

8-4-2026 Valmet IQ Virtual sensor

### **Valmet's IQ Virtual Sensor, strength optimization and fibre & starch saving**

31 Mar. 2026: Valmet introduces Valmet IQ Virtual Sensor, a software-based solution that gives paper and board producers real-time visibility of critical end-product strength properties that have traditionally been measured only in the laboratory. By providing continuous quality predictions, the solution enables mills to maintain consistent quality, reduce fibre and starch costs, decrease energy consumption, and increase overall production efficiency.

By delivering minute-by-minute predictions of key paper properties, such as tensile and tear strength, burst and short-span compression test (SCT), using the mill's existing data, the system provides operators with real-time visibility into product quality. Continuously learning from laboratory feedback, it enables proactive process optimization, reduces waste, helps prevent quality deviations, and improves mill profitability.

"To avoid rejected batches, operators frequently build in large safety margins, resulting in increased use of costly raw materials and higher production costs. With Valmet IQ Virtual Sensor, operators no longer need to wait for laboratory results to understand how their actions will affect end-product quality. In addition, its built-in "what if" simulator lets operators test adjustments and see predicted impacts before applying changes to real production. By reducing uncertainty and enabling lower safety margins, the solution demonstrates how optimized process control helps unlock resource efficiency.

Valmet IQ Virtual Sensor delivers real-time quality predictions during processing without the need for additional sensors or production downtime. All calculations run locally, without cloud dependency, ensuring secure data handling and fast response times.

Seamlessly integrated with Valmet DNA and Valmet DNAe, the solution is highly intuitive, allowing operators to view predicted strength properties alongside other quality data from scanners. Empowered with continuous insight, operators can make faster decisions and improve production efficiency.

Valmet IQ Virtual Sensor is part of the Valmet IQ Quality Management Systems family, backed by more than 30 years of industry-leading expertise and continuous innovation in quality control for paper and board production.

Although available as a standalone solution, Valmet IQ Virtual Sensor delivers unmatched quality management when combined with the Valmet IQ Quality Control System (QCS). Together, they provide mills with a holistic quality overview across the entire machine and even tighter control of essential quality parameters – all in one unified interface.

In addition, IQ Virtual Sensor is future-proof and can be expanded to automated closed-loop controls with Valmet Advanced Process Controls (APC), enabling the next level of quality performance, process optimization, and profitability.