Course code: GOC3410

The course is designed for developers on the Microsoft .Net platform who want to learn how to develop distributed applications using gRPC and Microsoft Visual Studio.

Who the course is for:

- The course is designed for developers on the .Net platform.

Required skills:

- Experience with .NET Framework or .Net Core.
- Experience with development using Visual Studio 2017 and higher.
- Experience with object-oriented programming in C #.

Teaching methods:

- Professional explanation with practical samples and examples.

Teaching materials:

- Powerpoint handouts and module printouts.

Course syllabus:

Getting started with gRPC
- From binary data through CSV, XML and JSON back to binary data
- The basics of using Protocol Buffers
- HTTP / 2
- GRPC Stream
- Implement simple gRPC services using Visual Studio 2019
- Create a Windows client for a simple gRPC service by using Visual Studio 2019

Protocol Buffers
- Protocol Buffers
- Definition of data structure
- Generate classes from proto files

GRPC Stream
- Server-side stream
- Client-side stream
- Two-way stream

Advanced gRPC
- GRPC Interceptors
- Error handling
- Timeout
- Cancel

Security
- Http / 2 security
- Simple token authentication