

Reference report

Contact person



Arvid Falkenberg

+49 371 2371-191 | +49 151 19492684
 +49 371 2371-150

Email: arvid.falkenberg@sigma-chemnitz.de
 Internet: www.sigma-chemnitz.de/en

Digitalisation of intralogistics increases efficiency



www.reifenwerk-heidenau.com

About SIGMA

As a reputable system house in Saxony SIGMA Chemnitz GmbH operates as system integrator and partner of well-known Providers in the IT sector. Our over 80 employees at the Chemnitz and Dresden sites form a competent team at the location Chemnitz. With expertise, competence and almost 30 years of experience we offer our customers reliable and powerful solutions.

About our AutoID and RFID solutions

AutoID and RFID solutions for production, logistics and supply chain. Our customers appreciate us as competent, innovative partner, to accompany them from the initial problem analysis until the goal with commitment. Many years of project experience of our employees form the foundation for effective AutoID and RFID solutions for production, logistics and supply chain.

About GRAIDWARE®

The AutoID middleware GRAIDWARE® is an intelligent abstraction layer for different hardware components and business applications. Work tools, production steps and AutoID data can be identified, monitored, controlled and configured.

Initial situation and goal

In tyre production, different load carriers are used at different production sites within the factory premises. The semi-finished products on the load carriers could previously only be identified via the accompanying documents.

Due to the use of production documents, the manual search processes, which were sometimes carried out by employees not involved in logistics, proved to be very time-consuming. The goal of digitising intralogistics was to replace the previously used load carrier papers.

App-controlled documentation of load carriers

During the production process, the goods must be assigned to the load carriers several times. In the processing areas, the material is transferred to new load carriers and the quantities are recorded. At the respective workstations, employees record the half-products. The involvement of the key users in the individualisation of the app creates a high level of acceptance among the workers.

Traceability through RFID gate and mobile app

In order to be able to digitally record the change of location of goods carriers within the factory premises, RFID gates were installed that enable automatic stock transfers. In addition, the workers are able to record and document loading, reloading and unloading processes using handheld scanners. The app on the handheld offers the advantage of being able to identify free storage spaces and to locate and track empty or loaded load carriers and articles, regardless of location and on the move.

Production terminal

The terminal application developed and provided by SIGMA Chemnitz is used for production planning and data collection. Employees log on to the terminal via personnel transponders. In this way, person-specific information can be made available and information on the current planning status can be obtained at any time. Authorised persons can enter actual values, view the automatic debiting of quantities and articles from the storerooms and thus call up planned figures and production statuses in real time.

Conclusion

With the RFID technology used, SIGMA Chemnitz has made the containers used at the Heidenau tyre plant IoT-capable and automatically identifiable in the industrial environment. The digitalisation of intralogistics eliminates the use of production paperwork, which leads to an increase in efficiency in company processes. In addition, the search processes could be significantly reduced.

Our customer says so...

„Thanks to the productive cooperation with SIGMA Chemnitz during the implementation process, especially the smooth interaction between RFID technology, software development and project management, we are benefiting from a digitally supported process optimisation for transparent and efficient intralogistics only four months after the introduction. optimisation for transparent and efficient intralogistics.“

Jens Fechner, Project Manager at Reifenwerk Heidenau GmbH & Co. KG