

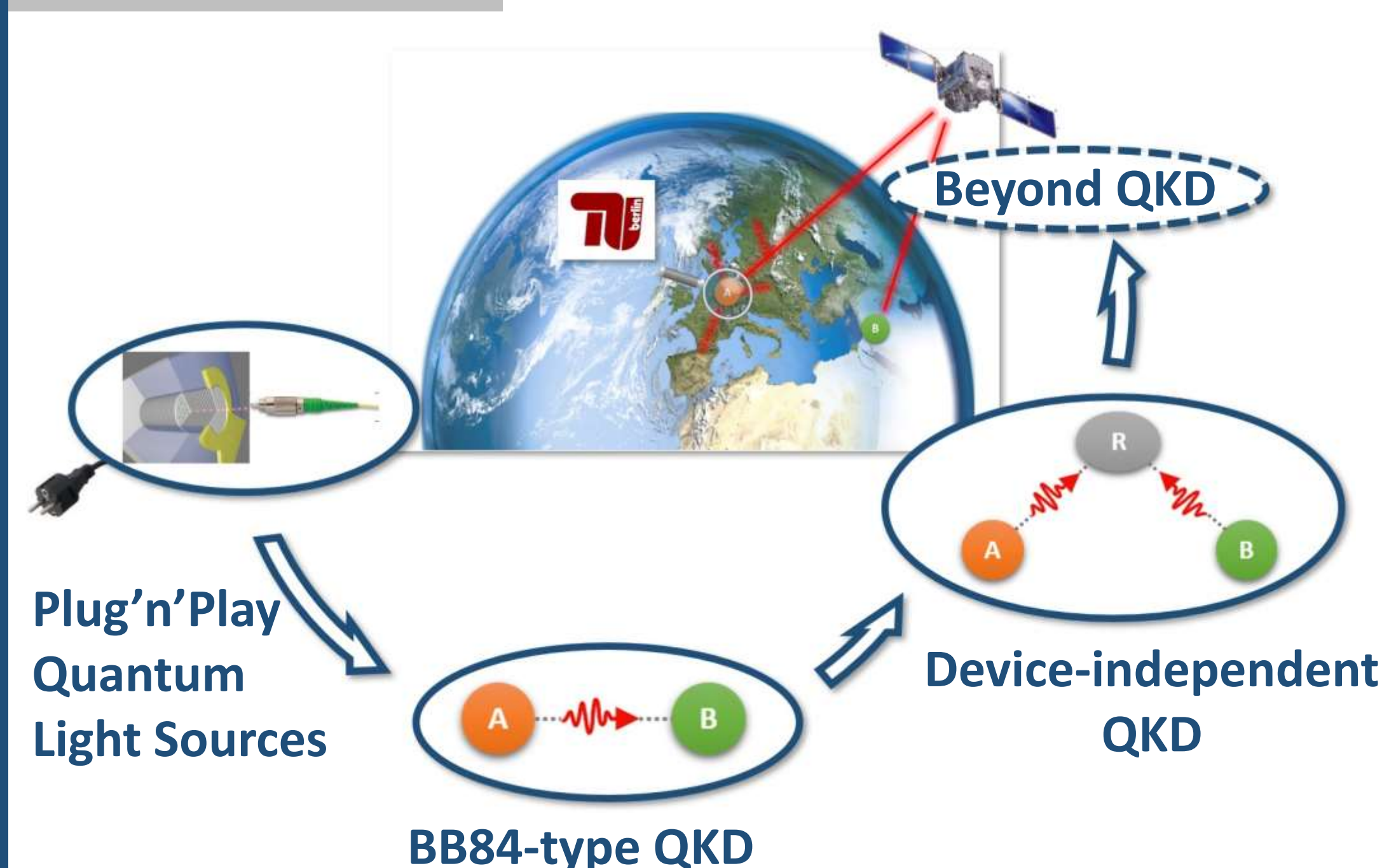
T. Kupko¹, L. Rickert¹, M. v. Helversen¹, A. Strittmatter^{1,2}, S. Rodt¹, S. Reitzenstein¹, and T. Heindel¹ ✉

