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## A CHARACTERIZATION OF GENERALIZED FRAME MRAs DERIVING ORTHONORMAL WAVELETS

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**摘要** In 2000, Papadakis announced that any orthonormal wavelet must be derived by a generalized frame MRA (GFMRA). In this paper, we give a characterization of GFMRA's which can derive orthonormal wavelets, and show a general approach to the constructions of non-MRA wavelets. Finally we present two examples to illustrate the theory.

**关键词** [orthonormal wavelets](#) [generalized frame MRA](#) [non-MRA wavelets](#)

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**Abstract** In 2000, Papadakis announced that any orthonormal wavelet must be derived by a generalized frame MRA (GFMRA). In this paper, we give a characterization of GFMRA's which can derive orthonormal wavelets, and show a general approach to the constructions of non-MRA wavelets. Finally we present two examples to illustrate the theory.

**Key words** [orthonormal wavelets](#) [generalized frame MRA](#) [non-MRA wavelets](#)

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