Abstracts

Propagation characteristics of Schottky contact suspended slow-wave microstrip line

A.K. Verma and Nasimuddin. "Propagation characteristics of Schottky contact suspended slow-wave microstrip line." 2001 Microwave and Wireless Components Letters 11.9 (Sep. 2001 [MWCL]): 385-387.

The single-layer reduction (SLR) model computes the normalized phase constant (/spl beta///spl beta//sub 0/), dielectric loss (/spl alpha//sub d/), and conductor loss (/spl alpha//sub c/) for the Schottky contact slow-wave microstrip (SCSM) line with accuracy about 2.0% for /spl beta///spl beta//sub 0/, and within 0.01 dB/mm for the total loss (/spl alpha//sub t/=/spl alpha//sub d/+/spl alpha//sub c/) as compared against the experimental results. The SLR model has been further used to analyze the normal and abnormal characteristics of a proposed Schottky contact suspended slow-wave microstrip (SCSSM) line with 22% increase in /spl beta///spl beta//sub 0/ over the normal SCSM line. The SCSSM line could be useful in the lower range of RF for the development of compact components.

❑ Return to main document.