Postdoctoral Position in Computational Biophysics

A postdoctoral position is available in the laboratory of Stephan Kellenberger at the Department of Pharmacology and Toxicology (DPT) of the University of Lausanne. This laboratory works experimentally with a class of ion channels, the acid-sensing ion channels (ASICs), with the aim of understanding their molecular mechanisms of function. ASICs are neuronal ion channels involved in pain sensation, the expression of fear, and neurodegeneration after ischemia (for review see Kellenberger and Schild, Pharmacol Rev 67: 1-35, 2015). Crystal structures of some of the ASIC conformations are available. The postdoctoral fellow will carry out molecular dynamics simulations and apply other computational approaches in order to guide the experimental work and to interpret its findings.

Your profile
We are looking for a talented and motivated postdoctoral researcher. Applicants should hold a doctorate in computational biophysics or a related domain and have extensive experience with molecular dynamics simulations applied to the understanding of protein structure-function relationship. Ideally the candidate should have worked on ion channels or other complex membrane proteins. You will work with a team of experimental researchers, and you are expected to work independently and to be able to develop computational strategies in order to provide answers for questions arising from experimental observations as well as to guide future experimental work.

What we offer
We are a small, motivated team investigating ion channel function. We will provide you experimental results that you can use as a basis for your approaches, and we look forward to a close mutual interaction that will advance our understanding of the molecular mechanisms of ASIC function. The position is for 2-3 years, with an initial, renewable contract of 1 year. The DPT, with 10 research teams, offers a stimulating and competitive research environment in modern biology with multidisciplinary expertise (www.unil.ch/dpt). Lausanne, with its university and the EPFL is a center of life science research.

Beginning: Fall 2017

Applications, preferentially by e-mail, are invited in the form of a motivation letter, a curriculum vitae, a brief description of research experience and doctoral thesis, and the names and addresses of three academic references, before July 22.

Contact address for inquiries and for submission of applications: Dr. Stephan Kellenberger PD-MER, Département de Pharmacologie et de Toxicologie, Université de Lausanne, Rue du Bugnon 27, CH-1011 Lausanne, tel. ++4121 692 5422, Stephan.Kellenberger@unil.ch, www.unil.ch/dpt/home/menuinst/recherche/groupe-kellenberger.html

For further information, please consult the following publications that illustrate our approaches:
Roy S et al. (2013) FASEB J 27: 5034-45