Partnering for virtual twin technology for IoT products and services

Saft lithium-based batteries support Deutsche Telekom's IoT ecosystem with an optimal power solution

Key benefits for Deutsche Telekom

• Offering IoT developers the optimized power solution for their use case
• IoT Solution Optimizer users shorten the time-to-market of their designs by simulating field-life conditions
• Access to Saft's team of engineers and scientists

Features of Saft's power solution

• Multi-technology offer answering the needs of most IoT applications and communication protocols
• A unique database of test results to ensure realistic simulations
• Customized / tailor-made lifetime calculation based on data from a 30-year track record

The challenge: IoT developers have difficulties finding the right power solution for their devices.

Until recently, storage costs, bandwidth, and processing power restricted the use of digital twins for enterprises. With the IoT, however, the digital twin is now much more cost-effective to implement, and all indications seem to predict we're on the cusp of a digital twin technology explosion. One of the earliest adopter of this technology is Deutsche Telekom, which launched its IoT Solution Optimizer tool in early 2019.

With this scalable tool, global businesses can assemble a virtual twin of the IoT service they want to deploy. The IoT Solution Optimizer helps model hundreds of potential hardware and applications scenarios within seconds answering many critical questions, such as what battery technology to use.

This helps enterprises choose the right solution for their needs, optimize their designs to maximize their return on investment, and shorten time-to-market. The tool streamlines the onboarding experience with a single, unified, cloud-based package.

The solution: Saft lithium cells.

In many cases, the effectiveness of each IoT solution is directly related to the quality of the battery. Some technologies cannot power up the chipsets in all necessary operating temperatures or support the required pulse currents. If the lifespan of the device is too short, the investment suffers. To avoid this, Deutsche Telekom opted to have Saft's range of lithium batteries pre-integrated into the IoT Solution Optimizer's product shelf. As a result, it is much easier for IoT developers to select a correct match for their configuration.

"The need to partner with Saft was self-evident for us. We are confident when customers choose to have Saft batteries on board which can optimize their design for a long service life, even up to 10 years in some cases."

Miguel Rodriguez, Senior Manager of Iot Device Verification, Deutsche Telekom