ARTIN

RIETER

RIETER HOLDING AG

CASE STUDY

MANUFACTURING SOFTWARE

Rieter is the world leader in machinery for processing cotton and synthetic fibers – its machines run in spinning mills all over the world.

Over 6.5 years, ARTIN rewrote an outdated, undocumented industrial system into a modern cloud platform that tracks the performance of up to 40 machines, shift efficiency and plant productivity in real time – and actively recommends how to configure the machines for maximum output.

CHALLENGE

Rieter ran its Spider Web software on-premise in every plant worldwide – with no documentation, no room for downtime, and under unstable connectivity and power outages. The system had to be completely rewritten into a modern web application, keeping all existing functionality and adding new features. Rieter also needed a cloud version for sales presentations and trade shows, where it showed customers the system before it was deployed in their plant.

SOLUTION

- Complete rewrite of an undocumented legacy system into a modern web application (Kotlin, Spring Boot, PostgreSQL/Timescale, Docker)
- **Edge** – a robust on-premise version for industrial environments, deployed in every plant
- **Essential Cloud** – a cloud version for presentations and winning new customers
- **Machine Comparison** – real-time comparison of up to 40 machines within a single production step
- **Optimize** – a unique feature that recommends the optimal machine configuration based on Rieter's internal data
- Direct connector reading data straight from the machines, bypassing outdated middleware

TEAM SIZE

Peak: 36 ARTIN people (FE + BE developers, QA, UX, analysts, architects, Scrum Masters)

TECHNOLOGIES

Kotlin · Spring Boot · PostgreSQL · Timescale · Docker · Gradle · RabbitMQ · Kafka · Keycloak · JUnit 5 · ArchUnit

PROJECT DURATION

September 2018 – March 2025 · 6.5 years

What the client valued:

"The ability to scale up a complex team quickly, take ownership of end-to-end development and ensure a structured knowledge transfer even when the collaboration ended – with no vendor lock-in and full transparency."

WITHOUT BEING ASKED BY THE CLIENT, WE DESIGNED AND IMPLEMENTED A DIRECT CONNECTOR TO THE MACHINES THAT BYPASSED THE OUTDATED MIDDLEWARE.

The result: faster data collection, a simpler architecture and a competitive advantage that Rieter gained thanks to us – not its own analysis.

HAVE A SYSTEM YOU'RE AFRAID TO TOUCH?

Let's talk about it.