ULIS' Thermal Activity Sensor selected by Irlynx for smart buildings projects

Open system access to ULIS' thermal sensor facilitated its choice for integration in Irlynx's people counting and space occupancy sensing device

Veurey-Voroize, near Grenoble, France, January 17 2018 – ULIS, a manufacturer of innovative thermal sensors, today announces that its Thermal Activity Sensor (TAS) for detecting true presence and people counting has been selected by Irlynx for integration in its advanced smart building device, People Sense™. Irlynx will field test ULIS' thermal sensor in several pilot studies it is undertaking with GE Digital, NEXITY and SNCF, among other smart occupancy and people counting projects linked to optimizing open space areas and reducing building footprint.

The global market for IR sensors in smart homes and buildings is expected to grow from $694 million in 2016 to $1068 million in 2022 (source: Sensors and Sensing Modules for Smart Homes and Buildings report, Yole Développement, 2017). Both ULIS and Irlynx manufacture thermal vision products to meet emerging needs in workspace management, energy management, security and safety. ULIS is the only manufacturer to produce, in mass volume, advanced occupancy sensors that give system integrators the flexibility to modify key parameters within the thermal sensor to match system requirements.

"ULIS is pleased to enable deployment and testing of a people counting solution using its newly designed Thermal Activity Sensor," said Hien Pham Gia, sales and marketing director at ULIS. "Irlynx has provided ULIS with additional opportunities to obtain valuable end-user feedback based on real-life experiences. This will allow us to confirm the key benefits of our sensor, as well as further strengthen its value proposition for facility managers."

Irlynx developed the electronics as well as the algorithm for the TAS to perform thermal video data analysis and to activate the people counting function. Irlynx's task was made easier since in using ULIS' sensors the algorithm could access raw data directly from the sensor. This eliminated the need for Irlynx to carry out complex calibrations.

"Irlynx was looking for a partner with great technology and a good understanding of our markets, where cost is key. ULIS demonstrated that it could adapt its offer and address this challenge. Its technology allows us to deliver an unmatched value proposition to the smart building market, with a greater performance/price ratio than any existing people counting solution," said Guillaume Crozet, VP sales and marketing at Irlynx. "We also deliver advanced human activity data such as people's position and trajectories, and desk occupancy, increasingly of great interest among our customers."

Advantages of ULIS' space occupancy sensor
One key advantage a thermal sensor offers facility managers is that it comes without facial recognition, an important feature to preserve the anonymity and privacy of subjects, for example, when monitoring a building. Furthermore, compared to other thermal technologies, ULIS' TAS offers a wider field of view up to 120°, meaning that fewer devices are required to cover large surface areas.

Customers have several options available for tuning ULIS' TAS for specific application requirements. One option is to work directly on raw video data (true 14 bits parallel bus), which is easily interoperable with standard microcontrollers and low-cost FPGA. System integrators can also optimize the sensor's power consumption and use it with a standard battery lasting three or more years.

TAS offers the market a wide range of advanced functions beyond the detection function offered by lower resolution sensor alternatives. It can support numerous applications:

- People counting
- Localization & people tracking
- Activity & posture classification
- True intrusion detection (reducing the number of false alarms)
- Real presence detection (distinguishing people from animals)
- Hot spot and fire detection

About Irlynx
Irlynx designs and sells advanced human activity sensing modules. The company proposes connections between human users and big data systems, between the real world and the smart objects. It provides customers with unique human perception solutions in order to give them better services, interactions, security and energy saving solutions. The company is a multiple award winner, including the 'Indoor Location Analytics' 2016 Challenge sponsored by GE Digital and the Enova 2016 Innovation Trophy. Irlynx is located in Meylan, near Grenoble, France.
www.irlynx.com

About ULIS
ULIS, a subsidiary of Sofradir, specializes in designing and manufacturing innovative thermal image sensors for the defense, surveillance, thermography, firefighting, outdoor leisure and automotive markets. It enables makers of consumer electronics and infrared equipment to produce low weight, low power consumption and cost-effective thermal cameras in high volume.
Founded in 2002, ULIS has grown to become the second largest producer of thermal image sensors (microbolometers). It offers a targeted range of microbolometers that are the key component of many top brands in thermal imaging equipment sold across Europe, Asia and North America. Size, weight, low power consumption and cost reductions drive ULIS innovations, enabling the company to address new trends in smart buildings, road safety and in-cabin comfort of vehicles. ULIS is located in Veurey-Voroize, near Grenoble.
www.ulis-ir.com