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Matrix Fourier Multipliers for Parseval Multi-wavelet Frames.

Matrix Fourier multipliers are matrices with $L^\infty$-function entries that map Parseval multi-wavelet frames to Parseval multi-wavelet frames. Like Fourier wavelet multiplier, matrix Fourier multipliers can be used to derive new multi-wavelet frames and can help us better understand the basic theory of multi-wavelet frames. In this talk I will discuss a characterization of such matrix Fourier multipliers. This is a joint work with Z. Li. (Received January 08, 2014)