# SoBigData – Development of the CNR Pervasive Internet node

## Background & Topic description

We are looking for Research Engineers to complement the research team working on one of the Pervasive Internet CNR Node of the SoBigData.it Research Infrastructure. It is funded under the national recovery funds (in the framework of the EU NextGenerationEU recover programme). The node developed by UI-IIT will be a complex infrastructure supporting experimentally-driven research on the following topics: (i) human-centric beyond-5G pervasive networks; (ii) advanced end-to-end slicing; (iii) vehicular networks; (iv) edge computing; (v) decentralised AI in pervasive environments. Successful candidates will work on developing cutting-edge technologies in the (beyond-)5G domain, also integrating open source components implementing the post-5G O-RAN architecture, as well as other 5G reference components for 5G and post-5G networks, including OpenAir Interface.

The candidate is expected to work in the framework of the SoBigData.it PNRR national programme, tightly linked with the ESFRI <u>SoBigData</u> and <u>SLICES</u> Research Infrastructures. Therefore, they will be deeply involved in the definition and development of technical solutions to interconnect the UI-IIT site with the other nodes and sites of SoBigData and SLICES at the European level, as well as the deployment of the integrated infrastructure across the EU sites. The researcher will be deeply involved in the development of the research infrastructure as well as in the development of novel schemes for 6G/B5G.

## Type of prospect positions

We plan to open positions at the level of **Research Engineer** on this topic.

## Funding and partnerships

The activities of this topic are supported by the <u>SoBigData.it NRPP project</u>, funded by the National Recovery and Resilience Plan (NRRP) – European Union (NextGenerationEU), and they will establish strategic partnerships with the European ESFRI Research Infrastructures <u>SoBigData.eu</u> and <u>SLICES</u>. SoBigData and SLICES are two of the major ESFRI Research Infrastructures in the DIGIT domain (digital technologies). They develop synergic research at the intersection between big data and Future Internet technologies. The activities will also contribute to linking the two initiatives, and developing an innovative Pervasive Internet node at CNR.

## Candidate profile

Ideal candidates should have a MSc in Computer Science, Computer Engineering, Telecommunications Engineering, Mathematics, Physics, or closely related disciplines, and at least three years of relevant post-graduation experience on the topic.

#### Contacts



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