¹Institute of Solid-State Physics, Technical University Berlin, Germany

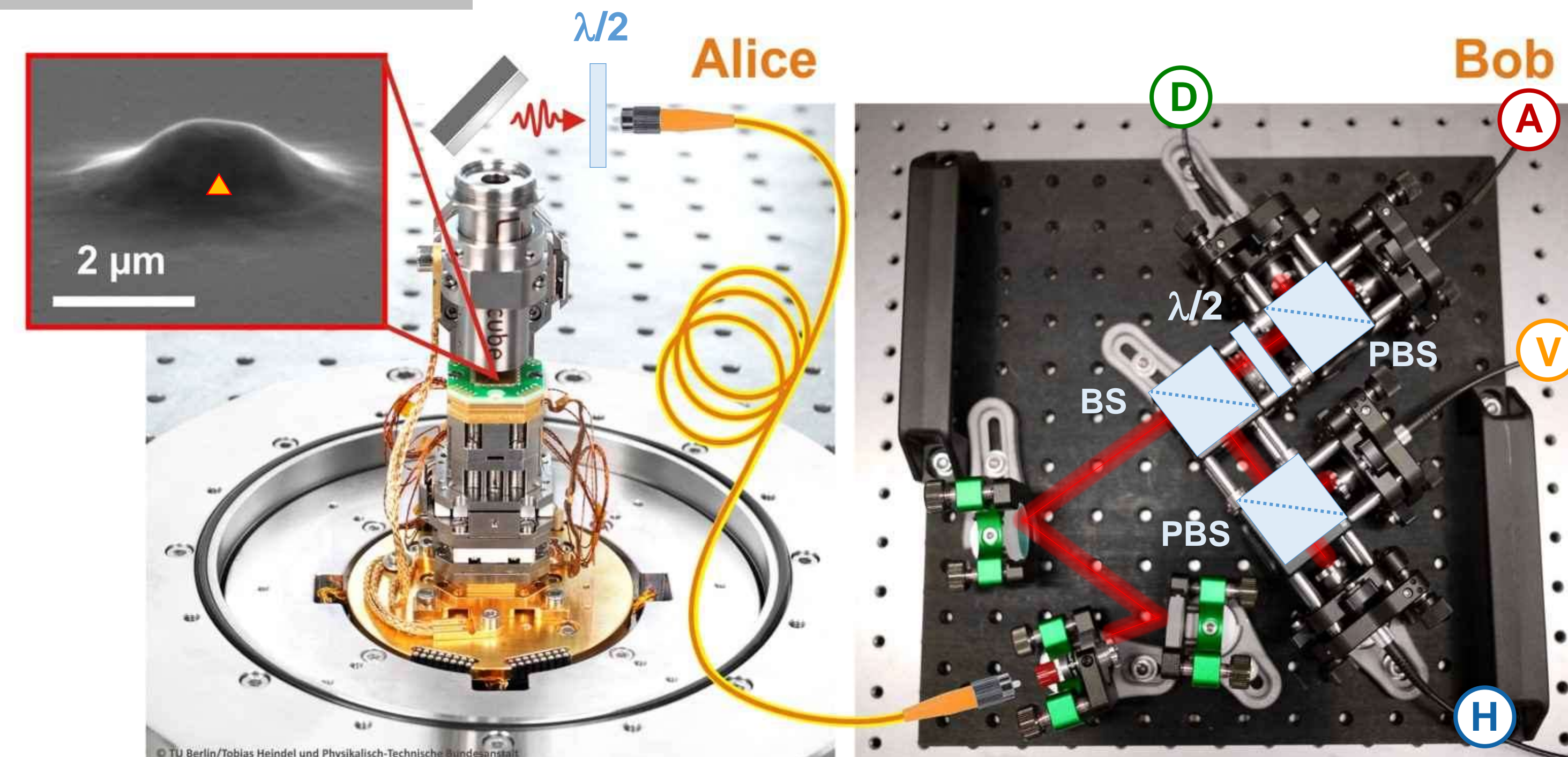
