

Computer Science for Communication Networks (CCN)



Why CCN? Want to **understand, analyze and improve your communication network**? Want to develop and define software on top of **next-generation networks**? Many people who want to study the techniques and tools analyzing complex networks choose the Master CCN.

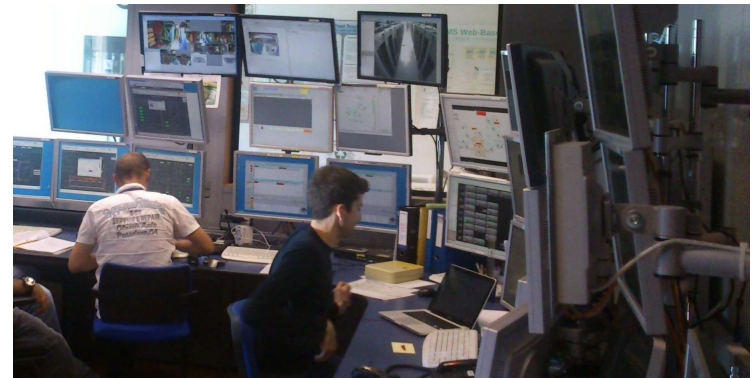
This program proposes to graduate students an initiation to research and allows them to acquire **strong practical and theoretical knowledge in the network and computer science area**. The broad range of proposed modules gives students the opportunity to develop their technical knowledge through **computer science methodologies** applied to communication networks as well as to discover new emerging research topics.

EDUCATIONAL OBJECTIVES

Two main complementary objectives when following CCN:

- To master **formal techniques for communicating network analysis**, the students will study novel techniques and tools to model and analyze complex future networks;
- To master software engineering techniques (e.g. software defined networks) to compute, improve and grasp **the keys of the distributed networks development**.

A number of **labs and projects** are scheduled for students to practice and assimilate concepts more easily. High quality lectures and project supervision are provided by expert professors and industrials.



RESEARCH

Most of the professors involved in the Master CCN are scientifically recognized in their research community and members of CNRS labs. Some of the courses and labs will be provided by industrial R&D units, illustrating the relationships between the taught **research methods and their applications to industry**.

Apart from the acquired technical background allowing the students to become **research engineers in academic or industrial institutions**, the Master CCN offers a first research experience and a real opportunity for preparing a **PhD thesis**.

Associated Labs: CNRS UMR Samovar, E3S, LRI, MAS

CONTACTS

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JOB PROSPECTS

The Master CCN leads to **research** (in research institutes or universities) and **engineering positions** (e.g., industry) in the fields of modeling and analysis of complex networks, distributed computing for new-generation communicating systems, their qualitative and quantitative studies.

SOCIO-ECONOMIC PARTNERS

The Master CCN, proposed by two major engineering schools of the University Paris-Saclay, enjoys an exceptional location in an ecosystem bringing together a large number of ICT economic actors, the competitiveness clusters Systematic and Cap Digital, and innovation structures (IRT SystemX, Incuballiance).

In addition, for several years, CCN has developed close relationships with several socio-economic partners from whom the students will benefit.

PARTNERS



LOCATION

Evry, Paris area.