

Press release

E-World: Smart street lighting with plug & play solution from Alpha-Omega Technology

Together with NAS, MClimate and Miromico, the IoT company Alpha-Omega Technology is presenting over 200 products from the [iot-shop](#). The highlight is the "local lighting" IoT solution. This has now integrated the 4th generation of controllers from NAS for lighting control. Hall 5, Stand 5E112.

Schimberg and Berlin, January 31, 2024 - [Alpha-Omega Technology GmbH & Co. KG](#) operates [iot-shop](#), one of the largest online stores for LPWAN products in Europe. With an interdisciplinary approach, the experts for IoT solutions advise on the implementation of IoT projects and the selection of hardware. From February 20 to 22, 2024, the company will be exhibiting with its partners [Nordic Automation Systems \(NAS\)](#), [MClimate AD](#) and [Miromico AG](#) at "E-World energy & water", the leading trade fair for the European energy industry. Visitors can expect a wide range of hardware with IoT technologies such as LoRaWAN®, NB-IoT, mioty and wireless M-Bus in the "Smart Energy" exhibition area. The new smart home wireless standard Matter will also be represented for the first time. The highlight at the 60 square meter joint stand is a demo setup for the "[Ortsbeleuchtung](#)" IoT solution with switchable street lamps from Schréder GmbH. The plug & play product packages developed by Alpha-Omega Technology for entry into the smart village enable municipalities to intelligently monitor and control their street lighting. Until now, controllers have been used in the IoT solution as a replacement for ripple control technology and have connected the street lights to a LoRaWAN® network. With the integration of the new generation of luminaire controllers from NAS, Alpha-Omega Technology is expanding the technical interfaces for luminaire control, including the Zhaga and NEMA standards. The more than 200 products on the stand also include IoT thermostats from MClimate such as the new LoRaWAN® [fan coil thermostat](#) and Truvami tracking solutions for security and logistics from Miromico.

Alpha-Omega Technology is making it easier for local authorities to get started with the digitalization of street lighting with its "Local Lighting" IoT solution based on LoRaWAN® wireless technology. The lighting can be controlled remotely via a visualized dashboard. The special feature of the solution is its flexibility: the packages for the conversion previously included three, five or ten configured GreenBoxes with an integrated angled antenna, a LoRaWAN® outdoor gateway, three months' use of the demo dashboard and support, depending on requirements. A new feature is the integration of NAS luminaire controllers. The solution enables the remote control of LED luminaires, for example with the DALI

standard. A Digital Addressable Lighting Interface (DALI) is a manufacturer-independent interface that enables electronic ballasts to be controlled via digital control signals. Thanks to better control over the lighting, energy consumption and CO2 emissions can be reduced through efficient maintenance cycles. Visitors to the trade fair will be able to experience the intelligent street lighting live: "We will be setting up several street lamps from Schröder GmbH, an expert in urban lighting design, at the iot-shop stand to demonstrate our IoT local lighting solution. The street lamps will be switchable," says Jan Bose, Managing Director at Alpha-Omega Technology.

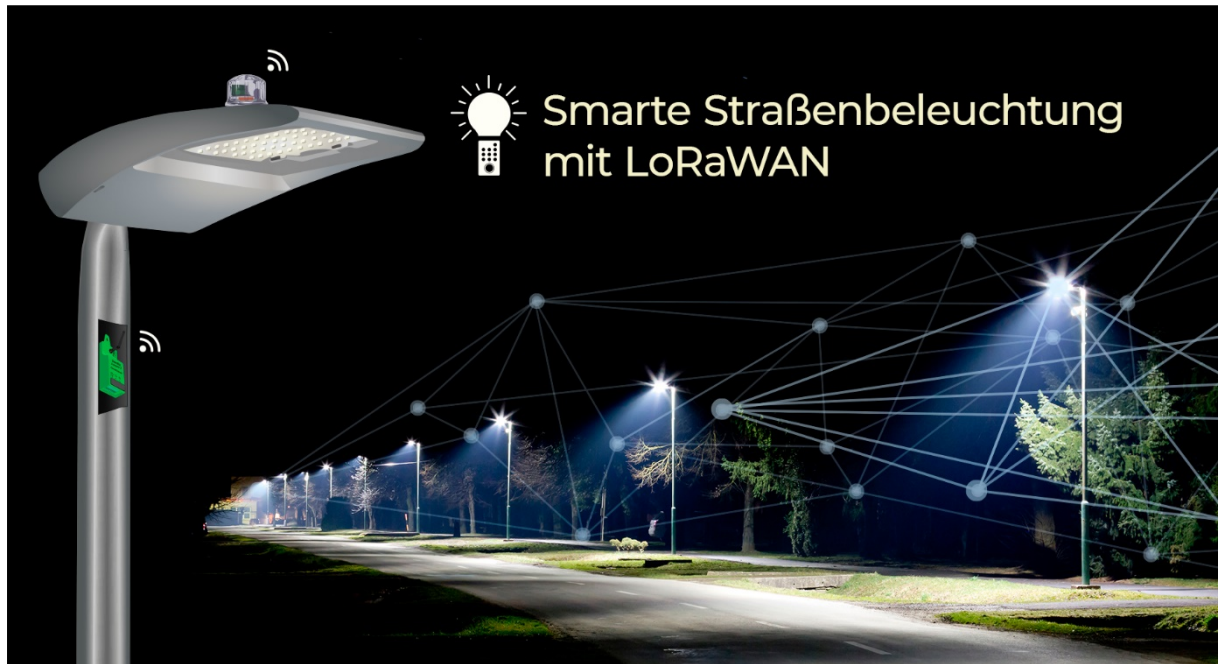
Award-winning pioneer for smart village solutions

