



***Increasing Operations Efficiency and
Increasing Commercial Revenues Through
the MEXIA SMRT Sensor IoT Platform -***

***The Industry's Leading Operations,
Commercial and WiFi Hotspot Platform***



CASE STUDY

THE SITUATION

In 2014, more than 7 million passengers passed through the airports of Larnaka and Pafos in Cyprus. Those 7 million people were on their way to or from dozens of different international destinations. In the process of getting to where they needed to go, each of those passengers had to navigate terminals, find gates and wait in lines. In addition, as commercial revenues continue to be put under pressure, the importance of non-aviation revenues has become more important to keeping up to new security measures and sustainable long term growth.



The Goal | Two Parts



Operations:

Develop a detailed understanding of passenger movements, flow patterns and trends. Report on PAX throughput at various points such as Check In, Boarding Pass Control, Immigration and Security in order to measure process times and bottlenecks in real time. Using this data, provide alerts to airport managers when specific thresholds have been met in order to provide the highest level of PAX experience.

Commercial:

Stage 1: Understand socio-demographics of PAX and when in airport, have appropriate displays in prominent positions to attract attention and increase non-aviation revenues per PAX.

Stage 2: Using free and paid WiFi as well as a new mobile application strategy to provide relevant proximity offers to PAX.

Future: Integrate mobile boarding pass information to provide real time Security wait time and 'time to gate' information directly to PAX based on their specific flight in order to alleviate anxiety and increase time spent in Retail/F&B.



PROBLEM/SOLUTION

The Need | Efficiency

Operations wanted to reduce passenger process times in order to provide a better passenger experience. The areas focused on were:

- Check-in
- Immigration
- Screening

The best way to do this was to streamline staffing schedules in advance and also know when additional security or check-in lines were required. Additionally, in order to improve on staffing management and efficiency while at the same time reducing PAX wait time and therefore creating a better experience, airport management was seeking a way to alert staff at various 'chokepoints' that a line was imminent (in the next 5-10 minutes). This pre-alert would allow time to properly staff the appropriate area in order to minimize wait times.

Hermes knew that this would require the analysis of historical views and reports as well as the ability to access and analyze real time information allowing Operations to simultaneously manage the passenger experience in addition to staff costs and schedules.

The Problem | No Comprehensive Solution

The problem was, Hermes had yet to find any company that could help them accomplish this forward-looking approach. Solutions on the market lacked the robustness needed and failed in a number of ways:

- Monitoring only Bluetooth signals resulting in data from less than 5% of passengers.
- Analyzing PAX movements via existing WiFi access points proved unreliable and nowhere near accurate enough for a Commercial strategy.
- The use of video systems, whether new or using existing CCTV, did not provide a complete assessment of passenger flow through the airport.
- In order to implement the long term Commercial revenue strategy, Beacons and WiFi engagement were required.

The Solution | MEXIA Interactive

After looking at multiple solutions available in the market, the experienced team at Hermes chose to assess the Location Analytics and Engagement Platform offered by MEXIA Interactive. MEXIA demonstrated a thorough understanding of what Hermes was trying to accomplish and the solution presented appeared to be something that no other company on the market had to offer.

THE PROCESS

The Process | From Pilot to Implementation

MEXIA began with a pilot program that demonstrated the power of the MEXIA SMRT Sensor platform. Those results encouraged Hermes moved ahead with complete installations in both Pafos and Larnaka airports on multi-year contracts.



Test results of a blind walkaround. Green dots show locations identified by client as to where they were and when. Red Dots show where MEXIA SMRT Sensor locates them to demonstrate high level of accuracy (most results are within 2 meters).

Caption

DELIVERING RESULTS

Results | Above and Beyond

The MEXIA SMRT Sensor Platform has delivered on the objectives set out in terms of complete PAX flow measurement, specific areas visited, dwell time by area, breakdown by socio-demographics and ability to assist in creating additional revenues.

All areas have benefited:

- **Operations** has benefited from the robust analytics and real time measurement and notifications.
- **Passenger** experiences have improved with shorter wait times through a combination of MEXIA data analysis and new technologies deployed. MEXIA has been able to help validate that the new technologies have improved PAX throughput in high traffic areas and continue to provide real time alerts based on throughput thresholds.
- From the start of this project, **Hermes** has based the investment in such a robust platform on the fact that it will ultimately assist in generating higher revenues per PAX. The ROI goal for the system was to increase revenue by only 1.5 cents Euro per PAX in order to fully pay for the costs associated with running this program.



