# **Automated Banking** System Development

# Introducing new features while maintaining stability

## Summary

Sibedge has refined and improved the automated banking system for SMP Bank.

Front-end developer — 1 Back-end developer — 1 Analytics — 2

#### Duration

3 months

#### Industry

Financial technologies

#### **Technologies**







### **About Client**



SMP Bank is one of the 30 largest banks in Russia in terms of assets, one of the top five in terms of lending, and is in the 15th place in terms of deposits. It has 100 offices in more than 40 cities. The staff exceeds 3000 people.

# Challenge

To automate the business processes SMP Bank uses a platform of its own development — "A new financial multiplier". The system is fundamental, irreplaceable and plays a key role in bank's operations with physical entities. The financial world is in constant motion: the requirements of the Central Bank of the Russian Federation and the needs of the customers are constantly changing.

To keep up with these changes, the bank has to constantly improve the software platform and scale its functionality. Given the complexity and scale of the system, the internal development team needed to be expanded with qualified experts. And that's when Sibedge came to SMP bank's rescue.

### Solution

One of the main challenges of the project was to develop a function used to calculate leverage indicator for the banking platform, on the basis of which the system would come up to a conclusion: whether a client is eligible for a loan or not.

The deadline was as tight as could be imagined, and the challenge was to bring the platform in line with the new requirements of the Central Bank of the Russian Federation as quickly as possible. The team had only three months to dive into the project, draw the specification, and implement the project. In addition, it was necessary to add the following features to the platform:

- calculation of the amount of debt and current interest on the loan:
- a modified form of reporting for mortgage loans;
- repayment of the loan from one account;
- one-stop shop for the bank's contact center.

From a technical point of view, it was a very complex project that involved the use of multiple technology stacks at different stages of development.

Major technologies included C#, .NET, Angular, TypeScript, ngrx, PrimeNG, Selenium, and TeamCity. The project involved a team consisting of one frontend developer, two back-end developers, two analysts and QA engineers from the customer's side. Certain principles and values of the Scrum project management were used in course of the project.

### Result

Thanks to the coordinated work of the team, the project was successfully completed in the allotted time.

Just three months later, the customer received a leverage calculation mechanism that met the requirements of the Central Bank of the Russian Federation and allowed the bank to:

- detect existing loans and other debt obligations of the client;
- analyze income documents for the reporting period;
- check whether the client is registered in the Unified Federal Register of Bankruptcy Information;
- automatically assess the borrower's solvency;

Thanks to this project, the collaboration between Sibedge and SMP Bank has reached a new qualitative level, and the two development teams have become even more close.

Joint development and improvement of the automated banking system continues to this day. We are currently working on a quick payment system to speed up transactions and increase customer loyalty.