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Modern Natural Language Processing for Software Engineers - Part 1

Tuesday 6 May 2025 16:30 (1 hour)

This lecture series will offers you a comprehensive yet accessible journey through the history and state-of-the-art techniques in NLP. We'll explore a few essential concepts, practical applications, and emerging trends without drowning in the complex mathematics needed to unravel these tools.

The first lecture will cover the theoretical basis needed to grasp the nomenclature of NLP, ending with the most recent developments that have taken the industry by storm due to their performance - transformer models.

The second lecture will focus more on the practical aspects of applying generative AI and NLP techniques to real problems, from an engineering point of view. Rather than focusing on the research, we'll focus on what can be achieved by you as developers. We'll be live-coding a few examples using open source software in order to showcase the power and usefulness of these approaches. By the end, you should know what the trade-offs and limitations are behind all the "magic" of large language models, and what this means to you as a software engineer.

All code implementations will be in Python, but we will also briefly cover what the enterprise world is doing (e.g. in Java).

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