MEXIA's BI Reporting Dashboard allows clients to choose the data to view, date comparisons and format of data. BI Reports are mobile device friendly through an existing App, load quickly and are flexible to work with in groups.

EXECUTIVE SUMMARY

HERMES AIRPORTS | CASE STUDY

Overview | Project Purpose

- Measure passenger (PAX) from time of entry to airport through to the time of departure (curb-to-gate), including gate, flight number and destination
- Measure process times in specific areas- check in, boarding pass, immigration, security
- Determine areas where PAX dwell in retails and compare to sales numbers to measure conversion- based on socio-demographics
- Determine areas of opportunity where PAX are not dwelling in order to test different products or layouts to increase conversions
- Measure peak times for operational planning, staffing, lane openings
- Measure process times of PAX in specific lanes to determine staffing efficiency and training needs
- Determine percentage of PAX that travel straight to gate without stopping at any retail and report on the lost opportunity
- Testing of PAX flow changes to measure increase in time spent at retail and any associated revenue increases.
- Provide real-time Queue by specific areas each minute to FIDS and PAX mobile devices (with App download) Predictively alert appropriate department managers where queue times will build based on MEXIA SMRT Sensor.
- Alert Operational departments of pending PAX line ups as early as possible including entry way, check in, boarding pass control, etc for better flow of PAX through Control areas

Airports around the globe talk about the need for these benefits and a few have taken steps to implement portions of them. Hermes Airports saw that the future of airports can be delivered by one company with a complete solution- MEXIA Interactive and the SMRT Sensor.



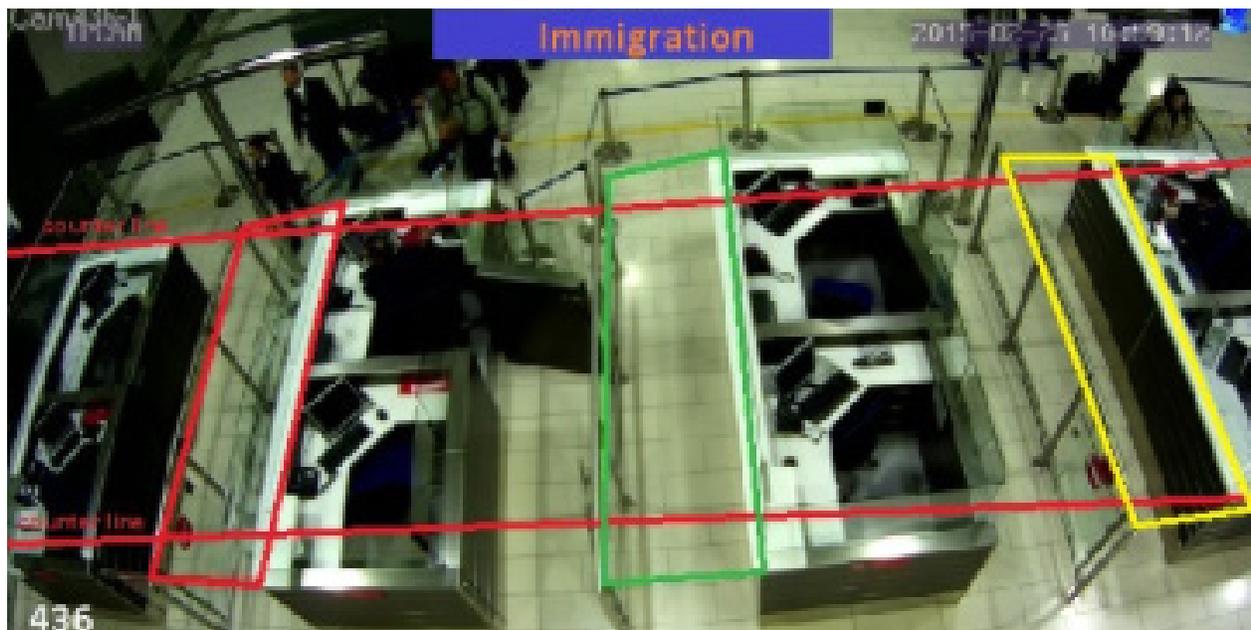
EXECUTIVE SUMMARY

HERMES AIRPORTS | CASE STUDY

Overview | PAX Experience

- Incorporate Beacon (iBeacon/OpenBeacon) SDK's into mobile App to provide proximity information, gate information, offers, etc to PAX when at airport
- Complete Content Management System (CMS) and SDK's for incorporation into mobile App to provide proximity offers, information and integration to FIDS & boarding pass systems
- Potential to tie boarding pass (mobile) to App in order to integrate airport information systems, specific flight information, gate changes, etc

The future Internet of Things requires an infrastructure that is consistent, reliable, scalable and future proofed. That infrastructure is the MEXIA SMRT Sensor.



