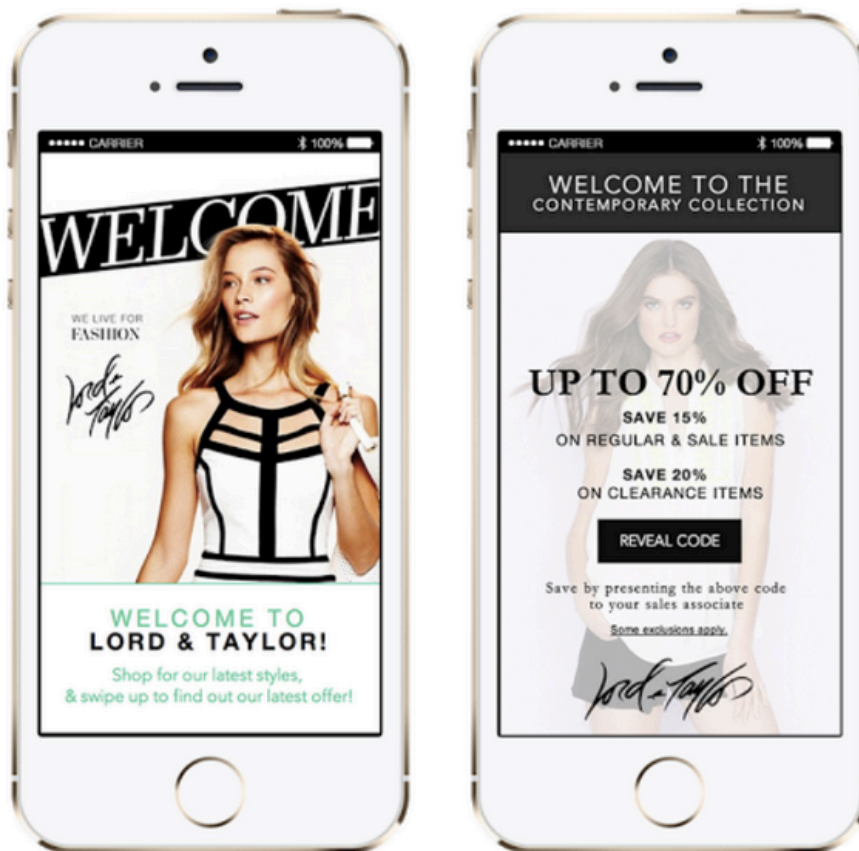
Increase conversion and loyalty

## Deployment:

4-6 beacons per store  
Expanding pilot to full-store roll-out 2015.

## Functionality:

Department proximity  
discount notifications.



**18% engagement rate**  
(avg. mobile banner is 0.4%)

# Retailer Spotlight



## Strategy:

Customize shopper experience, drive department traffic, engage with offers.

