

WS090:

Recent Advances in Compact and Multiband Printed Microwave Components and Antennas Using New Metamaterial Loading

*By
M. Abdalla*

Abstract:

In the past decade, a new artificial planar structure has been proposed as a metamaterial. Investigation of electromagnetic wave propagations in metamaterials has explored many novel properties. Thanks to this novel and unique features it has been great interest from electromagnetic wave community for new applications in guided, radiated areas. Multiband functionalities and size compactness of printed microwave components and antennas are on the top of the priorities of metamaterial applications. This implies the optimum use of metamaterial structures and proposing new configurations as well. In our talk, we discuss recent advances in compact and multiband printed microwave components and antennas using new metamaterial loading.