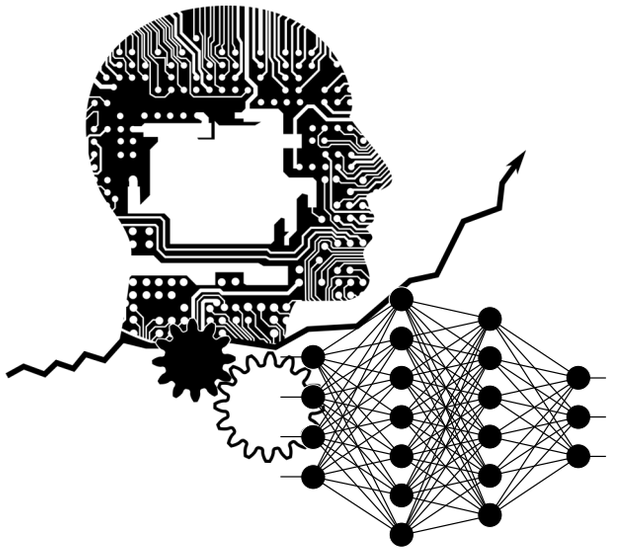
Deep learning approaches for automated drivetrain design of battery electric vehicles

Semester Thesis / Research Internship / Master's Thesis

Motivation:

At the Institute of Machine Elements we do research on drive systems and components. Therefore, we are interested in technologies in drive system development and are about to integrate latest artificial intelligence methods in the process of development and design.



Your task:

The goal of this project is to develop and implement deep learning approaches (RL, SL) that help automating the design of drivetrains of battery electric vehicles. As part of your work you will help planning different learning strategies, from system to component level. Subsequently, you will implement chosen strategies and evaluate them in the context of automated design.

Your profile:

- Highly interested in AI-methods, advanced knowledge in supervised and reinforcement learning methods
- Advanced coding skills
- Strong math skills and knowledge of graph theory
- Highly motivated and responsible
- Fluent in English or German

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