

Course title	<i>Introduction to Machine Learning</i>
Course code	<i>IP 301</i>
Module coordinator	<i>Cordelia Makartsev</i>
Lecturer	<i>Salma Aziz</i>
Level of course	<i>Bachelor</i>
Recommended prerequisites	<i>Basic knowledge of linear algebra and regression</i>
Type of course	<i>Lecture</i>
Weekly lecture hours (SWS)	<i>2</i>
ECTS credits	<i>2 ECTS</i>
Workload	<i>In total 60 h, 30 h course attendance, 30 h self-study</i>
Assessment (grading; pass/fail)	<i>graded</i>
Regular cycle	<i>Each semester</i>
Language of instruction	<i>English</i>
Contents:	<p><i>In this class, you will delve deeper into the fundamental principles of machine learning, acquiring the practical skills essential for effectively implementing these methods to tackle new challenges.</i></p> <p><i>This course provides an overview of machine learning, covering:</i></p> <ul style="list-style-type: none"> <i>• Supervised learning</i> <i>• Unsupervised learning</i> <i>• Best practices in machine learning.</i>
Learning outcome (competencies):	<p><i>After having successfully completed the course, the students should:</i></p> <ul style="list-style-type: none"> <i>• Acquire a deep understanding of the foundational principles of machine learning, including relevant mathematical concepts.</i> <i>• Gain comprehensive insights into a broad spectrum of learning algorithms.</i> <i>• Get the ability to design and evaluate machine learning algorithms within various real-world contexts.</i>
Teaching methods	<input checked="" type="checkbox"/> Lecture <input type="checkbox"/> Group work <input checked="" type="checkbox"/> Exercises <input type="checkbox"/> Simulation <input type="checkbox"/> Video feedback <input type="checkbox"/> Others: Please click here for inserting text
Assessment methods	<i>Written exam</i>
Recommended reading	<i>A. Géron, "Hands-on Machine Learning with Scikit-Learn, Keras & TensorFlow", O'Reilly Media, 2nd Edition, 2019.</i>
Additional information	
Recognition of credits	