RECRUITMENT JOB AT AIX MARSEILLE UNIVERSITY (France)

JOB TITLE: ENGINEER / PROGRAMMER IN SCIENTIFIC COMPUTING AND MATHEMATICAL MODEELING

JOB TYPE : Fixed term contract [CDD] : two years, with possible renewal

SALARY: Depending on diploma and experience (Net annual salary between 21168€-24372€)

DEADLINE FOR APPLICATION: Feb 28th, 2015

LOCATION

LABORATORY : Laboratoire d'Excellence (Labex) OT-Med « Objectif Terre - Bassin Méditerranéen ».

CITY : France, Aix en Provence ; Europôle Méditerranéen de l'Arbois

Context

The project OT-Med is a « labex » funded by the French national programme « Investissement d'Avenir » for the period 2012-2019. OT-Med has the objective to study the impacts of environmental change (climate, land use etc) on ecosystem resources and services, as well as on human society in the Mediterranean Basin. One of its major crosscutting activities is the development of an integrated model where the impact on land and ocean compartments are coupled together, as well as to the outputs of climate models. The engineer will be major resource person of this activity.

Duties and tasks

OT-Med researches demand a huge number of modelling activities, and the models of OT-Med cover various domain of science, including climate models, terrestrial and marine ecology models and social economic models. The main duties of the engineer will be the assistance of all modelling activities in researches, the maintaining of existing models, and the development of new modules and their coupling in the frame of a common platform.

The main tasks will be:

- to help scientists to further develop the code of their models,
- to ensure the availability of the computing environment and to maintain the developed software,

- to do pre- and post-processing for models, e.g. writing scripts for data formatting and data analysing,
- code optimisation (serial/parallel),
- to train scientists in the use of the models and software developed in this environment,
- to assist with a scientific monitoring of the evolution of concepts and methods in the domains where intensive computing is used.

Main skills needed

- Programming experience in modelling languages, e.g. C, or FORTRAN 90-95, experience of large computer codes will be preferred,
- Familiarity with UNIX-like operating system, experience of using clusters or super computers will be a plus,
- Experience in scientific programming languages, such as R, Matlab, and R will be strongly preferred,
- Good knowledge of the techniques of programme optimisation and parallel computing,
- General knowledge of mathematics, modelling techniques and algorithm development,
- Good knowledge of spoken and written English,
- Experience in environmental sciences is an advantage,
- To be autonomous and to appreciate the team work,
- To be able to develop personal and collaborative projects.

<u>Measures of effectiveness</u>

- report to Director of the project OT-Med

<u>How to apply</u>

Send resume and cover letter to Sophie Pekar Administrative manager of the project OT-Med:

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