

Praktikum position in ML/AI tool development

Location:	EpiQMAx GmbH, Planegg (near Munich) Germany.
Staff category:	Student member
Duration:	6 months (max)
Closing date:	15th May 2021
Reference number:	IP0121

Proteomics, the field that studies the total set of proteins expressed in cells, tissues, liquid biopsies and other biological samples, is carried out with high-throughput technologies and methods based on **liquid chromatography** (LC) and **mass spectrometry** (MS). MS proteomics provides ways of identifying and quantifying the proteins present in a biological sample. These days, many proteomic workflows focus on the identification and/or quantitation of a set of proteins.

At EpiQMAx, we offer a service to pharmaceutical companies and research institutes, based on mass spectrometry, for the measurement of **epigenetic modifications on histones and post-translational modifications (PTMs)** on other proteins. An important challenge in our domain is the discovery and identification of markers associated with disease or a biological condition.

Your role

As a ML/AI intern within EpiQMAx, you will learn to use classical ML and CNN models for the prediction of disease or biological conditions MS matrix-like files and images. Your responsibilities will include:

- Curating and labeling of data
- Reviewing literature in a regular basis
- Writing small scripts and reviewing code
- Reporting your work weekly

What you will learn

- Processing of raw mass spectrometry (MS) proteomic data
- Validation of extracted MS peaks
- Acquiring practical knowledge in the development of ML/AI tools
- Acquiring biological knowledge (and vocabulary) from the proteomics/epigenetic field

Candidate requirements

- **Bachelor/Master degree student** in either computer science or statistics/data-analysis or bioinformatics.
- Intermediate to good theoretical knowledge of ML/AI models and algorithms.
- Interest (or beginner experience) in image classification
- Intermediate to advance command of R and Python scripting

Why join us

Located at the IZB Munich (Innovation and Start-up Center Biotechnology) in Planegg-Martinsried, EpiQMAx offers the right environment to transition or start your career in industry. Our startup environment encourages personal and professional development. We are committed to ensuring our employees feel valued and supported to reach their potential at work.

To apply, please submit a covering letter and your CV to info@epiqmax.de