

# Abstracts

## Dispersion of Transient Signals in Microstrip Transmission Lines (Dec. 1986 [T-MTT])

---

*R.L. Veghte and C.A. Balanis. "Dispersion of Transient Signals in Microstrip Transmission Lines (Dec. 1986 [T-MTT])." 1986 Transactions on Microwave Theory and Techniques 34.12 (Dec. 1986 [T-MTT] (1986 Symposium Issue)): 1427-1436.*

The distortion of an electrical pulse caused by dispersion as it propagates along a microstrip line is investigated. A model for dispersion of the phase constant is selected to meet the frequency, accuracy, and microstrip parametric requirements. Numerical integration and Taylor series expansion approximation techniques are used to compute the shape of dc dispersed pulses having square and Gaussian envelope shapes. Taylor series expansion methods are more convenient for the analysis of RF pulses.

 [Return to main document.](#)