



Course title	Introduction to Machine Learning
Institute/Division	Faculty of Computer Science and Telecommunication/ Department of Computer Science
Course code	F-1.ML_1
Erasmus subject code	11.4
Number of contact hours**	45 lecture hours (45h)
Course duration	1 semester (Summer)
ECTS credits	6
Course description (max 100 words)	The main aim of this course is to acquire students' knowledge of essential machine learning (ML) methods. Upon completion, students should be able to implement basic machine learning algorithms and demonstrate an understanding of popular libraries in their chosen programming environment (recommended: Python). The theoretical part focuses on the backgrounds of popular ML algorithms, such as k-NN, SVM, decision trees, etc. In practical work, the students will learn how to implement and use the Scikit-learn, pandas, keras, seaborn, and numpy frameworks.
Literature	O. Theobald: Machine Learning for Absolute Beginners: Scatterplot Press, 2017
Course type/organization	<ul style="list-style-type: none">• Lectures (15h),• Computer labs (15h),• Projects (15h)
Assessment method	Attendance at lectures, practical exercises at labs and passing individual projects
Prerequisites	Good programming skills in Python
Primary target group	Computer science students: 2 nd or 3 rd -year Bachelor's students with good programming skills.
Contact person	Joanna Kołodziej (PhD, DsC, Prof.PK)
Remarks	N/A

*please insert one of the following codes:

- 11.0 Mathematics, Informatics
- 11.1 Mathematics
- 11.2 Statistics
- 11.3 Informatics, Computer Science
- 11.4 Artificial Intelligence
- 11.5 Actuarial Science
- 11.9 Others Mathematics, Informatics

**1 lecture hour=45 minutes