

### SAHLGRENSKA ACADEMY INSTITUTE OF BIOMEDICINE

Diarienr: GU 2024/3515

# Institute of biomedicine

2024-12-11

# **Announcement of scholarship – postdoctoral fellow**

A postdoctoral scholarship is available to study radiation induced DNA-damage and repair in induced pluripotent stem cells (iPSCs) and iPSC derived differentiated cells. The position is in the Johansson group at the department of Laboratory Medicine, Institute of Biomedicine at the University of Gothenburg, Sweden.

**Project Title**: Identification of biomarkers of hematological toxicity in response to radiation and chemotherapy.

Project duration and dates: 2025-02-01-2027-01-30

Application deadline: 2025-01-15

Supervisor: Pegah Johansson,

Contact: pegah.johansson@gu.se

#### **Project summary:**

The project aims to investigate the differences in treatment-induced DNA-damage response in hematopoietic cells, using differentiated iPSCs as a model. The aim is to discover biomarkers of hematological toxicity. Mass spectrometry of phosphorylated proteins as well as multi-parameter flow cytometry will be used to detect phosphorylation profiles, while molecular biology techniques such as immuno-blotting and microscopy will be used to validate the data. This project is run in parallel to clinical studies of patient sensitivity to radiation and chemotherapy.

#### Qualifications

We are looking for a candidate who has recently obtained a PhD in molecular and cell biology. The doctoral thesis should be in a relevant area. The applicant should have documented experience in cell culture, preferably stem cells or iPSCs. Further, documented experience in common molecular biology techniques for DNA, RNA and protein analyses (such as PCR, Q-PCR, cloning, and transfection, immunoblotting, fluorescence microscopy) is required. Experience in mass spectrometry-sample preparation, and flow cytometry is an advantage. Knowledge of DNA-damage repair and radiation biology is also a merit. The candidate is expected to contribute to the design as well as execution of the experimental work. The suitable candidate will be able to work independently and in collaboration with others. Fluency in spoken and written English is essential.

## Applications should be emailed to: pegah.johansson@gu.se

#### The application should include:

- A motivation letter describing your relevant research experience and why you are applying for this position
- CV- include your publication list and two references
- A copy of the official PhD certificate
- Please refrain from sending copies of your articles or the thesis, and only provide the information requested above.