MA PJN

Fakultety 2021/22 semestr zimowy

dr hab. Anna Bączkowska, prof. UG

DATA VISUALIZATION METHODS AND TOOLS

The aim of the course is to familiarize students with exploratory data visualization methods and tools mapped onto both textual and numerical data. The analyses will comprise data that were originally numerical or textual features converted into numerical values, retrieved from corpus-based NLP tools. Several information visualization software programs will be used, for example MS Excel, Lancsbox, Datawrapper, Chart Studio/Plotly, Tableau, MS Power BI , R (with ggplot2), etc. in order to demonstrate how to efficiently present graphical information in accessible way. By the end of the course the students will know the typology of data, will understand select statistical concepts and tests, they will know how to sample, aggregate data and add granularity, remove noise from data and highlight important information, as well as how to prepare graphs, bar and area charts, tables, bubble and scatter plots based on numerical and textual data (language corpora), and how to make interactive, dynamic and zoomable visualization of uni-, bi- and multivariate, temporal and geo-spatial data. The students will be able to generate powerful and high impact reports showing trends, predictions and data patterns which drive engagement.

dr Marcin Fortuna

WEB DEVELOPMENT FOR NLP

The aim of the course is to familiarize students with the basics of website creation and web application development, especially from the perspective relevant for Natural Language Processing. The core technologies taught in the course are HTML (the markup language which forms the basis of every website), CSS (a useful language which helps you style your website), and JavaScript (a real programming language which not only helps you make your website interactive, but also has many other uses). Furthermore, participants will be expected to set up GitHub accounts and to use version control with Git. Participants will be divided into several groups, each of which will be working on a web application.