



FACULTY RECRUITMENT PROFILE
Assistant Professor
(MICS laboratory / Mathematics Department)
Reference: GMCFCDIMICS2001

Title: Assistant Professor.

Position: Assistant Professor in Quantitative Finance, at the Mathematics Faculty at CentraleSupélec, Paris-Saclay Campus / Laboratory of Mathematics and Informatics (MICS), « CDI de droit public », at level Associate Professor.

CNU Section: 26

Job profile:

Assistant Professor to join the Mathematics Department, and the Quantitative Finance Research Team (FiQuant Team) within the Laboratory of Mathematics in Interaction with Computer Science (MICS Lab).

Keywords* :

Quantitative finance. Mathematics/Physics/Data Science applied to finance.

CentraleSupélec is a public scientific, cultural and professional institution (EPSCP in French) under the authority of the Ministry of Higher Education and Scientific Research and the Ministry of the Economy, Industry and Digital Technology. Its main missions are: the training of high-level scientific general engineers, research in engineering and systems sciences, and executive education.

The Mathematics Faculty is an academic department at CentraleSupélec whose educational scope covers all the fields of Theoretical and Applied Mathematics for the 3-year CentraleSupélec Engineering Program.

The Laboratory of Mathematics and Informatics (MICS) at CentraleSupélec focuses on mathematical modeling and analysis of complex systems in various fields, including life science, financial markets, industrial engineering, information technologies, or social sciences.

Academic profile:

The candidate will teach within the Mathematics Department of CentraleSupélec, at both undergraduate and graduate levels, in the French cursus ingénieur and in the Master of Science "Data Science and Business Analytics". The candidate will primarily teach quantitative finance and data science courses, but may be asked for larger contributions within CentraleSupélec, notably in continuing education programs related to the candidate's specialty.

Possible courses include "Financial time series" or "Statistics in Finance" at an undergraduate level (French: L3, 1ere année ingénieur), or quantitative finance courses at a graduate level (French: M2 3eme année ingénieur). The candidate should also monitor students's projects or students' seminars.

As some of these courses are taught in English, the ability to teach in English is expected.



Research profile:

The candidate will join the Laboratory of Mathematics in Interaction with Computer Science. MICS Lab research focuses on mathematical modeling and analysis of complex systems in various fields, including life science, financial markets, industrial engineering, information technologies, or social sciences.

The candidate is expected to work within the FiQuant Team and produce high-profile research in Quantitative Finance. This includes, but is not restricted to, modeling of financial markets or other complex economic systems, statistical modeling of financial microstructure, agent-based modeling, high-dimensional statistical learning in economics and finance. Exploration and analysis of large data sets is of particular interest for the FiQuant Team.

Candidate profile:

The candidate should hold a PhD in quantitative finance with exceptional research contributions. Priority will be given to multidisciplinary approaches of quantitative finance. Beside this primary research focus, the candidate is also expected to interact with other teams within the MICS Lab and to promote interdisciplinary research.

Recruitment interview:

For the candidates selected for the audition, the audition will take place in three stages:

- A presentation of the candidate's background and integration project;
- An illustration of a 5-minute lesson, given in English, on a problem, whose subject is identical for all candidates, will be specified on the invitation;
- An exchange with the members of the committee.

The duration of the three parts of the audition will be specified in the invitation letter.

Candidatures:

File in pdf format, including:

- A cover letter
- A detailed CV (teaching experience, research, mobility, publications, etc.)
- An integration project
- A copy of an identity document
- A copy of the doctoral degree
- And any documents that attest previous experience

must be sent by email only to the two contacts below before the 21st of Ma, 2020 at the latest with the reference **GMCFCDIMICS2001**:

Lorraine Maret, human resources: lorraine.maret@centralesupelec.fr

Elodie Ledoux, human resources: elodie.ledoux@centralesupelec.fr

Scientific contacts:

P.-H. Cournède, directeur du laboratoire MICS, paul-henry.cournede@centralesupelec.fr

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