SIMULATION OF A DIPOLE ANTENNA FOR UWB APPLICATION USING GENESYS

This project report is presented in partial in fulfillment for the award of Bachelor in Electrical Engineering (Honors)

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ABSTRACT

This paper present results of simulation of a simple $\lambda/2$ dipole antenna for wideband and ultra-wideband applications. Although dipole and monopole antenna are not necessarily the best candidate for UWB antennas, they are easy to manufacture and low cost. In the UWB communication system, the antennas act as major pulse-shaping filters.

The main goal of this paper is to simulate the antenna using a new RF and microwave software called Genesys 2004. The simple and intuitive electrical equivalent schematic of the dipole antenna presented here can be used in Genesys 2004 and yields fast and good results.

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