

SMART FACTORY ASSEMBLY USE CASE

BOM Picking

A **Bill of Materials (BOM)** is a structured list of all parts, components, and materials required to assemble a product. In many production environments, picking the correct parts from the BOM is a critical – but often error-prone – step, especially when workers rely on printed lists or manual selection.

With **ELAM Solutions**, BOM picking becomes digital, guided, and error-proof. The BOM data is automatically imported from the ERP system and displayed clearly at each workstation. Operators are shown exactly what to pick, with visual cues and optional support like pick-to-light systems or scanning. This ensures the right parts are used – every time – and avoids costly mix-ups or missing components.

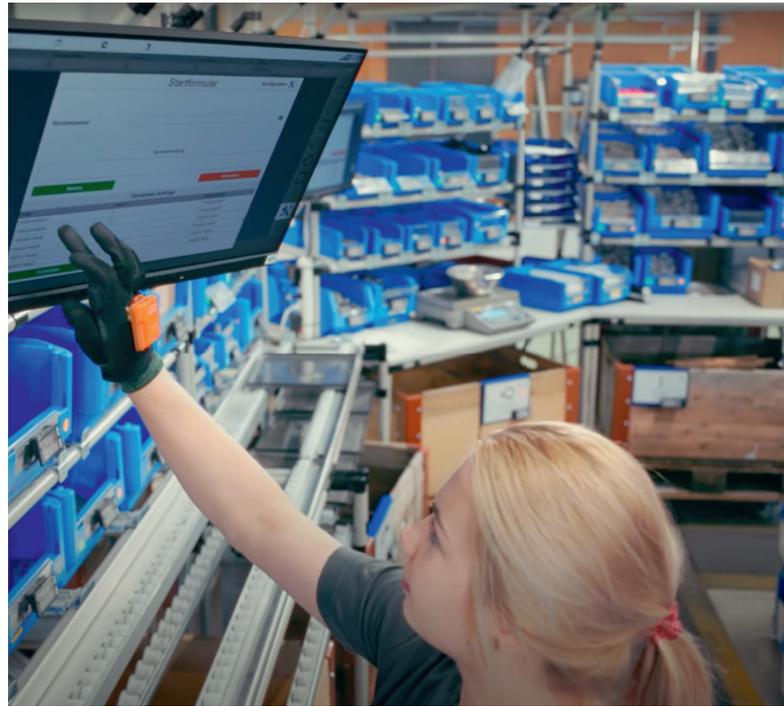
CUSTOMER PROFILE

Company Name: Griesser AG

Industry Sector: Sun Protection Systems / Building Technology

Key Facts:

- **Headquarters:** Tännikerstrasse 3, 8355 Aadorf, Switzerland
- **Founded:** 1882
- **Employees:** Approximately 1,500 (as of 2021)
- **Annual Revenue:** CHF 370 million (2021)
- **Production Facilities:** Switzerland (Aadorf), France (Carros and Wolschwiller), Austria (Nenzing), and Italy (Verona and Como)
- **Global Presence:** Active in nine countries with its own companies and represented by partners in over 30 countries.
- **Certifications:** Environmental Product Declarations (EPDs). Commitment to sustainability and climate protection.
- **Products & Services:** Development and manufacturing of high-quality sun protection solutions, including external venetian blinds, rolling shutters, facade awnings, window shutters, and patio and balcony awnings; intelligent control systems for automation and energy efficiency.



INITIAL SITUATION / CHALLENGE

At Griesser AG, a critical step in the production process involves manually picking and assembling sets from a large inventory of individual components. In one of their key workstations, operators handled more than 260 different items – without any form of digital guidance or error-proofing in place.

This lack of structured support led to frequent picking errors, such as:

- Selecting the wrong component from similar-looking bins.
- Missing parts in the final set.
- Increased rework and quality checks downstream.

The high variety of components combined with the complexity of the picking process made it difficult to maintain consistency and efficiency in this area of production.

PROJECT GOALS

Griesser AG set out to bring structure, reliability, and efficiency to their manual picking process.

The main goals of the project were:

- Establish a standardized and guided picking process across all operators.
- Enable direct ERP integration so that Bills of Materials (BOMs) are automatically transferred into ELAM.
- Automatically generate clear, step-by-step digital work instructions based on the BOM.
- Introduce Pick-to-Light technology to visually guide workers to the correct item, reducing search time and picking errors.

By achieving these goals, Griesser aimed to significantly improve process quality and consistency – especially in high-variation environments involving over 260 parts.

SOLUTION

To address the challenges in their picking process, Griesser AG implemented an ELAM Enterprise solution centered around the “BOM Picking” function. This enabled a fully digital and guided workflow, seamlessly integrated with their ERP system.

Key elements of the solution included:

- ELAM Enterprise with BOM Picking: Automatically receives the Bill of Materials from the ERP system and dynamically generates step-by-step digital work instructions for each set.
- SmartLabels: Existing SmartLabels were leveraged as Pick-by-Light indicators, providing visual signals for correct component locations while also supporting their C-parts management process.
- ProGlove Integration: Workers use ProGlove scanners to scan the QR code on each SmartLabel, verifying that the correct part was picked before proceeding.

This combination of visual guidance, digital verification, and ERP integration created a structured, error-proof picking process – even in a complex environment with over 260 components.

IMPLEMENTATION

The implementation at Griesser AG followed a structured, step-by-step approach over approximately six months:

- First, all necessary hardware was installed, including the SmartLabels, ProGlove scanners, and workstation infrastructure.
- Once the ELAM server was in place, the project team proceeded with configuring the system, including BOM mapping, Pick-by-Light logic, and ERP interface settings.
- The ELAM Enterprise environment was tailored to support the “BOM Picking” workflow, ensuring that every picked set could be guided, verified, and traced.

This phased rollout allowed Griesser to test each component thoroughly and ensure smooth handover to the operational team.

RESULTS / BENEFITS

Since implementing the ELAM Enterprise solution with BOM Picking, Griesser AG has seen substantial improvements in both quality and operational flexibility:

- Near-zero picking errors thanks to visual guidance and real-time verification via SmartLabels and ProGlove scanning.
- Fully standardized picking process allows any employee to work at the station without prior training, enabling high flexibility in workforce planning.
- No time wasted on onboarding or manual checks – operators are guided step-by-step through the picking process with full traceability.
- Strong alignment with ERP workflows and C-parts management ensures seamless material availability and high process efficiency.

These results not only increased production reliability but also reduced overhead costs tied to training, rework, and quality control.



Thanks to ELAM and the BOM Picking solution, we've achieved a completely error-free picking process. The system is so intuitive that any employee can step in without prior training. It's a huge gain in flexibility and efficiency for our operations.

Richard Lüthi - Teamleader