Post-Doctoral Research Fellow

Department: Pathology & Genomic Medicine

Lab of Dr. Tykocinski

REQ-0013093

PRIMARY FUNCTION

The laboratory of Dr. Mark Tykocinski, former dean of the Sidney Kimmel Medical College of Thomas Jefferson University and recipient of the 2026 FASEB ASIP Gold-Headed Cane Award, is seeking a motivated and talented scientist to join our research team. Our laboratory focuses on the development of novel, dual-targeting fusion protein therapeutics designed to selectively activate or suppress innate and adaptive immune responses. These engineered fusion proteins, targeted to cancer and immune-related diseases, are being advanced via a direct translational pathway into clinical trials, and benefit, in part, from an active partnership with a clinical-stage biotech startup.

The successful candidate will leverage training in immunology, structural biology, and molecular biology to design, execute, and analyze experiments that support ongoing and emerging research projects within the lab. Candidates with expertise in immunology and/or protein engineering and prior experience with murine tumor models are strongly preferred.

ESSENTIAL FUNCTIONS

- Independently formulate hypotheses and design experiments aligned with lab objectives.
- Execute and oversee complex experimental protocols in molecular and cellular biology, protein biochemistry, and immunological assays.
- Perform mammalian cell culture using sterile technique, including maintenance and manipulation of immune and tumor cell lines.
- Conduct and interpret in vivo experiments using murine models, including tumor engraftment, treatment response monitoring, and tissue collection.
- Collect, organize, and analyze experimental data using appropriate statistical and analytical tools.
- Present findings in the form of oral presentations and written reports for internal lab meetings, grant submissions, and external conferences.
- Draft scientific manuscripts, abstracts, and grant proposals in collaboration with the lab team.
- Maintain detailed and accurate electronic records of experimental procedures, data, and protocols.
- Stay current with the scientific literature and integrate relevant findings into experimental design.
- Collaborate with lab members and external partners to advance project goals and support translational efforts.

EDUCATIONAL/TRAINING REQUIREMENTS:

Ph.D., in structural biology and molecular biology

EXPERIENCE REQUIREMENTS:

Previous experience in an academic lab setting preferred.

You can apply to the job by going to our Careers page at;

 $\underline{https://jeffersonhealth.wd5.myworkdayjobs.com/en-US/ThomasJeffersonExternal}$

Then search REQ-0013093