

Updated 05/17/2024

Sign up

Azure Machine Learning training

3 days (21 hours)

Presentation

Our Azure Machine Learning training course enables participants to master the essential skills needed to work effectively with Microsoft Azure, a cloud computing service.

Our training focuses on the use of the Azure Machine Learning SDK for Python v1.11. This training presents an invaluable opportunity for professionals wishing to exploit the capabilities of machine learning in their products and services, while making informed decisions about their ML architecture and tools.

Azure was announced in October 2008, started under the codename "Project Red Dog", and launched on February 1, 2010 as "Windows Azure" before being renamed "Microsoft Azure" on March 25, 2014.

We'll be presenting the latest version of the software, [Azure Machine Learning SDK for Python v1.16](#).

Objectives

- Get to grips with the Azure Machine Learning Studio interface,
- Choose the right algorithm for the problem, and the best among several equivalent algorithms,
- Exploit an experience through a Web Service.
- Discover the basics of R and Python to enhance the capabilities of Azure Machine Learning

Target audience

- Data scientists, data analysts, developers, architects and managers who want to leverage machine learning in their products, organizations and services, and make informed, cost-effective decisions about their ML architecture and toolset.

Prerequisites

- Basic statistical knowledge (centering, dispersion, correlation, hypothesis testing)
- A knowledge of programming or algorithms may be useful
- An Azure account with Machine Learning capabilities

Azure Machine Learning Training Program

Getting started

- Introduction to machine learning
- Introduction to R
- Introduction to Python
- R Visualization in Power BI
- Practical work: Configuring the Azure Machine Learning

environment Machine learning with R and Power BI

- Understanding business
- Data wrangling for predictive analysis
- Predictive analysis in Power Query with R
- Descriptive analysis in Power Query with R
- Practical work: Data pre-processing and

exploration Machine learning in Azure

- R in the Azure Data lake
- Azure Machine Learning Studio
- Machine learning in Azure Stream Analytics
- Azure Machine Learning (ML) Workbench
- Machine learning on HDInsight
- Data science virtual machine and AI frameworks
- Deep learning tools with cognitive toolkit (CNTK)
- Practical: Deploying models with Azure Machine Learning

Data Science Virtual Machine

- Cognitive services toolkit
- Bot Framework
- Overview of Microsoft Machine Learning Tools

- Practical: Creating a bot with Bot Framework

Companies concerned

This training course is aimed at both individuals and companies, large or small, wishing to train their teams in a new advanced computer technology, or to acquire specific business knowledge or modern methods.

Positioning on entry to training

Positioning at the start of training complies with Qualiopi quality criteria. As soon as registration is finalized, the learner receives a self-assessment questionnaire which enables us to assess his or her estimated level of proficiency in different types of technology, as well as his or her expectations and personal objectives for the training to come, within the limits imposed by the selected format. This questionnaire also enables us to anticipate any connection or security difficulties within the company (intra-company or virtual classroom) which could be problematic for the follow-up and smooth running of the training session.

Teaching methods

Practical course: 60% Practical, 40% Theory. Training material distributed in digital format to all participants.

Organization

The course alternates theoretical input from the trainer, supported by examples, with brainstorming sessions and group work.

Validation

At the end of the session, a multiple-choice questionnaire verifies the correct acquisition of skills.

Sanction

A certificate will be issued to each trainee who completes the course.