ENECO SMART PLANNING APPLICATION

CLEVR

RUNNING AI IN MENDIX APPLICATIONS: SMART PLANNING SOLUTION FOR ENECO

Eneco is one of the main gas, heat and electricity suppliers in the Netherlands. Their boiler service visits over 250.000 customers on a yearly basis, efficiently scheduling appointments and associated technicians can greatly decrease operational costs. CLEVR and software provider UbiOps reduced operational costs with 36% while increasing the customer satisfaction.

Low code + analytics: the best of both worlds

The Eneco boiler service takes care of installation, regular maintenance and failures of your boiler or heat pump. Based on the contract type, regular maintenance will be performed every (other) year to minimize the risk of failure. Eneco sends out invitations to their clients to schedule a maintenance appointment, and tries to find an optimal match between the capacity of technicians and the number of appointments within a specific region. However, the rate in which invitations convert to scheduled appointments varies enormously, ranging from 40% to nearly 90% conversion rates. Such large differences are problematic for scheduling technicians. As a results, this does not only lead to unnecessary high costs, it also leads to either over or underworked technicians and unhappy customers.

Until recently, invitations were send out on post cards and the planning was done manually. Large improvements were already made by centralizing the invitation and planning process in one application. CLEVR build this application in Mendix, one of the world's leading low-code platforms. Post-cards changed to email batches with automated reminders, and technicians received the optimal schedule and route. Now it's time to improve even further, and leverage the power of data analytics.

Eneco managed to lower costs associated with inefficient planning with 36%. To enable more accurate planning of technicians, CLEVR developed a machine learning model which, based on asset-, customer- and seasonal characteristics, predicted the conversion of invitations to appointments, together with UbiOps.

Internal market research by CLEVR states that while both low-code and advanced analytics are expected to grow substantially over the next five years, the synergy between them remains largely unexplored. The CLEVR-UbiOps partnership changes that. The adoption and implementation of low-code applications has made application development cheaper and faster, and more accessible to a large audience. However, advanced analytics has yet to be applied to low-code applications. Often, it not only requires data science skills but also very specific IT knowledge that is scarce and expensive. The CLEVR-UbiOps partnership offers a unique proposition to fast-track your business by combining the easy implementation of low-code apps with the speed and low-cost deployment and maintenance of your data science code with UbiOps.

UbiOps

Implementing a machine learning model is often associated with a steep upfront investment to hire people with the required knowledge and setting up the entire machine learning infrastructure. Think about scalability, control over the costs and control over the process, containerization, security and IAM.UbiOps' all-in-one serving platform provides the functionality to deploy, scale and maintain machine learning models without upfront investment. Everyone with basic Python or R and API-integration skills is able to bring machine learning models to production for a fixed fee and mitigated risks.