Natural Language Processing

Week 5: Introduction to course

Shayan Dadman - Phd Candidate, UiT Narvik
Room: D3430
Email: Shayan.dadman@uit.no

Andreas Dyrøy Jansson - Phd Candidate, UiT Narvik
Room: C3190
Email: Andreas.d.jansson@uit.no

Department of Computer Science and Computational Engineering

Objectives of the course

- The main objective of the course is to get familiarized with Natural Language Processing (NLP) and why it is important

- Particularly, you will learn:
    - What is natural language
    - What are the NLP tasks and challenges
    - What are the NLP tools and approaches
    - What are the applications of NLP

Topics in week5

- Introduction to Natural Language Processing
- NLP tasks and challenges
  - Speech recognition
  - Sentiment analysis
  - Natural language generation
  - etc.
- NLP tools and approaches
  - Natural Language Toolkit (NLTK)
  - Statistical NLP
- NLP applications
- Text preprocessing in NLP

References

- Foundations of Statistical Natural Language Processing, Christopher D. Manning and Hinrich Schütze

- Mathematical Linguistics (Advanced Information and Knowledge Processing) 1st ed. 2008 Edition, Andras Kornal

- Natural Language Processing with Python: Analyzing Text with the Natural Language Toolkit, by Steven Bird, Ewan Klein and Edward Loper (https://www.nltk.org/book/)