

CASE STUDY

# How Roche uses Unison Planning<sup>™</sup> to give society maximum value



# An uncompromising and successful journey

Streamlining supply chain processes and planning is well underway for Roche, the Swiss multinational healthcare company. As part of its ASPIRE program aiming to give maximum value to society, Roche had been looking to dramatically improve decision-making, from managing short-term planning issues effectively to setting out the best supply strategies for the medium and long term. Working with OMP since 2019 was a game-changer.







"OMP's end-to-end visibility gives us real-time insights into our inventory levels, production schedules, and transportation plans so that we can make more informed decisions"

# Supply chain planning is all about decision-making

Roche's aim through the ASPIRE program is to be the number one patient-centric organization in the industry, confirms Ana Gerbracht. "In recent years, we've been learning that we would improve what we offer to patients and society if we could make better-informed decisions, in both the short and the longer term. Because supply chain planning is all about decision-making."

Gerbracht sums up the kinds of questions Roche asks itself every day: "How much do we need to produce? Do we need to invest in more manufacturing capacity three years ahead? If so, where? How much inventory should we build up and where should we put it? What markets should we serve first if there's a shortage?"

"These are all complex issues, and the decisions we make can have a huge impact on the people who depend on our medicines."



**Ana Gerbracht**Supply Chain Planning Project Leading

# More accurate predictions, better balance capital, cost, and service

Analysis revealed that developing this kind of patient-centric supply chain would mean a far-reaching digital transformation of the whole planning process for Roche. "It was both a necessity and an opportunity," explains Gerbracht. "Our planning apparatus was reaching its limits, so we needed to have more accurate predictions about the future, backed by data and using modern forecasting techniques. We needed more advanced analytics to help us decide how to use constrained resources more effectively and better balance capital, cost, and service."

"We also needed a shared platform where we could make collaborative decisions across the entire supply chain. And we wanted to plan more proactively – up to 10 years ahead – so that we could make more appropriate decisions about the future. That's why we needed a digital solution that can develop and evaluate multiple scenarios over different time horizons."

# The full scope in one solution

Roche selected OMP's Unison Planning as its integrated solution of choice. "OMP allowed us to address the full scope of our needs in one integrated solution," explains Gerbracht. "They cover every aspect of both short- and long-term planning."

"In 2020, we went live with a lead model for operational planning and scheduling, covering the full source, make & deliver scope, which subsequently was rolled out across the business. Last year, we added demand management. We already get excellent feedback from demand planners who say that they now can spend more time planning exceptional products because OMP's machine learning solution automates a lot of the forecasting.

"We're now in the process of implementing the more tactical planning functionality and capabilities, which allow us to build and evaluate scenarios for our sales and operations planning. This is also being tied in with OMP's network design solution, which covers our extended 10-year strategy and has been implemented already."

# More grip on constraints and better plans with alertdriven planning

Features of the solution include the multi-level planning of capacities and campaigns, taking into account shelf-life, regulatory, and artwork constraints as well as performance and service targets. The quality of tank planning, including the crucial planning of mobile tanks, has improved a lot, stretching farther out in the planning horizon. Production sequences and line utilization are optimized, cutting down on change-over times, and taking care of key bottlenecks. Mathematical or Al-based solvers are used to keep an eye on supply chain constraints and KPIs.

The scenario planning capabilities can rapidly assess what impact changing the planning inputs has on the supply chain. Automated alerts highlight potential issues with any plan so that planners can focus on addressing exceptions rather than developing entire plans manually. And in-built support for characteristics-based planning means that throughput times can be dramatically reduced without compromising plan feasibility.

### Insight into the factors that affect plans

Head of Network Planning Melissa Majewski shines a light on how this integrated solution revolutionizes long- and mid-term decision-making at Roche: "S&OP decisions related to drug substance production are made much faster, more proactively, and based on a much deeper shared insight into the consequences. Planners can focus on the more complex issues the system brings forward. Or they evaluate the consequences of multiple scenarios. For example, our long-term planners recently created more than 120 scenarios for our 10-year horizon, a great help to underpin our strategic decisions. This is the type of strategic studies we will be doing even more in the future."

"Planners have a better overview on what's happening across the operational planning horizon, and better understand how these neighboring areas affect their plans"

# The journey continues

The digital supply chain planning transformation at Roche is currently being extended to include multi-echelon inventory optimization (MEIO). A preliminary study carried out by OMP indicated the great potential to reduce safety stock levels and end-to-end lead times while assuring outstanding customer service levels. Analytics on lead times and variability, as a key input for MEIO, will be driven by OMP's Data Genie, which is the first pilot use case for this functionality at Roche. Many more parameters of the digital twin will be maintained by Data Genie in the future.

