Study of the partially-coherent light dynamics in optical fibre using Heterodyne Temporal Microscopy

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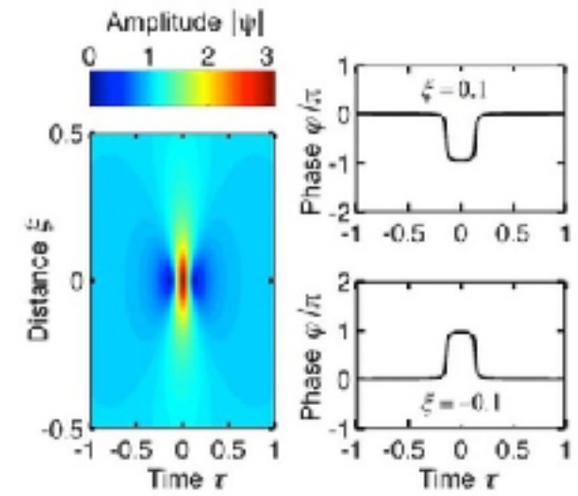
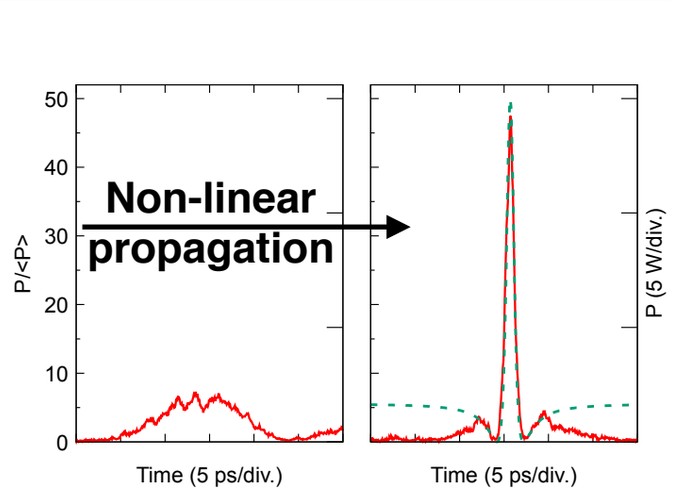
Integrable Turbulence behind the 1-D NLS model



M. Bertola and A. Tovbis. Comm. Pure Appl. Math. , 66 ,5, 2013.

Peregrine Soliton as a regularisation of gradient catastrophe



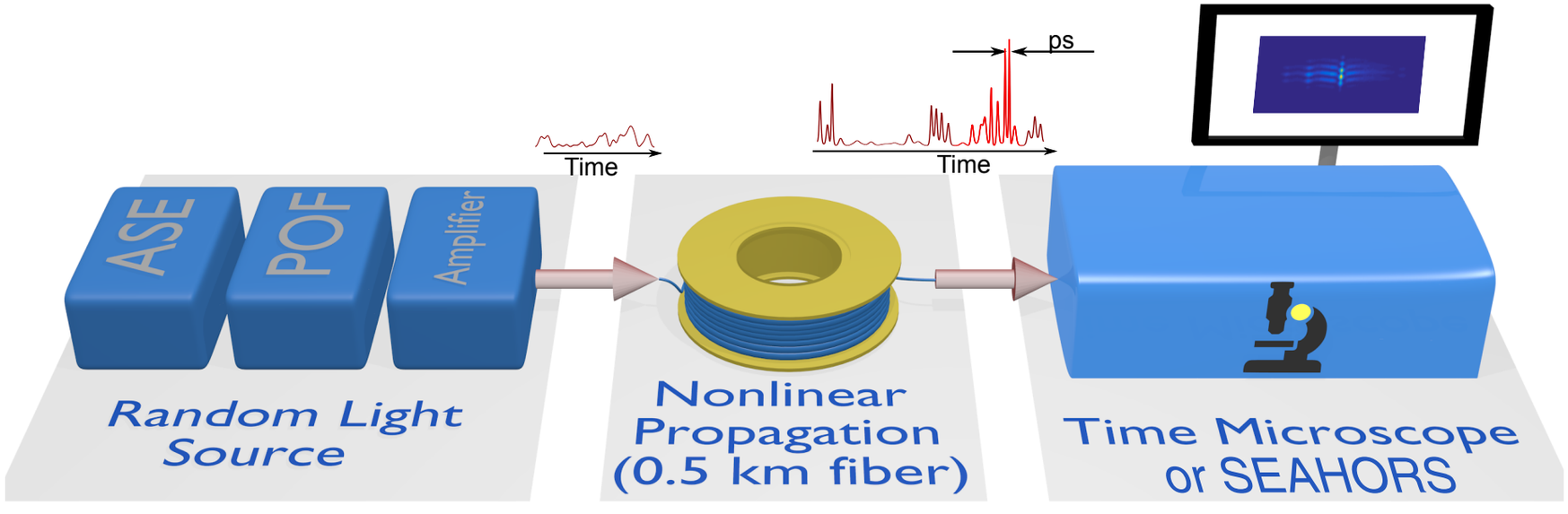
P. Suret et al. ,Nat. Commun. , 7, 2016.

