

# Abstracts

## Transmission Matrix Representation of Finline Discontinuities

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A.S. Omar and K. Schunemann. "Transmission Matrix Representation of Finline Discontinuities." 1985 *Transactions on Microwave Theory and Techniques* 33.9 (Sep. 1985 [T-MTT]): 765-770.

A general treatise of cascaded discontinuities in inhomogeneous waveguides is given and applied to finline circuits. A transmission matrix representation is superior to a scattering matrix representation as far as CPU time is concerned. The scattering matrix is, however, advantageous if the sum of the line lengths separating the discontinuities is large. Numerical examples are given in order to illustrate the effect of increasing the number of modes used to represent the field at both sides of the discontinuity.

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