

Master's Thesis (m/f/d): Development of an Automated Fact-Checking Service with ML & NLP for COVID-19-related claims.

Background

The COVID-19 pandemic has made it clear that fighting misinformation on the internet needs to be a top priority for modern societies. While this can be done by manual work, it is ideally done by accurate algorithms that can extract the claims and verify them against a common trusted knowledge base. The VERITAS project, which is a collaboration between *Fraunhofer FOKUS*, *Ubermetrics* and *Trustami*, aims to develop a multi-layered trust-scoring and fact-checking system with a pilot case focused on COVID-related information. This Master's Thesis is part of the VERITAS project.

Potential Scope for the Thesis

- Create a **literature analysis** on the different methods and processes of automated fact-checking using machine learning and natural language processing (NLP)
- Develop a **knowledge corpus** of textual and numerical (such as csv tables) documents.
- Develop a way to **score and find relevant documents** depending on the claim/query.
- Develop a **prototype of a claim-verification system** using a knowledge corpus and test it against some hand-crafted example cases (preferably in Python).
- The thesis can be written in **English or German**.

Your profile

- You are a master's student in an IT-related field
- You have a good background in statistics, data science or quantitative methods
- You have some experience in Software Development (Python is a plus)
- You have some first practical experience with machine learning (NLP is a plus)
- You are data-driven, self-motivated and curious about learning new things

Your benefits

- A great office in the heart of Berlin (incl. goodies such as a kitchen to cook lunch and free Mate)
- Work from wherever you want
- Possibly employed as working student
- Work with a modern tech stack in a young and diverse Team
- Long term opportunities in a growing business

About Trustami

Trustami is a technology startup in the heart of Berlin. We offer online vendors to leverage their existing reputation and reviews and thus help to create trust in e-commerce. The company was founded by TU-Berlin graduates and post-docs and still employs some research products focused on using machine learning to create safer environments on the web. An example research project in cooperation with TUB is SOFIE, which aims to detect fake online reviews.