



COMPANY NAME

ECE Projectmanagement
GmbH & Co. KG.

XOVIS PARTNER

IMAS GmbH

LOCATION

Various

INDUSTRY

Retail

APPLICATION

People counting

CASE STUDY

Enhanced shopping experience in 21.000 shops all over Europe

STATE-OF-THE-ART STORE MANAGEMENT WITH IMAS AND XOVIS

CHALLENGE

Xovis gold partner IMAS improves the shopping experience for more than 50 million visitors per day. The ECE-center and project management depends on accurate footfall counting data to provide insights for quality reports and comprehensive analytics. Additionally, maintenance and support must be performed on short notice to meet the following challenges:

- Continuously delivering accurate and high-quality insights
- Efficient response to maintenance and support requests
- Accessible data platform to enable comprehensive reports and analytics

SOLUTION

State-of-the-art 3D people counting solution by Xovis guarantees a counting accuracy of 98%. An optimized positioning of the sensors results in an even more comprehensive set of data. The gathered data is visualized and managed on a platform exclusively provided by IMAS: the Xperio platform provides the centre management with the following insights:

- Exact amount of people in a certain area
- Heights of customers
- Reliable counting results
- Extended data managing platform
- Improved sensor positioning (also in height)

„Short ways of communication and response times. IMAS' engaged and pragmatic way of work is remarkable and supporting us in getting fast solutions for our demand. We have also to point out IMAS' innovative capability.“

Björn Küster
Project Manager

BENEFITS

Based on the data gathered with the unique Xovis 3D technology, IMAS empowered ECE project management to count footfall accurately in all in all 7.200.000 m² sales area. The gained insights resulted in essential benefits such as:

- Improved footfall counting results; separation between children and adults
- Full insights on centre hot spots and amount of people visiting a store
- Analytics and data management reports adapted to the specific needs of the center management
- Optimized running costs by correct positioning of the sensors
- Mounting height up to 20m enables coverage of large entrances



CASE STUDY

How does it work?

Responding to the fast-growing demand for solutions that bridge the gap from conventional people counting to comprehensive in-store analytics, a growing number of retail experts measure KPIs such as footfall, dwell times and conversion rates with the Xovis 3D Sensors and software. Unlike the conventional people counting solutions, Xovis can connect numerous 3D sensors to deliver insights beyond the doorstep.

A BROAD PORTFOLIO

There is a broad portfolio of Xovis 3D Sensors with the widest viewing angle available on the market to count and track people anonymously. One sensor can be mounted on ceilings from 2.2 to 30 m (7.5 ft. to 65 ft.) and covers up to 100 m² (1100 sq.ft.) of tracking area.

...Xovis opens the door for in-store analytics that other technologies cannot deliver. The Xovis Multisensor combines many Xovis 3D Sensors to cover large areas. Analyses enabled by Xovis provide our customers with an essential competitive edge."

Susanne Neumann,
Regional Director
IMAS

INTEGRATION MADE EASY

The user-friendly WebGUI guides through the simple first-time set-up or any re-configuration at a later time. The sensor software (firmware) also enables the designation of 99 counting lines and dwell zones per sensor as well as the set-up of a Multi-sensor with up to 9 sensors to track people continuously through large areas. No additional hardware or software is required.

Count statistics, heat maps, and other basic tools come along with the sensor software. For further visualization and analysis, Xovis 3D Sensors can easily be integrated into an existing software environment and

third-party applications via XML-based interface and API. There are also additional, easy-to-integrate Xovis hardware devices with new software modules for applications such as queue and POS management in large, hectic areas with an unlimited number of sensors.

UNMATCHED ACCURACY

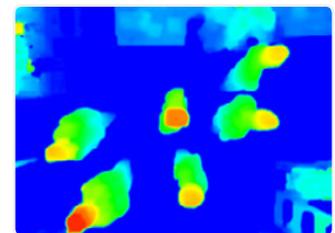
A high-resolution 3D image or stereo image of the covered/ recorded area is calculated on the sensor up to 30 times per second. Based on this, every person entering the covered area is counted and tracked anonymously. Persons are recognized individually even if they are next to each other. Counting Accuracy over 99% is guaranteed, i.e., 99% of the persons in the covered area are counted and tracked.

A FUTUREPROOF INVESTMENT

Power over Ethernet (PoE) to combine data connection with power in one cable and a Mean Time Between Failure (MTBF) of 25 years simplify installation and keep the total cost of operation low. Image processing occurs directly on the sensor. No video stream leaves the sensors and data privacy is guaranteed. The Xovis portfolio includes a model with wireless functionalities as an add-on, though the Xovis technology does not depend on signal-emitting devices and is highly robust against all kinds of external influences such as shadows, light changes, and heat emissions.



Xovis 3D Sensor (model PC2)



3D image computed by Xovis sensor indicating heights and distances by different colors



The sensor firmware features basic visualization/ analysis tools and can easily be integrated



IMAS software Xperio integrates the Xovis data

CASE STUDY

Technical Data

WORKING PRINCIPLE:	3D stereo vision / distance measurement
INSTALLATION ANGLE:	+/- 15° in x-axis +/- 5° in y-axis
OPERATION TEMPERATURE:	0°... 50 °C
WITH OUTDOOR HOUSING:	-20°... 50 °C
STORAGE TEMPERATURE:	-20° ... 70 °C
AIR HUMIDITY:	20 ... 80%
CONNECTION:	RJ-45 Ethernet
POWER SUPPLY:	PoE Class 0 / (IEEE 802.3af)
POWER CONSUMPTION:	< 5W
REQUIRED ILLUMINATION:	min. 2 lux
SIZE (LxWxH):	PC2/ PC2R/ PC2S: 13.0 x 9.4 x 3.0 cm PC3: 33.0 x 6.1 x 4.0 cm PC3-0: 38.5 x 9.0 x 8.6 cm
WEIGHT:	PC2: 350 g/ PC2R & PC2S: 250 g PC3: 600 g/ PC3-0: 1700 g
MOUNTING HEIGHT:	PC2/ PC2R/ PC2S: up to 6 m PC3/ PC3-0: up to 20 m

ABOUT XOVIS

With more than 60'000 Xovis 3D Sensors in the field, Swiss-based Xovis is the market leader in people flow monitoring in the airport and retail industry. More than 65 international airports and 150 system integrators in the retail industry count on the combination of Xovis 3D Sensors and software solutions to move people more smoothly through their facilities, optimize their resource planning and increase customer satisfaction as well as revenues. Founded in 2008, Xovis has evolved from a three-man start-up to a high-tech company with over 80 employees. Xovis is headquartered at the gates of the Swiss capital Bern. The US office is Boston, MA.