ABSTRACT

This project is to research the performance and receiver design of GMSK modulation system for mobile communication. In this channel, because of the affection of environment, the signals would be distorted. We consider the fading noise and additive Gaussian white noise in the project. In receiver, through our analysis, we suggest to use linear prediction technique to treat the data before, and match Viterbi algorithm to demodulate them. This project is to research and analyze GMSK structure and design adaptive optimum receiver system characteristic, and compare to the characteristic of computer simulation, and combine theory and simulation.

Keywords: Fading Noise; Additive Gaussian White Noise.