



Job offer: postdoctoral Fellow

Project Title: Post-translational modifications of the LUBAC

Research Fields: Signal transduction, Ubiquitin, NF-kB, cancer, cell death

Work Place: Nantes (Brittany, France)

Research Laboratory: CRCINA, INSERM U1232/CNRS ERL 6001 (www.crcina.org)

Team "Signaling in Oncogenesis, Angiogenesis and Permeability"

(http://nbidere.wix.com/soap)

UBL Research Department: Biology and Health

Head(s) of the Scientific Project: Nicolas Bidère

Offer type: postdoctoral researcher (short term contract, 12 months, possibly once

renewable)

Hiring Institution: University of Nantes

Application deadline: 15/11/2017

Job Starting Date: 02/01/2018

Environment

The project will be carried out at the Immunology and Cancer Research Center Nantes-Angers (INSERM U1232/CNRS ERL6001/Université de Nantes, Nantes, head: M. Grégoire). This institute comprises > 300 people, who study different facets of basic science and cancer. We take full advantage of the on-site core facilities (Federative Research Structure François Bonamy), which include an animal house, confocal microscopy, flow cytometry, and functional exploration for small animals.

The "Signaling in Oncogenesis, Angiogenesis and Permeability" (SOAP, head: J. Gavard) team is interested in deciphering how tumor cells pirate basic signaling pathways to sustain their survival and unlimited proliferation, as well as the way in which they interact within their environment. Fundamental signaling mechanisms are explored with a specific emphasis on tumor cell survival and defects of the tumor vascular network.

Mission (scientific project)

The post-doctoral fellow will investigate how post-translational modifications of the linear ubiquitin assembly complex (LUBAC) regulate its functions in physiological and physiopathological conditions. The proposed project combines high throughput unbiased screens (proteomic, genomic and chemical) with classical biochemistry and cell biology, as well as integrated models (mouse models and clinical data).





Required Profile

Doctor (PhD) in Biology, maximum 3 years of experience after thesis defense¹. An international experience in research is required (during or after Doctorate). Candidates must not have supported their thesis in the hiring institution and not previously worked in the host research unit.

The candidate should have a solid background in Cell Biology, Biochemistry and Molecular Biology.

Usefull References

- Douanne T, Gavard J, Bidère N. The paracaspase MALT1 cleaves the LUBAC subunit HOIL1 during antigen receptor signaling. *J Cell Sci 2016*. 129(9): 1775-1780.
- Dubois SM, Alexia C, Wu Y, Leclair HM, Leveau C, Schol E, Fest T, Tarte K, Chen ZJ, Gavard J, Bidere N. A catalytic-independent role for the LUBAC in NF-κB activation upon antigen receptor engagement and in lymphoma cells. *Blood*. 2014. Apr 3;123(14):2199-203.
- Alexia C, Poalas K, Carvalho G, Zemirli N, Dwyer J, Dubois SM, Hatchi EM, Cordeiro N, Smith SS, Castanier C, Le Guelte A, Wan L, Kang Y, Vazquez A, Gavard J, Arnoult D, Bidere N. The endoplasmic reticulum acts as a platform for ubiquitylated components of NF-κB signaling. *Science Signaling*. 2013 Sep 3;6(291):ra79.
- Carvalho G, Le Guelte A, Demian C, Vazquez A, Gavard J, Bidère N. Interplay between BCL10, MALT1 and $I\kappa B\alpha$ during T-cell-receptor-mediated NF- κB activation. *J Cell Sci.* 2010 Jul 15;123(Pt 14):2375-80.
- Bidère N*, Ngo VN*, Lee J, Collins C, Zheng L, Wan F, Davis RE, Lenz G, Anderson DE, Arnoult D, Vazquez A, Sakai K, Zhang J, Meng Z, Veenstra TD, Staudt LM, Lenardo MJ. Casein kinase 1alpha governs antigen-receptor-induced NF-κB activation and human lymphoma cell survival. *Nature*. 2009 Mar 5;458(7234):92-6. (* equal contribution).
- More information here: http://nbidere.wix.com/soap

How to apply?

Please send the following documents by email to: Nicolas Bidère (<u>nicolas.bidere@inserm.fr</u>), with a copy to <u>recherche@u-bretagneloire.fr</u>:

- Short Curriculum Vitae and a covering letter showing your interest and especially addressing your professional project
- A list of your major works (2 pages max.): scientific publications, patents and others scientific productions
- Letters of recommendation (not required)
- A copy of your PhD diploma²

¹ The thesis defense must have taken place after 31/08/2014, except in rare exceptions. Periods of sickness, maternity or parental leave shall not be counted in this 3 years period.

² For doctors graduated from a French establishment, a link to the thesis notice in the <u>SUDOC Catalogue</u> or the French official portal <u>Theses.fr</u> is sufficient.





The general selection process is described here:

https://u-bretagneloire.fr/dossiers/postdoc/candidatures

Further information

Annual Gross Salary: to be determined.

This Fellowship is cofunded by Université Bretagne Loire and the CRCINA

The Université Bretagne Loire federates 7 universities, 15 "grandes écoles" and 5 research organisations in the West of France (Bretagne and Pays de la Loire). This community of universities and institutions aims to develop the scientific and academic potential of this territory at national and international level.