



ProPLM at MAHA

SAP process and data optimization by ProNovia at MAHA

ProNovia focuses on the optimization of your digital business processes. As a leading Swiss provider of SAP PLM solutions we open up new perspectives for national and international companies with SAP based products and complete solutions. We support the MAHA Maschinenbau Haldenwang GmbH & Co. KG during the introduction of ProPLM and thus created the basis for the replacement of their ERP system. Improved data quality and greater usability are just two of the advantages of the new solution.



Client MAHA

MAHA, Maschinenbau Haldenwang GmbH & Co. KG, is the world's leading workshop equipment supplier. The company was founded in 1969 and has since developed into one of the most efficient manufacturers of workshop equipment: It covers the entire range from test stands and vehicle lifts to test equipment for cars and other vehicles. In addition to hardware, MAHA's product range also includes powerful software solutions. With these, test systems can be linked and adapted to the individual requirements of the customer. MAHA employs over 1000 employees in more than 150 countries worldwide and also has a network of international trading partners. This means that customers all over the world can be supplied with high-quality testing and lifting technology. The customer base primarily includes automotive workshops, testing organizations, vehicle manufacturers and government organizations. The annual turnover of the company is around 150 million euros.

Task

Due to the replacement of the existing, outdated PDM system and the upcoming replacement of the ERP system, MAHA decided to implement SAP S/4 HANA as a complete solution. In a first step, the PDM system was

to be replaced by SAP PLM, thus creating the basis for the subsequent replacement of the ERP system.

The objective of the SAP PLM introduction was to harmonize and clearly define the working methods with regard to processes, data models and CAD structures within the development department. The implementation was to be as close as possible to the standard.

Procedure

MAHA has decided to implement ProPLM and the associated Configuration Management of ProNovia. The reasons for this decision were the low project risk due to the ProNovia Best-Practice-Approach, the clearly defined data models and the improved usability for the users. A rough concept based on the ProNovia Best-Practice-Approach was carried out for a precise project and requirement definition. Based on this, the project planning was carried out, the project setup was determined and the other ProNovia partners MAIT for CAD integration and Seal Systems for neutral format generation and output management were involved.

In the actual implementation project the rough concept was refined and the implementation in SAP S/4 HANA was carried out. The CAD integration into the Configuration Management of ProNovia was done by the SAP Engineering Control Center (ECTR). In parallel a new classification system for the different article groups

was established, a naming solution was implemented, the data cleansing in the PDM system was carried out and the data migration was prepared. At the same time, an interface from SAP PLM to the existing ERP system had to be established to ensure data exchange up to the SAP S/4 HANA introduction in the logistics areas.

The big challenge was the data transfer, as a data cleansing had to be carried out at the same time in order to guarantee the necessary data quality for a complete and correct data migration. With the SAP PLM introduction, the existing CAD system SolidWorks was also updated to the latest version. At the same time, 3D neutral formats were generated, giving every authorized user access to the digital twin of engineering. The intensive tests, sustained user training and precise cutover planning contributed significantly to a successful go-live. Parallel to the ProPLM implementation ProNovia developed a concept to replace the project document repository, which was also managed in the existing PDM system. The project documents are now managed in a structured way via ProNovia ProDocument in SAP, which enables direct access and linking of project documents with construction data.

"Thanks to the Best-Practice-Approach of ProNovia the SAP PLM implementation project was calculable, and the project risk was low. Our concrete requirements were in the focus during the whole cooperation. Therefore we are convinced that the SAP PLM implementation provides a very good basis for the introduction of the logistic areas with SAP S/4 HANA and the upcoming digitalization projects at MAHA". Roy Lazonby, IT-Leiter MAHA











Detailed solutions

ProConfiguration - SAP PLM Configuration Manager

- General
 - Mapping of a product lifecycle and the associated data model at management and plant level
 - Ensuring data consistency
 - Defined processing scenarios for the handling of the data model
 - Generation of defined product states via validity control
- · Data model
- · Display of engineering data

ProIntegrationLib - SAP Solution PLM Integration Library

- · Integration of CAD data into the Configuration Management
- · Establishment and control of defined structural relationships and thus specification of a uniform design methodology

SAP ECTR

SAP CAD Integration for SolidWorks

ProPLMClient - SAP Solution PLM Client

Central interface for displaying, managing and editing all relevant SAP PLM objectse

ProBaseline - SAP Solution PLM Dynamic Baseline

- Evaluation of data and structures in individual change states
- Output of defined documents for a bill of material structure

ProDocument – SAP Solution Document Management Client

- Structured document management for project documentation
- Automatic structure creation including document templates for new projects

ProChangeDoc - SAP Solution DMS Change Doc

Integrated and controlled change documentation on the individual PLM documents

ProOffice – SAP Solution DMS MS Office Integration

Simplified data maintenance through automatic data reconciliation in Microsoft Office

ProAdmin - SAP Solution PLM Administrator

- Tool for correcting erroneous data for material and document master
- Set status / person responsible
- Document originals store / import / remove / export
- Change Classification Data

ProFramework - SAP Solution Application Framework

Intuitive and powerful middleware for modern and flexible multi-object and multilayout applications

Neutral format generation from Seal Systems

Status-controlled neutral format generation for 3D, 2D and Office

PRONOVIA SERVICES AT A GLANCE

- · Project management
- Solution concept of the overall solution
- Realization of the solution via customizing and customer-specific developments
- Conception of the data migration
- Implementation of solution and product trainings

Products used at bei MAHA:







ProConfiguration

The tool for defining and mapping comprehensive PLM processes and data models..

ProIntegrationLib

Contains tools to stringently manage CAx/ PDM objects in the ProNovia ProConfiguration data model.

ProPLMClient

The user-friendly interface for displaying, managing and editing all relevant SAP PLM objects.







ProBaseline

The easy to use platform for the output of defined product configurations.

ProDocument

The user-friendly, integrated application for managing business relevant documents..

ProChangeDoc

The platform for integrated management of the change documentation.







ProOffice

The tool for transferring data from SAP master data to Microsoft Office documents and maintaining them consistently.

ProAdmin

The perfect tool for correcting incorrect data. Easily customize single or multiple files simultaneously.

ProFramework

The basis of all Pronovia products and future product releases.





