Photonic RF and Microwave Photonic Channelizers based on Kerr Micro-combs

David Moss¹

¹Affiliation not available

December 6, 2021

Abstract

We review recent work on broadband RF channelizers based on integrated optical frequency Kerr micro-combs combined with passive micro-ring resonator filters, with microcombs having channel spacings of 200GHz and 49GHz. This approach to realizing RF channelizers offers reduced complexity, size, and potential cost for a wide range of applications to microwave signal detection.

Hosted file

Channelizer J Sem authorea.pdf available at <https://authorea.com/users/418067/articles/548066-photonic-rf-and-microwave-photonic-channelizers-based-on-kerr-micro-combs>