✉ tobias.heindel@tu-berlin.de



Motivation Secure Communication



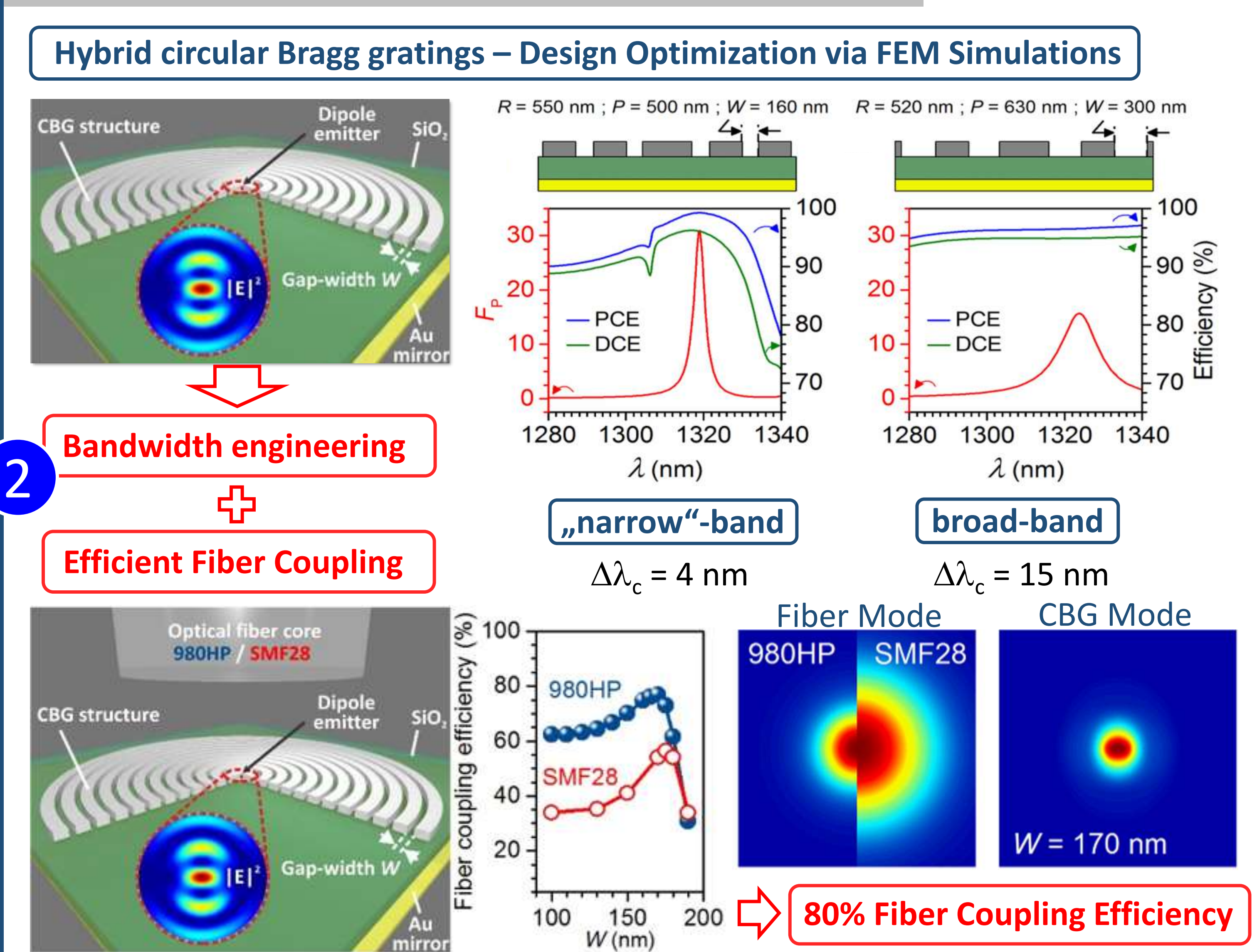
