

# LEARNING MANAGEMENT SYSTEM



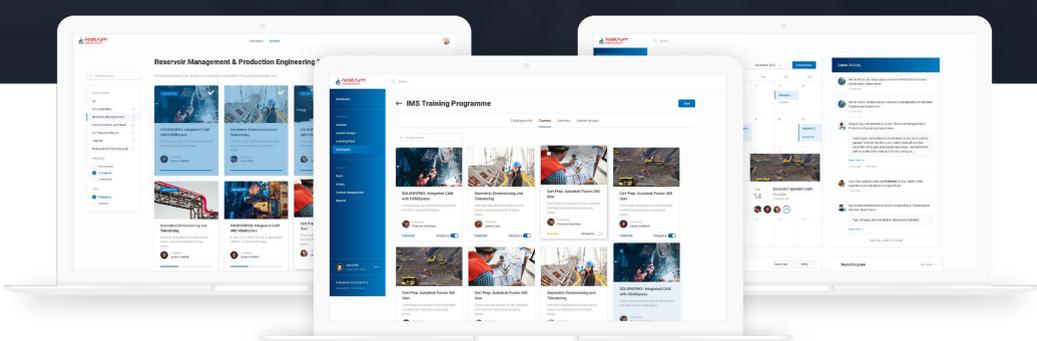
Nostrum Oil & Gas PLC is an independent oil and gas company engaging in the production, development, and exploration of oil and gas in the Pre-Caspian Basin in Kazakhstan, via its fully owned company Zhaikmunai LLP.

**Domain:**  
Education

**Budget:**  
>\$150 000

**Team:**  
12 experts

**Duration:**  
4 months



## Challenge

HRs and Teachers working in the company were experiencing problems in the process of the employees' training. There was a critical need for education process automation, creation of a platform for storing learning materials and giving all the employees with Azure credentials access at any time.

## Task

On the stage of project evaluation, there were defined the following goals that the customer wanted to achieve with a new solution:



Bridge the employee knowledge gap



Provide a safer working environment



Increase employee productivity



Comply with KZ government requirements in the area of personnel education

When deciding on a possible software solution for achieving customer's goals we relied on our Solution Architect. Together with Business Analyst, they analyzed the current working systems of the customer, business needs and how these needs correlate with their goals. Their thorough discussion developed into the following overall task for \*instinctools team:

*"Provide a Learning Management System for creation, storage and reuse of all training materials and courses"*

## Solution

Learning Management System is a software solution that provides staff members with a single point of access to all educational materials. It allows Teachers and the HR Department to create courses, organize and store educational materials, as well as manage the process of learning.

The system provides Learners with remote access to the courses. Unlike the current educational process, the final product generates reports required to comply with the state government.



## Key features

The system complies with corporate Nostrum Oil & Gas PLC design and has the following features:



**User-friendly content creation.** Non-technical users find the UI intuitive. The training can be delegated to the right staff.



**Content interoperability.** All learning materials are reusable and available at any time.



**Intuitive Course Builder.** The course builder allows users to design lectures using text and video materials.



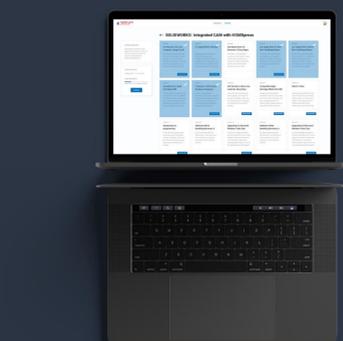
**Peak demand scalability.** There are no problems with simultaneous logins, the system quickly scales to your real-time need.



**Group management.** The system allows admin users to categorize learners by different metrics, such as department, skill level and more.



**Automated enrollment-to-completion process.** Learners can be automatically enrolled in the next course and everyone will be notified once the course has been completed.



## Value

Learning Management System addresses the learning and development requirements of the company for its workforce. A strong focus on the management of knowledge, curriculums, and job roles helps to **improve worker performance** while helping meet training and development initiatives.

## Technologies

**BE:**

- JDK 11
- Maven 3
- Docker
- Docker Compose
- Spring Boot 2.1.3 + Web
- Security
- JPA
- Mail
- Azure Active Directory
- Azure Storage

**FE:**

- ReactJS
- Redux
- Redux-saga
- Sass
- Webpack
- Axios
- Reselect
- Lodash
- Jest

**ARCHITECTURE:**

- React+Redux+Saga

**PM:**

- Agile
- SCRUM