

TIME PRESSURE – LOCKDOWN - CHINA

Toolmanagement is, when it works anyway

at VOLKSWAGEN GROUP COMPONENTS

by Boris Kaiser

Two VW component plants need a new tool management solution. A brief requirements document and an intensive selection process, then the contract was signed and Go! What sounded like a normal TMS project turned into a challenge with Covid and Lockdown. One key to success was CIMSOURCE's cloud-based software ToolPal.

The initial situation was clear, the two VW plants Tianjin and Dalian in China wanted to take tool supply back into their own hands. Until then, the complete tool management service was sourced out to an external service provider. Especially in Tianjin, they were dissatisfied with this solution, as tool stock outs had repeatedly resulted in production stoppages.

In 2018, the search for a suitable software solution for their tool management tasks began. For CIMSOURCE, the request fit like a glove, because a similar project of insourcing had been successfully implemented shortly before. With the help of the TM system ToolPal, the

smooth transition from a service provider to the company's own operations succeeded on schedule. Thereby CIMSOURCE knew quite well what has to be offered, despite a rather limited requirements document.

However, it still took another 1,5 years for the contract to be signed. In November 2019, we flew from Germany and Japan (at that time CIMSOURCE Japan k.k. was just established) for the kick-off to China for the first time. The very German set-up of the plant, including the labeling of individual machines in German, made the task more familiar than expected and the

specifications were completed in about 10 days on site.

The agreed schedule provided for implementation of the project within 6 months and had a hard stop at the back, since the termination date of the service provider was already fixed. The main sticking points were the implementation of the interfaces to SAP and the data transfer from the previous service provider, from whom little support was to be expected.

In addition, according to our experience, the scheduled 20 man-days on site work, including

training and implementation, were far too few.

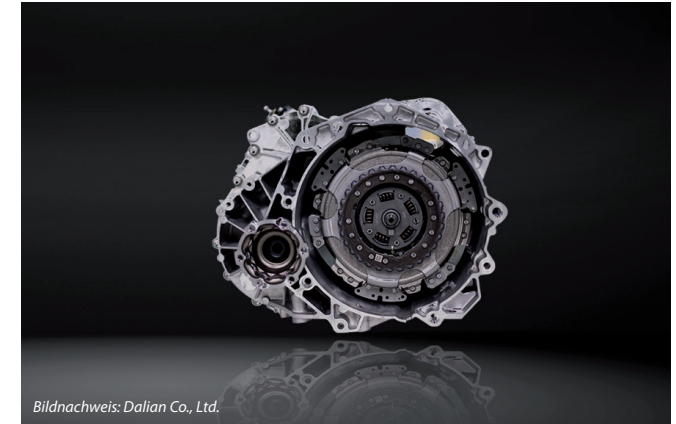
But then everything changed. Due to Covid, our kick-off trip was to remain the only one in the entire project! Lockdowns, first in China and then in Germany, forced us to approach the project completely differently than we had done before. So, instead of conducting on-site training, we created training videos that we produced in our newly established green room (internally called Rooftop Studios).

The online trainings proved to be surprisingly productive, as the team to be trained in China was able to watch the rather intensive videos again and again. For the necessary Q&A sessions afterwards, an expert from CIMSOURCE Germany also went to the Asian time zone for a week at short notice. In times of lockdowns this was even a welcome change. That way, we managed to implement the project within 7 months despite the lockdowns. The go-live came in time before the service provider left the company.

Today, ToolPal is used daily by about 50 employees in both plants. Including accessories, approximately 4,000 components and over 5,000 tool assemblies are managed at the Tjianjin plant, and 2,000 and 1,400 at the Dalian plant.

The focus is clearly on tool logistics. Every week, approx. 6,000 bookings are made in Tjianjin and 8,000 in Dalian. Thereby 20-30 users are active in the system simultaneously at any point in time.

ToolPal is the central link between industrial engineering and logistics, which is organized with SAP. Proposed purchase orders are transmitted via interfaces. The previously quite complex approval processes for each purchase order have been replaced by a simple budget approach. Now only those order processes



Bildnachweis: Dalian Co., Ltd.

Produziert in Dalian: Das DQ200 Doppelkupplungsgetriebe

that do not correspond to a regular procurement pattern are brought to the attention of the supervisor.

Inventory management has also been automated to a great extent. Receipts of goods are announced via SAP and only confirmed in the inventory receipt.

A part that should not be underestimated is above all the reporting. ToolPal is able to make a very fast and therefore up-to-date cost-per-part calculation.

The cost calculation of each tool takes the procurement cost, customs- delivery- and regrinding costs into account.

And all this in the cloud? For the ramp up, yes. But the productive system is operated "on-premise," which is company policy at VW.

Volkswagen Automatic Transmission (Tianjin) Co., Ltd. (VWATJ)

Volkswagen Automatic Transmission (Tianjin) Co., Ltd. (VWATJ) is China's largest transmission manufacturer with two plants, seven transmission products and over 4,600 employees covering an area of 761,000 square meters.

In 2019, local production of the DQ400e hybrid transmission and APP290-E powertrain will help Volkswagen Group China take a solid step forward in the electric vehicle market. In 2020, local production of the APP310 E-drive, which powers MEB platform models, marks a further strengthening of Volkswagen Group's e-mobility strategy in China.

In 2023, VWATJ will produce 4 dual-clutch transmissions with product names DQ381, DQ501, DL382, DQ400E and an all-electric NEV transmission called APP310. Production of a new NEV component (APP550) is currently under development.



Bildnachweis: CIMSOURCE GmbH

Boris Kaiser vor dem VOLKSWAGEN Automatic Transmission (Dalian) Werk 2019