



Prix Jean Jerphagnon 2024 : Julien LAURAT

The Jean Jerphagnon Prize 2024 honors Julien LAURAT, Co-Founder of the startup Welinq for his outstanding contribution for the development of quantum memories.

During the Société Française d'Optique (SFO) congress in Rouen, In the presence of Jerphagnon family, in front of more than 600 congress attendees, the Jean Jerphagnon Prize session began with the grand plenary lecture by Pascale SENELLART on SEMICONDUCTOR QUANTUM DOTS: ARTIFICIAL ATOMS FOR QUANTUM TECHNOLOGIES. She founded the spin-off company Quandela, which develops single-photon light sources. Then, Mr. Thierry Georges, CTO of OXXIUS, presented the trophy on behalf of Jury of the prestigious Jean Jerphagnon Prize. Alain Aspect, the 2022 Nobel Laureate in Physics and Jury President of Jean Jerphagnon Prize 2024 warmly congratulated Julien LAURAT for his exceptional contribution to the advancement of quantum information, particularly for the development of quantum memories with remarkable properties, which led to the creation of the startup Welinq (welinq.eu).

Julien Laurat, an engineer graduated from the Institut d'optique Graduate School Professor of Physics at Sorbonne University, and member of the Institut Universitaire de France. As the head of the Quantum Networks team at the Kastler Brossel Laboratory, Julien Laurat is distinguished by his innovative work on creating new interfaces between light and cold atoms, generating non-classical states of light, and implementing quantum information protocols using these resources. His internationally acclaimed research has earned him two European Research Council (ERC) grants, a Starting Grant in 2012 and an Advanced Grant in 2023.

In 2022, Julien Laurat co-founded the startup Welinq, aiming to become a major player in the interconnection of quantum processors and thus accelerate the scaling up of quantum computing. Welinq, which now has 20 employees, plans to deliver its first transportable and robust quantum memory by the end of 2024.

Since 2011, Julien Laurat has also directed the professional bachelor's degree program "Optical Instrumentation and Visualization" (L3 pro LIOVIS) at Sorbonne University, actively contributing to the promotion of photonics education in France.

The prestigious Jean Jerphagnon Prize also honored three nominees, showcasing the great diversity of cutting-edge French research with very promising applications: Alexandre AUBRY for his contributions in Optical Matrix Imaging, Rémy BOULESTEIX for breakthroughs in New Optical Components for Ceramic-Based Lasers, and Hilton BARBOSA DE AGUIAR for Compressive Raman Microspectroscopy.