RECRUITMENT OF AN ENERGY MODELING SPECIALIST

**IFPEN – ECONOMICS DEPARTMENT**

IFP Energies Nouvelles (IFPEN) is a major research and training player in the fields of energy, transport and the environment, based in Rueil Malmaison (France). From research to industry, technological innovation is central to all its activities, structured around three strategic priorities: sustainable mobility, new energies and responsible oil and gas. As part of the public-interest mission with which it has been tasked by the public authorities, IFPEN focuses on providing solutions to take up the challenges facing society in terms of energy and the climate, promoting the transition towards sustainable mobility and the emergence of a more diversified energy mix;

The Economics and Environmental Evaluation Department is part of the Economics and Information Watch and Management Division. Nearly 25 people, including engineers, doctors and doctoral students work on topics devoted to the understanding of the energy market mechanisms, the analysis of the determinants of energy demand and more generally on Prospective studies.

Over the last few years, the Economics Department has developed an internationally recognized expertise in the field of Energy Modeling and Environmental Analysis. Part of this knowledge has been capitalized through the development of Times/Markal models at national, regional and international levels.

Today, IFPEN opens an Energy Modeling Specialist position to sustain and develop this activity.

**DESCRIPTION OF THE VACANCY**

Integrated into the Prospective groups within the Economics department, the candidate will develop energy scenarios at a regional, national or international level. He will develop and consolidate the modeling tools already developed at IFPEN and carrying out of energy simulations leading to the identification of the main items of energy and transport policies in France, in Europe and in international level. He will, in particular, enhance the electricity system modelization. He will also have to assess the economic impacts of the energy policy under climate constraints.

The proposed work will take place within the context of IFPEN’s internal research and contractual relations with industry, national and international research institutes and international networks like Energy modeling forum or EERA. The candidate will have a mission to ensure and develop relationships with these partners and to be able to negotiate the scientific content. He/she will also participate in the recruitment, evaluation and supervision of PhD students, post-doctoral students and post-master students involved in this subject.

The candidate will also contribute to the development of IFPEN fundamental research strategy by participating in IFPEN’s cross-functional scientific challenges including: System simulation, optimization or commands and Economic and environmental challenges of the energy transition.

Finally, the candidate will be asked to publish on a regular basis various publications: articles in refereed journals, communications in international conferences, blog articles...
SPECIFIC PROFESSIONAL EXPERIENCE

- Proven experience in the direct use and implementation of MARKAL-TIMES for the definition of prospective energy scenarios at a national or international level will be a key advantage
- Good knowledge of the transportation, electricity supply and/or the energy sector
- Good knowledge of energy policy design and energy scenario building
- Possibly with industrial experience, the candidate will demonstrate a willingness to combine application and fundamental research to industrial or model systems.

SKILLS/COMPETENCIES

- Excellent Teamwork Competency
- Excellent communication and interpersonal skills
- Excellent written and verbal communication (The candidate will have to produce and write technical and economic reports)
- Although all the works will be in English, good level of French language will be a plus

EDUCATION

Engineer or qualified researcher from University specialized on energy modeling plus a PHD on energy modeling and/or future studies.

APPLICATION

The application shall include:

- a cover letter,
- a detailed CV,
- a list of work and publications,
- if possible, letters of recommendation

The application should be sent by email to:

Jérôme Sabathier
Economics and Environment Evaluation
Department Head
IFP Energies nouvelles - Direction Economie et Veille
1 et 4 avenue de Bois-Préau
92852 Rueil-Malmaison Cedex - France
Tél. : 01 47 52 52 81- Fax : 01 47 52 70 81
jerome.sabathier@ifpen.fr