**Machine Learning and Artificial Intelligence (5 ECTS)**

(Selected Topics in Artificial Intelligence 1, Zoran Bosnić)

Lecturer: **Blaž Zupan and Janez Demšar**

Course code: 63834E

Course type: lectures, **fall (first) semester**, format 15-20-15 (lectures-seminar-tutorial hours).

This course is an introduction to data science for non-computer scientists. The course covers topics from data preparation, clustering, regression and classification, model evaluation, and embedding of unstructured data.  
  
Restrictions/Prerequisites: No prior knowledge on the topics is assumed. This course will not use computer programming and no prior knowledge on statistics or data science is required.

The course is not intended for computer science students or students whose curricula already included courses on machine learning or data science.

**ChatGPT for Researchers (5 ECTS)**

(Selected Topics in Artificial Intelligence 2, Zoran Bosnić)

Lecturer: **Blaž Zupan**

Course code: 63835F

Course type: lectures, **fall (first) semester**, format 15-20-15 (lectures-seminar-tutorial hours).

This course is an introduction to ChatGPT and similar large language models. It will cover an introduction with intuitive explanation of what are large language models. We will continue with use cases of ChatGPT’s web-based interface, focusing on how it can assist researchers in various tasks, including providing instant access to a vast range of information, facilitating brainstorming, generating ideas, and summarizing complex concepts. It can also assist in reviewing and editing research documents, proposing research questions, and helping researchers understand complex methodologies and techniques in various disciplines. We will discuss the deficiencies of the technology, including the provision of inaccurate or outdated information and lack of understanding or context awareness, reflecting limitations in its training data and the absence of real-world experience or subjective perception. The course will showcase the use of ChatGPT’sapplication programming interface (API) and its advanced uses, including AutoGPT.

Restrictions/Prerequisites: No prior knowledge on the topics of large language models or computer programming is assumed. This is an introductory course intended for general audience. Students from humanities, social sciences, natural sciences, and engineering are welcome.

The course is not intended for computer science students or students whose curricula already included courses on machine learning or data science.