

# Abstracts

## Unrestricted arbitrary shape optimization based on 3D electromagnetic simulation [passive microwave structures]

---

*A. Kozak and W.K. Gwarek. "Unrestricted arbitrary shape optimization based on 3D electromagnetic simulation [passive microwave structures]." 1998 MTT-S International Microwave Symposium Digest 98.1 (1998 Vol. 1 [MWSYM]): 17-20.*

An efficient computer system, for automatic synthesis of passive microwave structures of novel geometrical shapes, based on 3D FD-TD electromagnetic simulation was developed. The first robust multilevel hybrid optimization which allows unrestricted evolution of an arbitrary circuit shape is presented. Two designs of unique microwave structures illustrate our technique.

[Return to main document.](#)