

Pioneer in process expertise

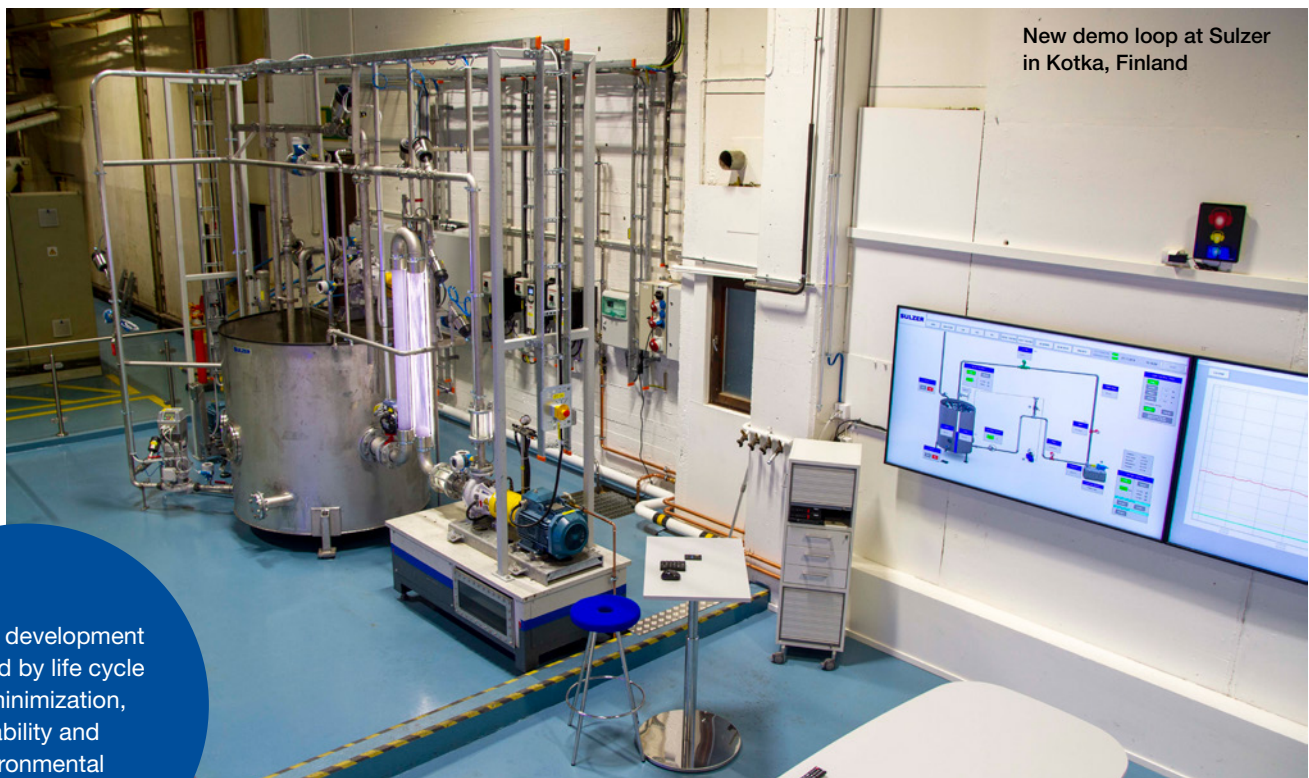
Sulzer is at the forefront in the field of industrial pumping and mixing technology. As a matter of fact, the state-of-the-art industrial pumps and mixers have basically remained the same for decades, but the technology is constantly being improved and adapted to new market requirements.

The business development center of Sulzer's Industry business unit is located in Kotka, Finland. A show and training loop with the most common process pumps and accessories was built last year in the factory premises. In the loop, the behavior of pumps in different conditions can be demonstrated, like pumping of gas-containing liquid, self-priming pumping, ejector priming and pumping under cavitation.

"During a demo, we are able to show the customer the operation of the process pump in different situations - both at the optimum and extreme points of its operation range. This way we can increase our customers' understanding of the factors that influence the selection of a pump. Among these factors, energy efficiency is one of the most important, as is minimizing the consumption of sealing water," says Saku Vanhala, Product Portfolio Manager.

The Industry business unit develops and manufactures equipment for the pulp, paper and board industry, for the fertilizers, metals and mining industries, for the chemical process industry as well as for the food and biofuels industries. It also serves industrial water treatment applications in all these segments. The company sees future opportunities especially in processes related to renewable raw materials and the circular economy.

"Sulzer has a full product portfolio also for water and wastewater treatment. Our range includes high-speed turbocompressors with unique active magnetic bearing technology," says Matti Rikka, Head Strategy and Projects. The new technology offers the best possible efficiency, low wear and thus lower maintenance costs, and finally a longer service life for the compressor.



Product development is guided by life cycle cost minimization, reliability and environmental friendliness.

The latest innovation is a wireless IoT condition monitoring system, Sulzer Sense, which monitors the pump's temperature and vibration digitally. The solution includes wireless sensors that are attached to a pump, agitator, motor or any rotating equipment. The sensors measure temperature and vibration and send the data to the cloud. This means that the operating status of the equipment can be remotely monitored on a mobile, tablet, laptop, etc. anywhere and anytime. Sulzer continues to develop further predictive maintenance algorithms, machine learning and smart asset management functionalities to maximize the added value for the customers.

The cornerstone of Sulzer's product development is close cooperation with the customers. Therefore, it is no wonder that the company is known for its strong process expertise.

"Technological know-how also includes the ability to manage the whole process from product design to follow-up. We understand the customer's processes and tailor the equipment accordingly," says Jukka Vanhala, Sales Manager for Finland. To summarize, the key to success is simple: "Our staff is curious. We keep our finger on the pulse and we are genuinely interested in what our customers need."



Hydraulics, impeller, seal, pump design and material - many factors together influence the operation of the pump, in addition to the fluid being pumped and the process temperature. These features can be tested in the demo loop, here presented by (from the left) Jukka Vanhala, Matti Rikka and Saku Vanhala.