

Solving the Maxwell equations by the Chebyshev method: a one-step finite-difference time-domain algorithm.

De Raedt H, Michielsens K, Kole JS, Figge MT (2003) Solving the Maxwell equations by the Chebyshev method: a one-step finite-difference time-domain algorithm. *IEEE Transactions on Antennas and Propagation* 51, 3155-3160.

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Abstract

We present a one-step algorithm that solves the Maxwell equations for systems with spatially varying permittivity and permeability by the Chebyshev method. We demonstrate that this algorithm may be orders of magnitude more efficient than current finite-difference time-domain algorithms.

Beteiligte Forschungseinheiten

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Identifier

doi: 10.1109/TAP.2003.818809