

Research Fellow in cancer biology/metabolism

A grant for a 1-year (renewable) position is available for a Research Fellow in the team of dr. Dario Longo at the Institute of Biostructures and Bioimaging (IBB, Torino, Italy), National Research Council of Italy (CNR) starting on September 2019.

About the lab:

The Longo lab (www.cim.unito.it/website/PI/Longo/home.html) is interested in understanding the role of tumor acidosis and of its heterogeneity in tumor progression, invasion and drug resistance. A major focus of the lab is the *in vivo* characterization of tumor microenvironment, including acidosis, vascularization and hypoxia and in assessing therapeutic response to inhibitors of cancer metabolism in preclinical tumor murine models throughout non-invasive MRI imaging approaches.

Environment:

The IBB-CNR carries out translational research for the development of new tools for prevention, diagnosis and targeted therapies. The IBB unit in Torino is hosted at the Molecular Biotechnology Center, an institute that encompasses more than 150 members (PI, senior researchers, post-doctoral scientists) with expertise in medical genomics, cancer, neuroscience, immunity and cardiovascular sciences. This center offers an extraordinary range of services and instrumentations, covering biology, biotechnology, medicine and imaging as well as animal facility.

The position will work in a stimulating interdisciplinary environment in close collaboration with the Molecular Imaging Center, an interdisciplinary research center dedicated to develop imaging-based approaches for understanding the fundamental biology underlying diseases and for improving diagnosis and monitoring treatment effects in several diseases (cancer, inflammation, diabetes and cardiovascular diseases).

Position Highlight:

Dr. Dario Longo is recruiting a highly motivated research fellow interested in conducting interdisciplinary research using *in-cellulo* and *in-vivo* approaches to investigate the relationship between tumor metabolism and acidosis. Potential research activities will include the investigation in several tumor murine models of the key-role of tumor acidosis in tumor progression throughout non-invasive MRI-based approaches and their correlation with biological/biochemical factors. Additional activities will include the investigation of tumor acidosis in promoting drug resistance to tumor metabolism inhibitors. The fellow will work within a multidisciplinary team of biotechnologists, biologists, chemists and biomedical engineers.

Candidate requirements:

- MSc/PhD degree in Biology, Biotechnology, Molecular Medicine or related disciplines earned within the last four years
- Extensive experience in cancer biology and cancer metabolism, especially molecular and cellular biochemical assays, immunohistochemistry and immunofluorescence techniques in murine tumors
- Working experience with mice is desirable.
- Experienced with *in vivo* imaging is considered a plus

- Demonstrated record of relevant experience as evidenced by training and publications
- Highly motivated person with strong interest in research and willingness to participate in several ongoing research projects related to tumor pH imaging
- Excellent communication skills in English are required

The successful applicant will initially have a 1-year contract, with the possibility of extension. The offered salary will depend on the relevant experience in this field and seniority.

Interested candidates should send a single PDF file that includes a full curriculum vitae (including photograph and date of birth) with publications, a short description of previous training and work experiences and the names and contact details of at least one referee (former professor/advisor/mentor) to Dr. Dario Longo via email to: dario.longo@unito.it.

Please indicate “Research Fellow in cancer biology/metabolism” in the subject line.