



Lausanne, January 16, 2022

Postdoctoral Fellow in theoretical quantum physics and quantum information at the Swiss Federal Institute of Technology (EPFL) in Lausanne, Switzerland

We are seeking an experienced, motivated and highly skilled scientist to work as a postdoctoral fellow in the Laboratory of Theoretical Physics of Nanosystems (LTPN) at the Swiss Federal Institute of Technology (EPFL) in Lausanne, Switzerland. **The post is a one-year fixed-term, renewable appointment. Starting date is March 1st, 2022 or later.**

The postdoctoral fellow will take leading role in the research activity of LTPN, on topics at the frontier between the theory and modeling of open quantum systems, and quantum information and computing. Possible research lines are, among others, the theory design and modeling of bosonic quantum codes, the development of quantum algorithms for the simulation of open quantum systems, and the search for quantum inspired numerical methods for the classical simulation of quantum systems.

The candidate is expected to excel both in quantum information and algorithms – including hybrid variational algorithms – and in the theory and modeling of open quantum systems – including quantum stochastic processes, and the Lindblad master equation for the density operator. A very good knowledge of the related numerical methods and tools – such as the Qiskit and/or other quantum computing SDKs, exact diagonalization and quantum trajectories, and the QuTiP toolbox – will be a strong plus.

Theoretical research will be carried out also in strong synergy with experimental groups at EPFL and abroad. It will benefit of interactions within the [EPFL Center for Quantum Science and Engineering](#), as well as the [National Centre of Competence in Research “SPIN”](#) (NCCR-SPIN). We offer a very stimulating environment in one of the world’s highest rank universities, outstanding research facilities, and a very attractive salary.

Candidates should provide a curriculum vitae, a cover letter with a summary of their past research experience, and a list of publications. Applications can be submitted by filling [this application form](#).

For additional information, please contact:

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