

Dispersion-diversity optical fibers

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Abstract (50 words max): Beyond high-capacity communications, space-division multiplexing fibers bring many advantages to optical and microwave signal processing, as not only space but also chromatic dispersion are introduced as new degrees of freedom. The key lies in developing new fibers where each individual core/mode is tailored to provide parallel dispersion-diversity signal processing.

Biography (100 words max): Ivana Gasulla is Associate Professor at the Universitat Politècnica de València and co-founder of iPronics Programmable Photonics. In 2017, she was awarded an ERC Consolidator Grant to develop new Space-Division Multiplexing technologies for emergent fiber-wireless communications. Previously, she was a Fulbright Scholar at Stanford University.

Her research interests encompass the application of multimode and multicore fibers to Microwave Photonics. Her work has led to more than 125 international publications. She is/was a TPC member of the most prestigious conferences, such as OFC, Senior Editor of IEEE Journal of Selected Topics in Quantum Electronics and Associate Editor of Photonics Technology Letters.

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