

Press release

TRAINING/5G

Arcep teams up with Epitech, for a hackathon designed to train future 5G experts

14 February 2019

Arcep and Epitech, a school for innovation and expertise in computer science, have teamed up to co-host a student hackathon.

Arcep is delighted to see Epitech students being mobilised to explore new avenues and meet future telecoms needs. The advent of 5G is bound to require new skillsets, particularly in the realm of computer science.

Why host a 5G hackathon with Epitech? Frequency allocations for mobile networks: a central concern

One of Arcep's goals is to teach students about the world of telecoms by introducing them to new fast-growing fields, and the resulting job opportunities that are available to them.

Another goal for Arcep is to work with students on thinking about how one of the regulator's jobs is changing, namely frequency allocation. The development of new radio technologies, together with the growing number of requests for spectrum, will force a rethink of current frequency allocation and management methods – and thereby initiate a dynamic and innovative, and potentially decentralised system of allocation, while nevertheless ensuring that Arcep maintains a certain degree of control. The Authority thus suggested that Epitech students ponder this issue, at a time when low-band frequencies are becoming increasingly scarce, and with the expected development of ultra-localised networks using high-band frequencies.

The students were given a choice of three themes

- *Think of a new design for the frequency authorisation request interface:* students are asked to develop a graphic and display system for local network allocation maps.
- *Make it easier for Arcep staff to track spectrum allocations and streamline management:* the purpose is to think about managing a secondary frequency market mechanism, using blockchain technology.
- *Develop a simulation tool for a frequency allocation mechanism:* the concrete aim is to programme a serious game to be able to see how transactions will play out, according to basic parameters, notably in instances of anomalous behaviours or conflicts.

These topics require the students to make proposals for:

- the visual representation of networks and their use;
- the digitisation of frequency licence award and transfer processes, and analysis of the relationships between the various stakeholders (to understand the rules and mechanisms that can influence behaviours in a primary and secondary market).

Press liaison

Jean-François Hernandez
hernandez@arcep.fr

Tel.: 01 40 47 70 33

Follow Arcep

 www.arcep.fr

 [@Arcep](https://twitter.com/Arcep)  [Facebook](https://www.facebook.com/Arcep)

 [LinkedIn](https://www.linkedin.com/company/Arcep)  [Dailymotion](https://www.dailymotion.com/Arcep)

Subscribe

[RSS feed](#)

[E-Newsletter](#)

[Mailing list](#)

An experiment in cross-pollination, and laying the groundwork for a long-term process of reflection

These projects, which are incorporated into the Epitech teaching cycle, are designed to initiate students into a long-term process of reflection, and to gradually build their awareness of new telecoms industry jobs, and jobs that will emerge thanks to telecoms. A good way to prepare students for tomorrow's spectrum management challenges.

Arcep at a glance

The Electronic Communications and Postal Regulatory Authority (ARCEP), a neutral and expert arbitrator with the status of independent administrative authority, is the architect and guardian of internet, fixed and mobile telecoms and postal networks in France.

Press liaison

Jean-François Hernandez
hernandez@arcep.fr

Tel.: 01 40 47 70 33

Follow Arcep

 www.arcep.fr

 [@Arcep](https://twitter.com/Arcep)  [Facebook](#)

 [LinkedIn](#)  [Dailymotion](#)

Subscribe

[RSS feed](#)
E-Newsletter

[Mailing list](#)