QKD Testbed BB84 Protocol



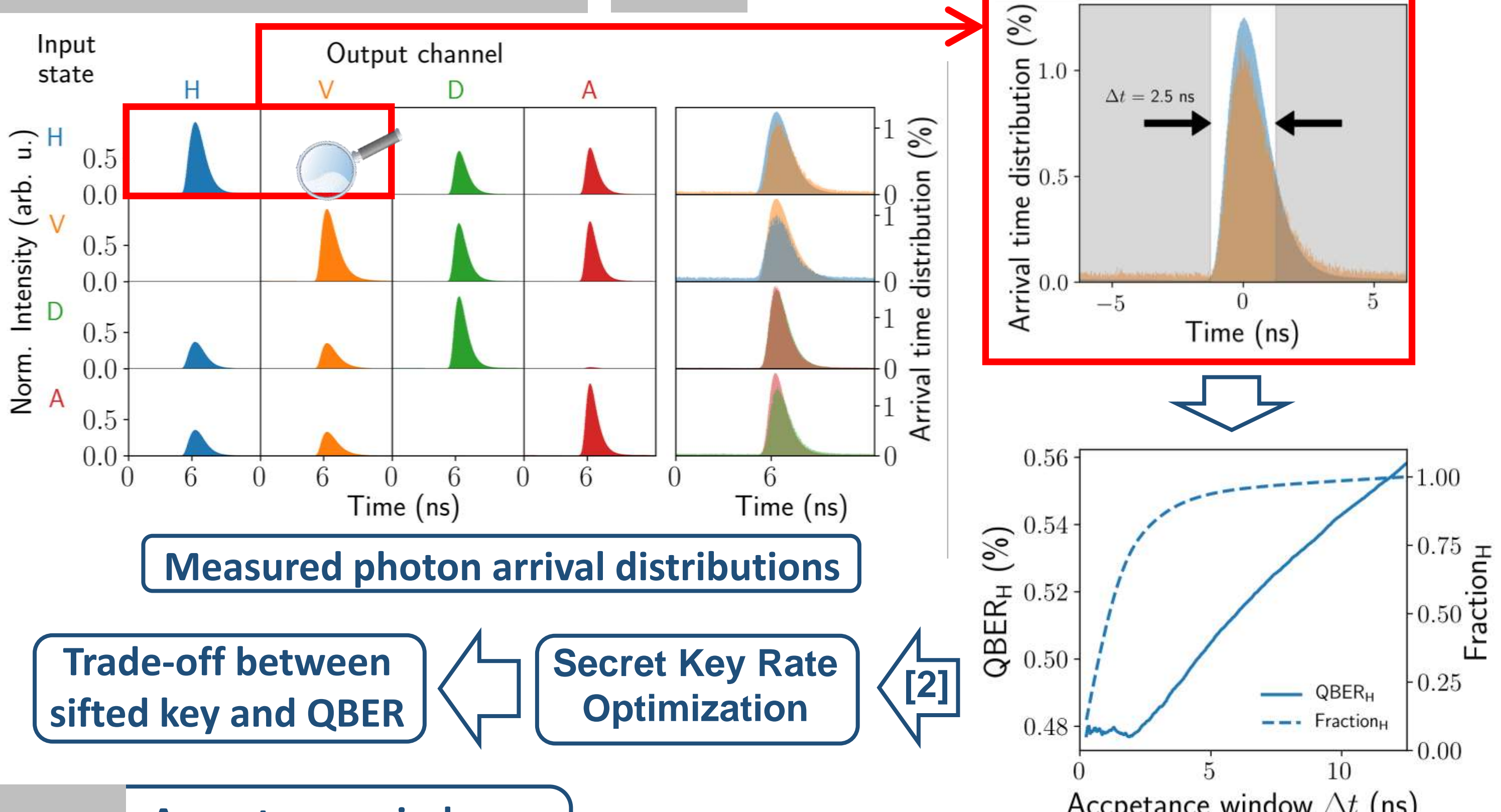
Deterministically fabricated QD single-photon source [1]