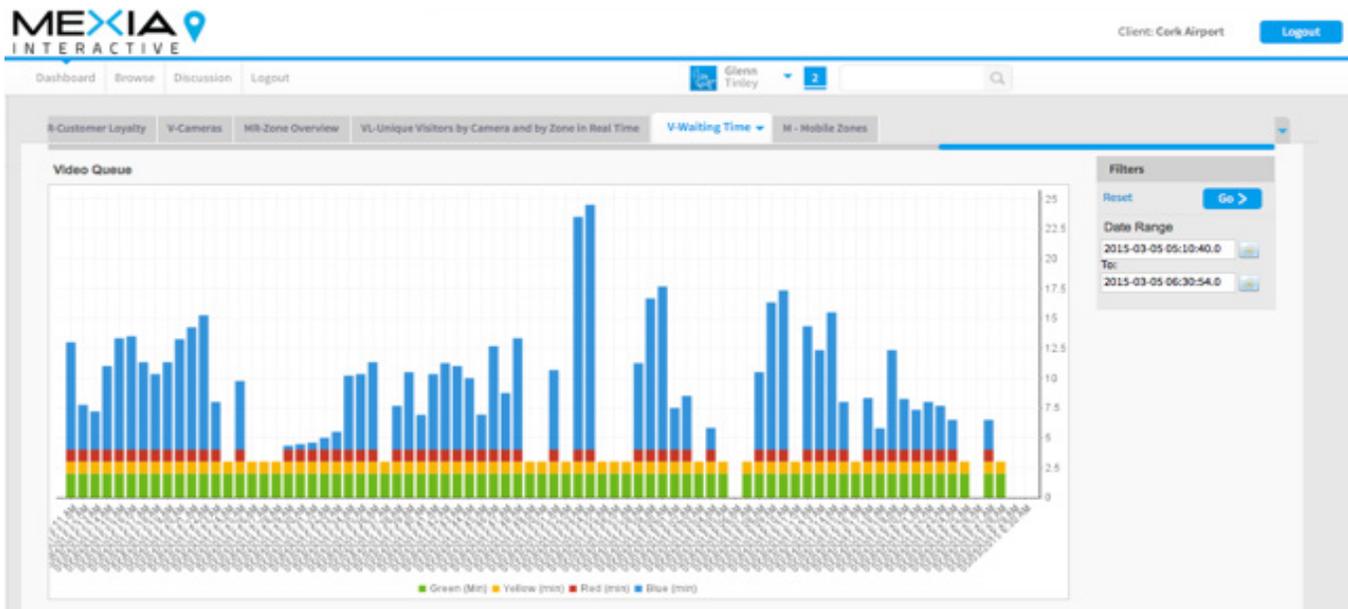
MEXIA's Video Analytics system (included in SMRT Sensor) measures PAX counts, throughput and queue time. At the same time, monitoring staffing efficiency and determining potential training opportunities.

EXECUTIVE SUMMARY

Overview | MEXIA

- Complete journey tracking of PAX from time of entry to airport to departure at gates through a combination of mobile analytics and video analytics
- Highly accurate and specific zone measurement of dwell, flow, throughput, wait time to 3 meter (10 ft) accuracy
- Filtering of non-PAX and staff
- Reporting on socio-demographics of PAX and what retail areas of airport are visited most, have the most dwell time and have the highest conversions.
- Enterprise WiFi platform (802.11ac) for upgrade or new install of pax and staff wifi including complete authentication and secure access servers.

MEXIA is truly providing the infrastructure that airports will need in the future for Internet of Things connectivity and engagement through their SMRT Sensor Platform. They have given Hermes an advantage that previously was only on a white board. MEXIA brought it to the real world with us.



MEXIA real-time Queue dashboard provides minute-by-minute reporting for PAX, Managers and on-location staff. Visually easy to react to for staff when queues grow beyond thresholds. Multiple zones can feed into one dashboard to report on overall PAX queue .

***To schedule an online demo,
pilot project or just to talk about
the future of the SMRT Airport,
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