# RapidMiner

## Course description

RapidMiner is a data science software platform developed by the company of the same name that provides an integrated environment for data preparation, machine learning, deep learning, text mining, and predictive analytics. It is used for business and commercial applications as well as for research, education, training, rapid prototyping, and application development and supports all steps of the machine learning process including data preparation, results visualization, model validation and optimization

## RapidMiner online training curriculum

### Introduction of RapidMiner
- Understand RapidMiner
- Install RapidMiner
- What is machine learning?

### RapidMiner Studio
- User Interface of RapidMiner Studio
- Operators, Extensions, Repository, Parameters
- Creating and Managing RapidMiner Repositories
- Importing Data in RapidMiner
- Loading Data from multiple sources
- Storing Data, Processes, and Result Sets

### RapidMiner Data Preparation
- Multiple Sources
- Joins & Set Theory
- Understanding New Attributes
- Advanced Extract, Transform and Load
- Aggregation & Multi-Level Aggregations
- Handling Attribute Roles
- Pivot & Un-Pivot of Data
- Calculated Values
- Regular Expressions
- Changing Value Types
- Feature Generation and Feature Engineering

**Visualizing Data in RapidMiner**

**Learn how to visualize results in RapidMiner Studio to help you in finding outliers and get interesting stats with data analytics**

**Working on Data**
- Data Cleansing
- Data Merging
- Data Pivoting

**Machine Learning**
- Creating a 'Decision Tree' Model
- Applying the Model
- Testing a Model
- Validating a Model
- Finding the Right Model
- Optimization of the Model Parameters
- Automated Model Selection and Optimization
- Auto Model - Classification
- Auto Model - Clustering & Outliers

**Predictive Modeling Algorithms**
- K-Nearest Neighbour
- Naïve Bayes
- Decision Trees & Rules
- Support Vector Machines
- Logistic and Linear Regression
- Neural Networks

**Deployment and scaling**
- Collaboration of RapidMiner Studio and Server
- Introduction to RapidMiner Server
- Preparation for RapidMiner Server Installation
- RapidMiner Server Installation
- Introduction to RapidMiner Radoop