## Benefits:

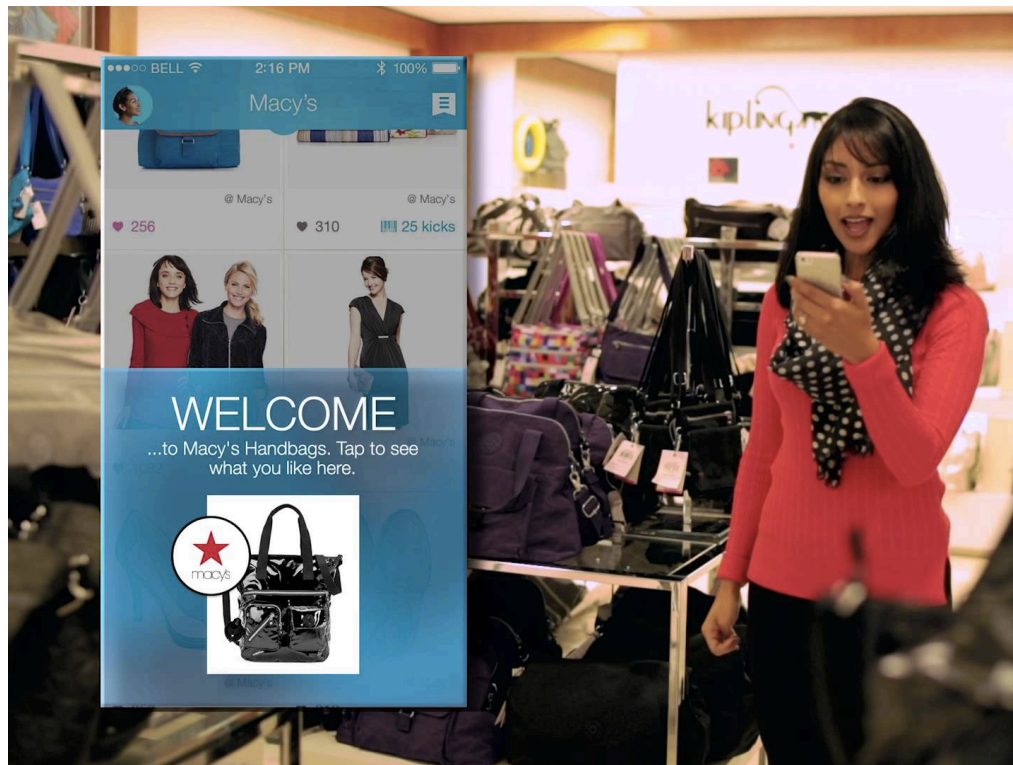
Increase conversion and loyalty

## Deployment:

Within Shopkick App  
4,000 stores

## Functionality:

Department proximity  
discount notifications.



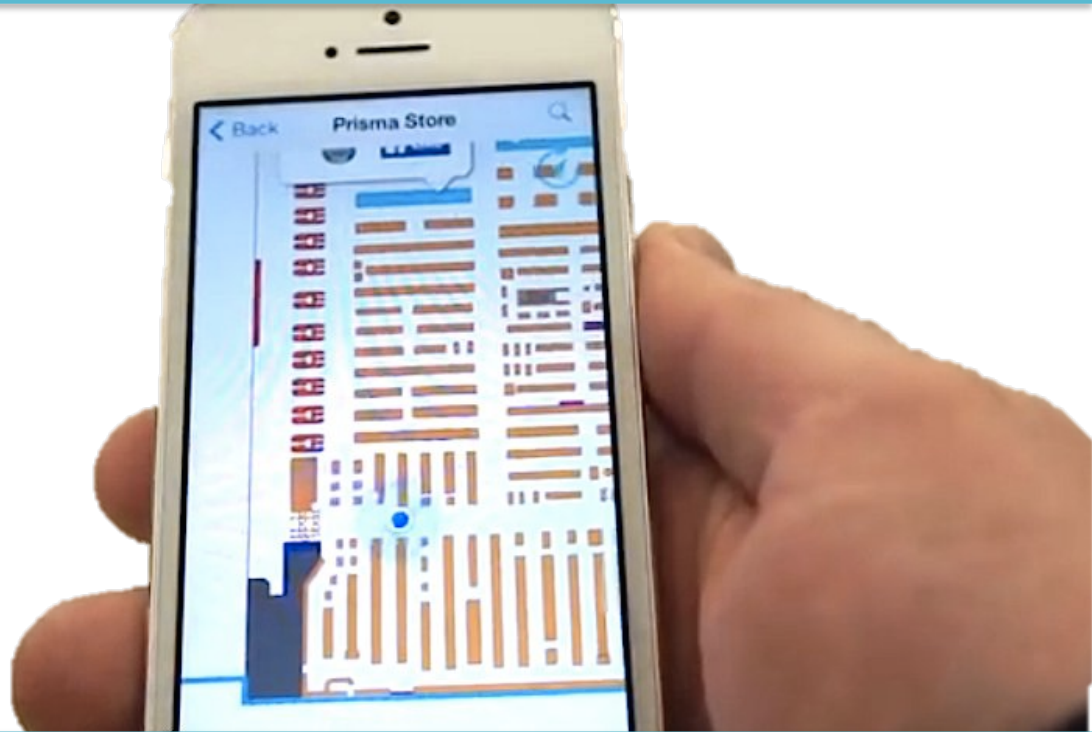
Shopkick users spend 50-100% more than others.

Shopkick found 50% of shoppers don't have phones w Bluetooth on or capable.

# Provider Spotlight



- **Magnetic Positioning**
- **No Hardware Required**
- **iOS and Android**
- **Cloud-powered**
- **Accurate to 2 meters**



# Provider Spotlight

---

# Indoor Location Provider Considerations

---

## Checklist for Choosing Indoor Location Vendors

- 1. Cloud Solution**
- 2. Proven Scale**
- 3. Proven Enterprise Deployments**
- 4. Fast deployment capabilities**
- 5. Integration Flexibility**
- 6. Custom Solutions**
- 7. Extend Reach beyond your own brand**
- 8. White label deliverable**
- 9. Retail Expertise**
- 10. Data Management and Optimization**

# Getting Started

---

## Steps To Implementing Indoor Location

- 1. Organize store data: Product location data, store maps**
- 2. Create Optimized Store Maps for Shoppers and Operations**
- 3. Add proximity technology: Beacons**
- 4. Add precise positioning technology: Magnetics and other**
- 5. Add Next Gen Experience: Augmented Reality**

# Glimpse of the Future

---



Aisle411 Partnered with Google to create the next generation of the in-store shopping experience





# Aisle411 and Project Tango

---



# How Indoor Location Enables Mobile Retail

## *Place London 2014*



Nathan Pettyjohn | CEO | Aisle411