



The Center for Regenerative Therapies Dresden (CRTD) is a research center at the TU Dresden with currently over 20 research groups and more than 250 employees. Research at the CRTD focuses on regenerative and stem cell research ranging from basic research to application in a clinical-translational context. With a network of more than 85 research groups, scientists at the CRTD are working in the fields of hematology/immunology, diabetes, neurodegenerative diseases and bone and tissue regeneration.

The Rodríguez -Muela's team is a European Research Council (ERC) funded lab part of the Center for Regenerative Therapies (CRTD) at the TU Dresden, focused on neurodegeneration and stem cell research (<https://tu-dresden.de/cmcb/crtd/forschungsgruppen/crtd-forschungsgruppen/rodriguez-muela>). In addition, the Rodríguez -Muela's lab is part of German Center for Neurodegenerative Diseases (DZNE-Dresden), a research institute focused on fundamental neuroscience with a translational outlook (www.dzne.de) and is affiliated to the Max Planck Institute of Molecular Cell Biology and Genetics (MPI-CBG), pioneering basic research on cell biology, stem cells and organoids (www.mpi-cbg.de). These three multidisciplinary and international research institutes offer an outstanding research environment and all types of cutting-edge technology platforms and are located only a couple of minutes walking distance from each other.

At the Rodríguez -Muela's lab, we aim to understand the molecular principles that govern the selective neuronal vulnerability characteristic of all neurodegenerative diseases. We specifically focus on the motor neuron diseases SMA and ALS and in Alzheimer's disease and use as main model system human iPSC-derived 2D and 3D models. For this interdisciplinary project, the recruited postdoc will study SMA and ALS from a development angle and investigate whether these diseases have a neurodevelopmental component that triggers the onset in the postnatal/adult life and which are the underlying mechanistic events.

Starting in June 2024, we are looking for a:

Postdoctoral position to study the developmental basis of neurodegeneration (m/f/x)

This competitive position is **available for three years**, although successful candidates are expected to apply for postdoctoral fellowships. The position is funded through the German Research Foundation (DFG).

We are searching for an outstanding researcher with a genuine enthusiasm for our research topics and strong background in neuroscience, developmental neurobiology and genetics.

Your profile:

- PhD degree in biology, biomedicine or related subject
- High quality first-author publication/s in a relevant field
- Human iPSC work, organoid technology, strong cellular and biochemistry techniques (experience in cloning and genome editing are a plus)
- Experience on single cell RNAseq analysis (basic computational knowledge on ATACseq and epigenetics are a plus)
- Strong English communication, organization and interpersonal skills
- Most importantly, lots of curiosity, motivation, creativity and enthusiasm!

We offer you:

- The opportunity to implement your own ideas and lead an exciting, clinically relevant, research project working in a young, friendly and innovative team of highly motivated scientists
- Outstanding research environment in biomedicine, neuroscience and stem cell biology that promotes an interdisciplinary and international exchange and offers numerous possibilities for your professional and personal development.
- Access to cutting-edge scientific infrastructure and collaborations with clinical teams

To apply, please submit a single PDF with your CV, a statement of research interests and what you would bring to the position, and contact details for at least two references via the links below.

Closing date: 31 March 2024

Informal enquiries to discuss the positions are very welcome (natalia.rodriquez_muela@mailbox.tu-dresden.de).