

Abstracts

Coupling Between a Dielectric Image Guide and a Dielectric Resonator

F. Farzaneh, P. Guillot and Y. Garault. "Coupling Between a Dielectric Image Guide and a Dielectric Resonator." 1984 MTT-S International Microwave Symposium Digest 84.1 (1984 [MWSYM]): 115-117.

Since many years dielectric guides have been used to realize microwave components at millimeter wave frequencies. In this frequency band, the coupling of dielectric resonators with such guides will permit to obtain integrated dielectric components like filters or oscillators. This paper presents the study of the coupling between a dielectric image guide and the TE₀ gamma delta/ cylindrical dielectric resonator mode. A lumped equivalent circuit is given and the coupling coefficient between the guide and the resonator is evaluated. Experimental and theoretical results are also presented.

[Return to main document.](#)