Direct observation of partially-coherent light dynamics in optical fibre

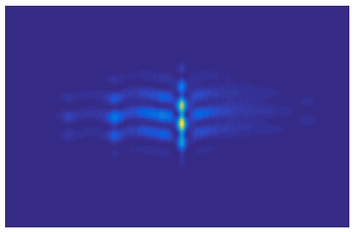
Direct
Single-shot
High resolution
(<300 fs)
Power and Phase
Recording Tool

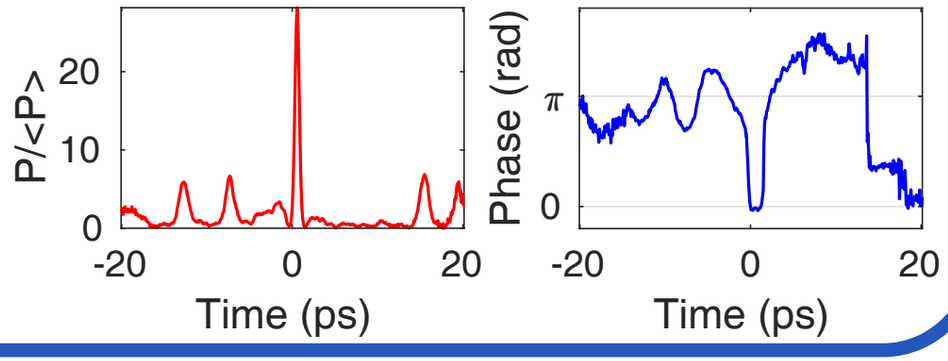
Vladimir E Zakharov. Stud. Appl. Math. , 122 , 3 p.219–234, 2009.

High precision Power and Phase measurements in single-shot

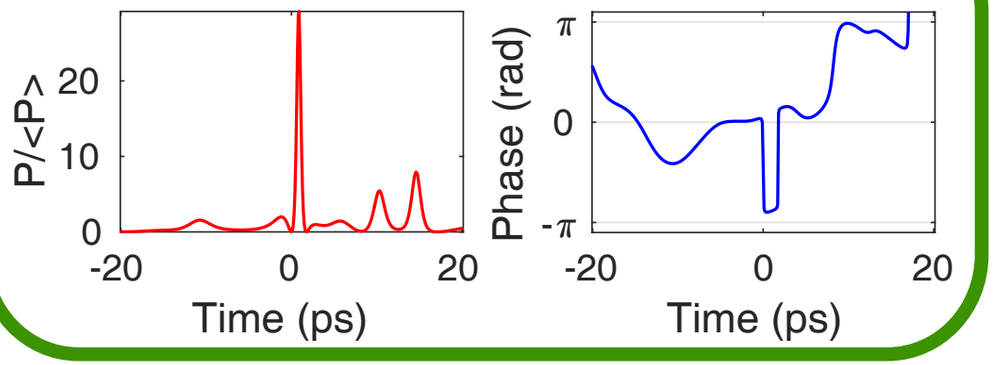


Experiments





Simulations



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