

Saving water thanks to Shayp's water management solution

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Shayp has developed a water management solution to monitor consumption, detect leaks and track interventions. The impact of this monitoring solution stretches from a reduction of water wasted and lower bills to smaller environmental consequences and reduced maintenance costs, while the effort to install and operate the system is limited.

This case is one of the 15 smart product examples we have compiled for you in the Smart Product Inspirator

Discover all 15 examples

Shayp is a scale-up company specialised in the analysis of water consumption and early leak detection in residential, commercial and institutional buildings.

Why this product

Shayp started from the observation that water leaks in buildings have been overlooked for too long as a cause of waste, costs and damage. Conventional water meters are suitable for the correct billing of water consumption, but not for detecting leaks. So the company worked out a water management solution to monitor consumption, detect leaks and track interventions. Insurance companies wanted to buy the product even before it was developed. This was enough confirmation of the need for Shayp to start building the first version of its product.

Value for the customer

The primary impact of Shayp's water management solution is less water waste due to leaks, leading to lower water bills and a reduced environmental impact. In addition maintenance costs are reduced because leaks can be detected remotely with minimised on-site intervention. Finally, the effort to install and operate the system is limited: the installation is non-invasive, no configuration is required thanks to learning algorithms and the user-friendly software brings all information together for easy multi-site management.

Technology behind smart water management

Shayp's water management solution consists of a wireless water meter reading system and water management software. The long-range, battery-powered data logger is compatible with all pulse-ready meters, specifically designed to withstand water immersion and harsh conditions. Thanks to Narrowband IoT connectivity data transfer is ensured, even in deep underground locations. The management software, accessible from any device, provides maintenance staff with actionable insights. The system detects leakages by means of machine learning algorithms and notifies users via SMS or e-mail. The learning algorithms progressively learn the normal flow patterns in plumbing systems and assess leakage patterns that differ from normal water consumption. A dedicated web app for buildings allows building managers and end-users to control their water consumption and the state of the water supply. A bi-directional API enables external data to be integrated and water meter data to be shared with other platforms.

Capturing revenue

Shayp offers its solution as a service through a subscription model for the hardware and software combined. In addition to various recognitions for the societal impact of its innovation, this has also brought the company rapid growth and the necessary investments to further roll out its solution in the European real estate sector.

Next steps

Shayp is improving and extending its offering in three strategic areas. Firstly, Shayp continues to work on technological improvements to help its customers optimise their water use. The water analytics and the leak and anomaly detection accuracy are constantly being improved. Secondly, Shayp is collaborating with water utility companies. The company aims to adapt its technology to be data and hardware-agnostic. Data could then be taken and analysed from any source. Finally, Shayp seeks to offer more services to its customers. The company recently expanded its offering with an embedded insurance and plans to provide similar services in the future.

Smart Product Scenarios

To enhance your chances of success and guide your smart product innovation, Sirris offers you practical tools and guidelines. Our **Smart Product Inspirator** provides you with a framework for identifying valuable smart product ideas based on the 5 most common scenarios and 15 smart product examples illustrating these scenarios. With these carefully analysed scenarios we help you uncover the potential for success . The key scenarios for Shayp's water management solution are: '**Smart maintenance**' and '**Digital user interface**'.

Authors



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