

Curriculum Vitae – Valerio Pruneri – updated Jan 2025

ICREA Prof., Corning Inc. Chair, Group Leader at ICFO.

ICFO – The Institute of Photonic Sciences, Castelldefels (Barcelona).

In brief

- Since 2006, ICREA Industrial Professor, Corning Inc. chair and group leader at ICFO. Prior to ICFO, from 2000 to 2006, he had worked in industry for Avanex Corp. (formerly Corning OTI). Since 2010 visiting Corning Inc. in USA, for a cumulative period of about 2 years.
- Current research topics: photonic engineering, quantum technologies and nano-photonics: energy-efficient communication and information displays, quantum cryptography, quantum imaging, quantum random number generation, photonic sensing using artificial intelligence.
- About 100 R&D projects, mostly as coordinator or principal investigator, funded by national and international agencies (European Commission, Ministry of Research and Innovation, European Space Agency) or in collaboration with industries in Europe and USA, including Corning, Carl Zeiss, HP, ABB, IBM, SEAT/Volkswagen, BASF.
- Co-founder and board member of 3 spin-offs, with two of them receiving the EIC accelerator award: Quside (www.quside.com) on integrated quantum random number generators for secure communication and high performance computation, Sixsenso (www.sixsenso.com) on image sensing systems for detection of micro-organisms in water and Luxquanta (www.luxquanta.com) on quantum cryptography systems. A 4th spin-off on phase imaging for semiconductor and live cells is incubating (www.shinephi.tech).
- Since 2015, raised more than 20 M€ of competitive and private funding, and coordinated 7 European projects (RAIS, QMIC, NANOGLASS, CIVIQ, LIM, EuroQCI-Spain, QSNP). CIVIQ (2018-22) and QSNP (2023-2026) are Quantum Flagship, 10 and 25 M€, respectively.
- About 200 refereed journal papers (including Nature, Science, Nature Photonics, Nature Materials, Nature Communications, Science Advances, etc...), more than 100 invited talks. Google h-index 64. More than 65 granted or pending patent families.
- Supervised more than 20 PhD Thesis to completion. Three of them awarded with top National, European and International Prizes (Cerca Pioneer Award, MIT Technology Review 35 and Photonics 21 European Student Innovation Award).
- More than 40 international conference committees; in particular, general and technical chair of the European Conference on Lasers and Electro-optics (CLEO Europe) 2017 and 2015 and technical/general chair of the European Conference on Integrated Optics (ECIO) 2012.
- For his research and technology transfer achievements: Pirelli Fellowship, Philip Morris Prize, IBM Faculty Award, Duran Farell Prize, Ignite award (SLAS Europe), Paul Ehrenfest Best Paper Award, National Innovation Award for new companies (Luxquanta), Corning Inc. chair, RSEF-BBVA Prize for Physics, Innovation and Technology.