[1] M. Gschrey et al., *Nature Commun.* **6**, 7662 (2015)

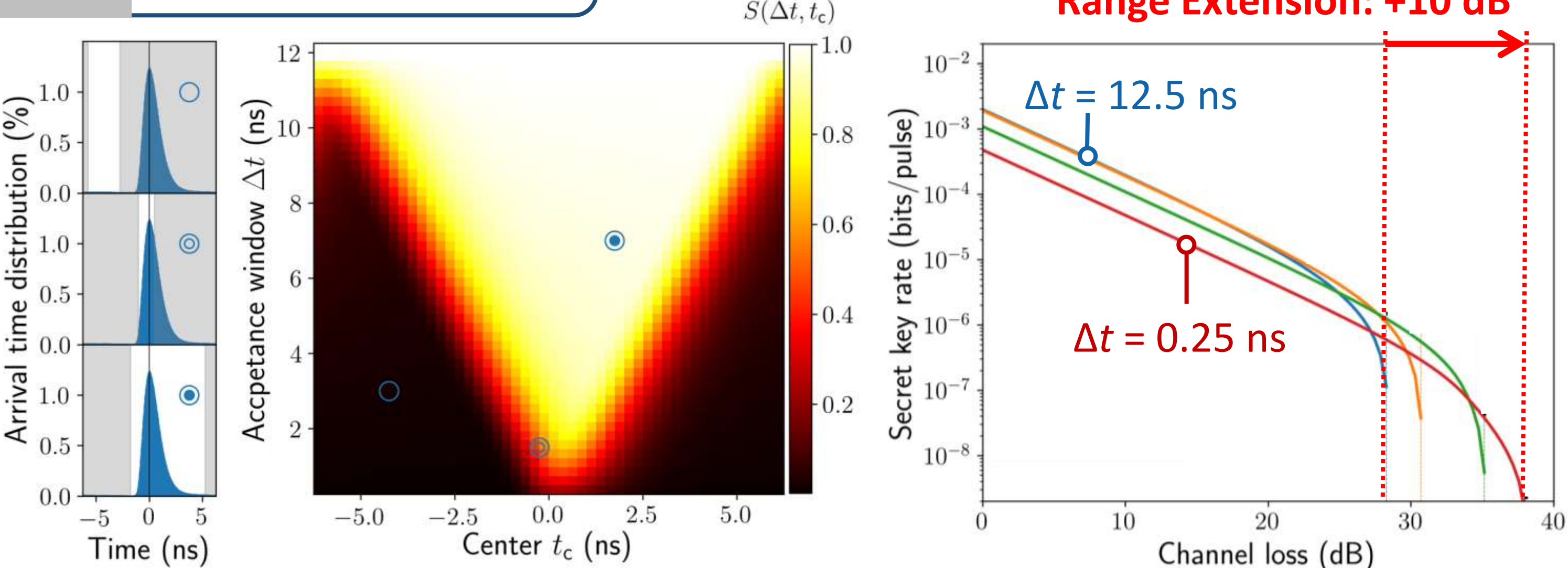
Towards Efficient Telecom FC-SPs



Temporal Filtering 1D

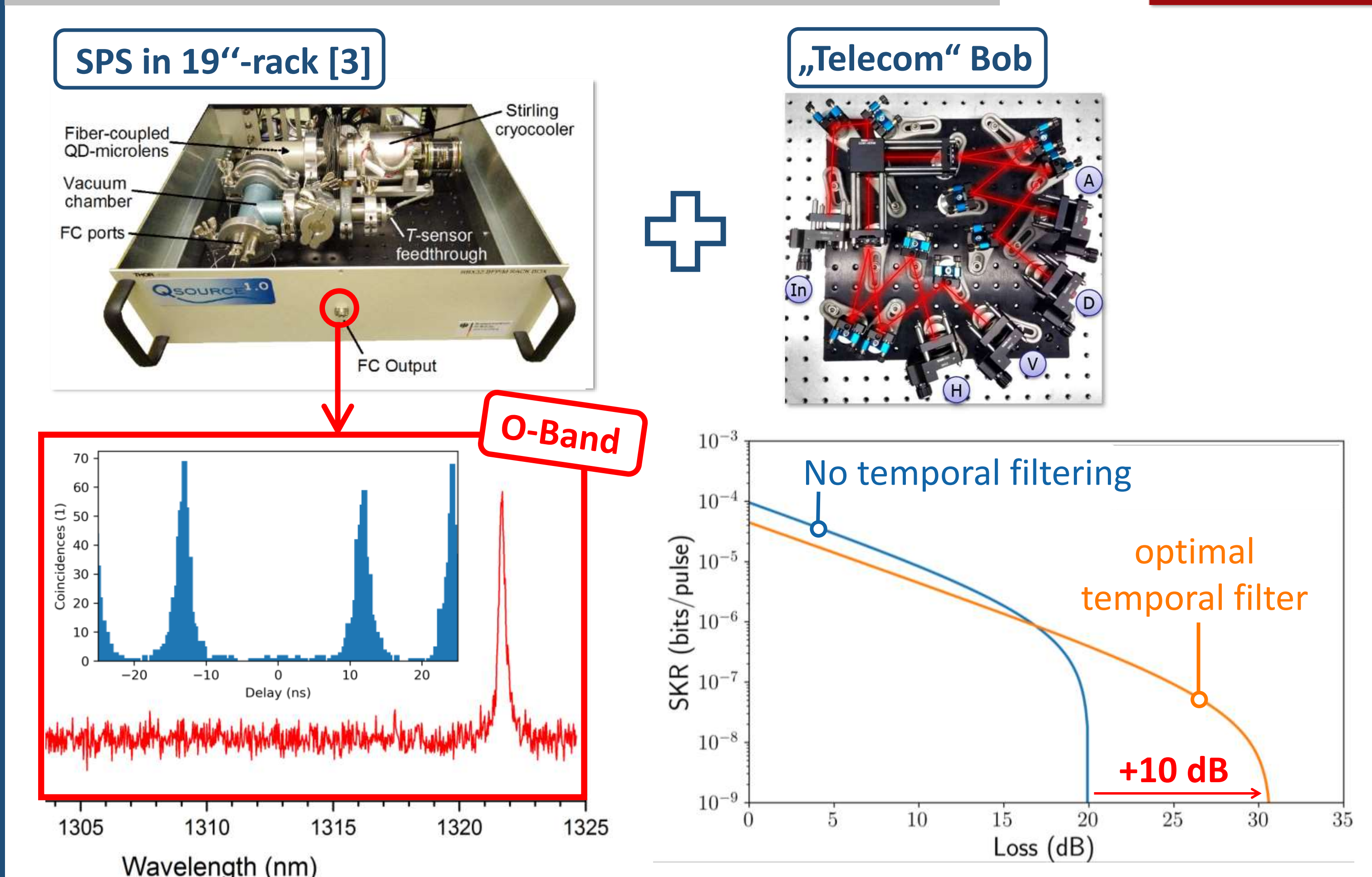


2D Acceptance window: Width Δt and Center t_c



Plug'n'Play Telecom SPs for QKD

Lab NEWS



[3] A. Schlehahn, [...], T. Heindel et al., *Sci. Rep.* **86**, 013113 (2015)

Real-Time Security Monitoring

