

Abstracts

A novel CPW DC-blocking topology with improved matching at W-band

*I. Huynen and G. Dambrine. "A novel CPW DC-blocking topology with improved matching at W-band." 1998 *Microwave and Guided Wave Letters* 8.4 (Apr. 1998 [MGWL]): 149-151.*

This work presents the design of a new wide-band DC-blocking filter in coplanar waveguide (CPW) technology. Compared with the well-known coplanar open-end series stub, the matching of the new filter is theoretically shown to be improved from -10 to -20 dB over the whole W-band. The calculation is made by combining coupled line theory with a simple variational calculation of modal parameters. Measurements carried out in the W-band show very good agreement with the theory.

[Return to main document.](#)