TRON

BIOINFORMATICS SCIENTIST BIOMARKER DISCOVERY (m/f/d)

Full time - Mainz

We are looking for support in our **Systems Immunology & Medicine** unit to start as soon as possible. In the Systems Immunology & Medicine unit, we collaborate within multi-disciplinary research teams to advance the analysis, selection and application of biomarkers and therapeutic for innovative immunotherapies against cancer and other diseases.

As a Bioinformatics Scientist specializing in biomarker discovery, you will play a crucial role in analysing data generated from NGS-assisted Phage display and Luminex multiplex assays to identify novel biomarkers for disease detection, prognosis, and therapeutic response in collaboration with our Serodiscovery team. You will work in cross-functional teams, including biologists, clinicians, and data scientists, to discover, validate, and translate biomarkers into clinical applications.

Your tasks and responsibilities:

- Collaboration in multidisciplinary project teams with academic and industrial partners to identify novel biomarkers and therapeutic targets, guide biomarker discovery and develop experimental strategies
- Development and application of reproducible bioinformatics pipelines to analyze complex biological data from different platforms (e.g. NGS-assisted phage display and Luminex multiplex assays)
- Development and application of bioinformatics algorithms for the prediction, validation and stratification of biomarkers and testing their performance
- Application of advanced statistical and machine learning methods for the identification and validation of biomarker candidates
- Interpretation, communication and discussion of results in the form of detailed reports, presentations and scientific publications to ensure results are accessible to both technical and non-technical team members and collaborators

What you bring:

- A Ph.D. degree in a relevant scientific discipline (e.g. Bioinformatics, Computer Science, Computational Biology, Biostatistics, Immunology)
- Proven relevant experience with a strong focus on biomarker discovery and omics data analysis
- Demonstrated scientific expertise in analysing large scale NGS datasets
- Strong programming skills, particularly in Python and R, with experience in statistical analysis, machine learning and/or deep learning and data visualisation

- A hands-on expertise with version control systems (e.g. git, GitLab, Github), workflow managers (e.g. Snakemake, Nextflow), and job schedulers on linux-based high performance computing infrastructure (e.g. slurm) will be an advantage
- Experience with Phage display and Luminex multiplex assays will be an advantage
- Knowledge in immunology and structural biology will be preferred
- Flexibility to adapt to changing projects and organizational priorities
- Strong communication skills in English

Enthusiasm and curiosity for the diverse activities of our research institute as well as the ability to work in a team completes your profile.

We offer:

- A dynamic, innovative and creative research environment
- An open, collegial and cordial working atmosphere in a respectful corporate culture
- A high degree of diversity in the workforce
- Flat hierarchies
- Performance-related remuneration and other benefits
- The opportunity for personalised further training
- Good transport connections by public transport and car as well as bicycle parking spaces
- The opportunity for hybrid working

TRON is an internationally recognised institute for application-oriented research. We combine the strengths of academic research with the requirements of quality-controlled industrial developments. At TRON, we share a common mission to develop innovative solutions for the immunotherapeutic treatment of cancer, infectious diseases and other serious diseases with high medicinal need for development.

TRON was founded in Mainz in 2010 and works in close cooperation with universities and hospitals as well as with regional, national and international research institutions and pharmaceutical companies. As part of our team, you will have the opportunity to work at the cutting edge of translational science.

If all this appeals to you, we look forward to getting to know you.

Please send us your complete and informative application documents (cover letter, CV, references) in a single document of max. 5 MB by e-mail to Human Resources at **jobs (at) tron-mainz.de**, Job-ID: *43103-25-01-WAPRO*.

For more information, visit our homepage at www.tron-mainz.de