Furthermore, the tactical planning level with a 3-year horizon is being extended to fully integrated with the long-term strategic planning (3 to 10 years ahead), which has been operational at Roche for a few years now. This integrated approach means that the complete spectrum from 0 to 10 years will be automatically generated and aggregated from the operational data model, which in turn is integrated with the production and distribution data in SAP.

Finally, the goal is to also deploy the OMP capabilities for the clinical (R&D) operations, which will include integration with SAP's Business Technology Platform (BTP) to gather clinical demand based on running & future trials.



"Planners also have a better overview of what's happening across the operational planning horizon or product portfolio. This improved insight in turn allows them to constantly finetune the master data governing the automatic solvers. Our people are getting to grips with it."

# Better collaboration, more trust

It does mean that the project implies a significant effort to effect organizational change. "Yes, that's part of the journey, and not the easiest part," confirms IT Product Manager Pawel Jakielaszek. "But I see that our planners are increasingly with us. They are dedicated to figuring out how to get the most value out of it. They are creating their own report pivots for the dashboard. And they are building fancy business rules to automate tasks."

# Capturing value as quickly as possible

The digital transformation project at Roche is a comprehensive effort involving significant organizational change. Central in the process was the development of a **planning operating model** for all the company's planning activities. It was developed as a guiding framework at the beginning of the project. This framework was used as a reference for evaluating potential solution providers. The framework has been further developed and finetuned along the way, taking into account lessons learned.

Implementation of the supply chain solution followed an incremental approach, from proof-of-concept to a company-wide solution:

# **Proof-of-concept**

After selecting OMP as the solution provider of choice in 2019, Roche set up a proof-of-concept (POC) within the Roche IT environment, using a restricted dataset. It was important for it to cover the entire functional spectrum and comply with the new planning operating model.

# Lead model

Subsequently, a lead model was developed for a subset of product groups and production plants, allowing Roche to rigorously test, finetune, and ultimately validate the solution. Throughout this phase, the project team made sure to capture value wherever possible, accelerating acceptance and shoring up the change management program.

# Scale up

Finally, the validated model was scaled up to include all of Roche's 200 product families and the entire network of production plants, again capturing value as quickly as possible. This implementation coincides with Roche's global ERP migration to SAP S/4HANA. OMP's SAP integration follows this migration seamlessly.



"The automated transfer and communication of planning decisions brings people closer to one another"

Ana Gerbracht adds: "One crucial decision to accelerate acceptance and improve cross-company collaboration was to put in place a company-wide planning department with both centralized and local roles. This allowed us to break away from the rather fragmented and silo-based functional organization we had. The collaborative spirit has been further driven by Unison Planning. For example, I vividly remember the first automated transfer of planning decisions back and forth between operational planning and sales and operations. This really brought the people closer to one another."

## More mature discussions among planners

Gerbracht mentions another example of how OMP aligns previously disconnected organizational units: "Local sites now have direct access to the planning system to maintain their drug substance run rate information. This avoids friction between operational planning and site planning."

Melissa Majewski confirms the improved collaborative spirit: "Extensive hands-on training is also helping planners to develop a more collaborative mindset. It's a collective effort and I'm really happy to see how the sites and the planners are working more closely together, paying more attention to each other's concerns while putting more trust in each other's decisions. We see that the discussions among the different planners have become more mature."

"We see that the discussions among the different planners have become more mature."

# **About OMP**

OMP helps companies facing complex planning challenges to excel, grow and thrive by offering the best digitized supply chain planning solution on the market.

Its Unison Planning™ concept has a unique approach. It handles all supply chain planning challenges in a unified way. It's full scope and in-depth. Unison Planning™ synchronizes all planning stages, horizons, functions and roles. From source to deliver, from strategic to operational planning. The unique combination of services and technology boosts collaboration throughout your value chain, from forecasters to schedulers, from business leaders to technology experts.

Unison Planning™ is a cloud-based, out-of-the-box solution for industry-specific challenges. Hundreds of customers in consumer goods, life sciences, chemicals, metals and paper & packaging run it to make the right decisions at the heart of their business. Valued as a thought leader by experts as Gartner, OMP invests one out of every three dollars earned into innovation.

OMP for Life Sciences is an industry-specific solution tailored to the life sciences industry, and already in use at more than 250 plants.

# **About Roche**

Roche is a global pioneer in pharmaceuticals and diagnostics focused on advancing science to improve people's lives. The combined strengths of pharmaceuticals and diagnostics under one roof have made Roche the leader in personalized healthcare – a strategy that aims to fit the right treatment to each patient in the best way possible. Read more on www.roche.com for more information.

# Making your day