Jan Bose and his company are among the pioneers of intelligent street lighting for smart villages: Seven years ago, he launched SMARTinfeld, a model project for smart village applications in the Thuringian municipality of Martinfeld. SMARTinfeld is one of the winners of the innovation competition for digital life in rural areas "Digital Places in the Land of Ideas 2023". The model village was awarded the prize for the best digital project in the "Smart Community" category. Jan Bose says: "Our company is based in Martinfeld. This makes us the driving force behind the project. The expert know-how from our many years of IoT project experience flows directly into the development of new solutions."

Nordic Automation Systems (NAS): Luminaire controller and Home series

NAS will be presenting a new generation of luminaire controllers at the joint stand. This includes a Zhaga controller, one of the luminaire controllers that have been integrated into the "Local lighting" product package. An internal ambient light sensor adjusts the lighting to the ambient conditions and thus optimizes energy efficiency. The integrated tilt sensor helps to detect external influences on luminaires. For extended functionality, an optional GPS function is available that provides location-based services. This is particularly beneficial for extensive and complex lighting networks. Thanks to a range of connection options, these controllers can be integrated into various infrastructures.

NAS is also introducing a new product line with the Home series of home automation devices. It starts with a series of air quality sensors that are networked via the Matter smart home standard. The Matter standard offers ease of use and excellent connectivity across all ecosystems supported by Matter, such as Apple HomeKit, Amazon Alexa or Google Home.



A new addition to the "Local lighting" IoT product package is the integration of NAS luminaire controllers. The solution enables the remote control of LED luminaires, for example with the DALI standard. (Graphic: Alpha-Omega Technology)

Miromico: IoT tracking solutions for security and logistics

Truvami's new tracking solutions have been developed from Miromico's tracking range. They are used to ensure the safety of employees and objects worthy of protection in companies or to optimize logistics processes. Seamless localization both indoors and outdoors means that the trackers can be precisely located. Truvami specializes in trackers of the smallest size. The trackers communicate via the LoRaWAN® wireless standard, which enables energy-efficient communication and therefore an above-average battery life. Users can view the locations of the trackers, read out data and create geofences in a dashboard. The solutions for the application areas of rescue and protection, construction and infrastructure, transportation and logistics as well as the tracking of livestock for herd management can be seen together with other Miromico exhibits at the joint iot-shop stand.



Thanks to seamless tracking, the Truvami trackers can be precisely located. The IoT tracking solution from Miromico makes it possible, for example, to ensure the safety of sensitive objects and optimize processes in transport and logistics. (Graphic: Alpha-Omega Technology)

MClimate: Vicki LoRaWAN® Smart Radiator and Fan Coil thermostats

MClimate specializes in the development of IoT hardware and software solutions for energy efficiency, air quality control and the prevention of water loss. The company will be showcasing the [Vicki LoRaWAN® Smart Radiator Thermostat](#) at the joint stand. The radiator valve has the potential to reduce heating costs by up to 35 percent and improve the carbon footprint of buildings. The MClimate Vicki has already proven itself in use for several years and offers useful functions such as heating schedules or the ability to detect open windows.

Among the exhibits is also the latest product from MClimate: the [Fan Coil Thermostat LoRaWAN®](#). This device has been specially developed for 2- and 4-pipe fan coil units and supports 3-speed or ECM fans. This makes it suitable for rapid retrofitting of buildings. It allows the target temperature to be set and indoor conditions to be continuously monitored. The result is better energy efficiency with up to 30 percent lower heating and cooling costs.



MClimate presents its latest product: the Fan Coil Thermostat LoRaWAN®. The device makes it possible to set the target temperature and continuously monitor indoor conditions for better energy efficiency. (Photo: MClimate)

Jan Bose, CEO of Alpha-Omega Technology: "We will be on site with a large team and will be able to provide detailed information about the products themselves as well as the use cases of LoRaWAN® and other low-power technologies at the joint stand. Trade fair visitors who are interested in IoT applications should definitely come and see us. We are not only charming and have good coffee. We offer interested parties the great advantage that we don't just present hardware from one company, but that we are manufacturer-independent."

Contact person on site

Alpha-Omega Technology GmbH & Co. KG
Jan Bose, CEO
Joint stand in the Smart Energy area
Hall 5, Stand 5E112