Two one year post-doctoral positions at Université de Franche-Comté (France) starting October 2014

- Institution: Université de Franche-Comté (France).

- Department: Laboratoire de Mathématiques de Besançon (http://lmb.univ-fcomte.fr/)

- Contacts:

    - Louis Jeanjean (Profile 1): louis.jeanjean@univ-fcomte.fr
    - Alexei Lozinski (Profile 2): alexei.lozinski@univ-fcomte.fr
    - Farid Ammar Khodja (Profile 3): farid.ammar-khodja@univ-fcomte.fr

- Employer Type(s): Academic

- Position Type(s): Post-Doctorate

- Subject Area(s): Mathematics

- Geographic Location: Besançon (France).

- Position Description: 12 months Post-doctoral position.

- Salary: about 27 000 Euros net per year.

Please read carefully the text below

It contains answers to most questions you may have on the subjects to be covered by the candidate.

Applicants should be working in one of the following areas:

1. <u>Profile 1:</u> **Variational and topological methods in elliptic PDE, stability of standing waves.**

    The applicant should work in (at least one of) the following areas : Variational methods in elliptic PDE, concentration for singular problems, Liouville type results, orbital stability of standing waves.

    For further informations about the scientific profile, please contact louis.jeanjean@univ-fcomte.fr

2. <u>Profile 2:</u> **Scientific Computing/Numerical Analysis.**

   We are looking for a postdoctoral fellow who will participate in the ongoing work on the development of multi-scale finite element methods applied to the flow simulations in a complex geometry (in the presence of numerous obstacles). The main challenge will consist in extending the methods, which are already developed in the linear case (Stokes equations) to the non-linear one (Navier-Stokes equations) using the reduced basis techniques. The candidates with research interests intersecting with those of the Scientific Computing/Numerical Analysis group in Besançon (`https://lmb.univ-fcomte.fr/spip.php?page=rubrique&id_rubrique=8`) are welcome to apply as well.

   For further informations about the scientific profile, please contact alexei.lozinski@univ-fcomte.fr

3. <u>Profile 3:</u> **Control theory for systems governed by PDE.**

   The applicant should work in (at least one of) the following areas : Controllability of linear and nonlinear parabolic and hyperbolic systems.

   For further informations about the scientific profile, please contact farid.ammar-khodja@univ-fcomte.fr

Applicants are expected to have graduated with a Ph.D. or equivalent doctoral program by the end of August 2014.

Applicants who have graduated before September 2008 are not eligible.

Your application should contain:

1. a vitae containing basic data including your birthday, your nationality, and present country of residence.

2. a list of publications together with the links to the publications.

3. a short description of your past research.

4. a short research project.

Your application should be sent by e-mail with "postdocPDENA" in the subject line to the address: pdena2015@univ-fcomte.fr

Your application should be received at the latest on June 30th 2014. Applicants will be informed of the final decision by July 10th 2014.