Abstract

Conventionally fading analysis of wireless LAN or MAN means small scale fading i.e. wide fluctuation of received signal with small variation of time and distance. In analysis of fading channel we consider the received signal in power, voltage or SNR as a random variable then statistical probability density function (pdf) like Rayleigh, Rician or Nakagami-m is used to get the probability of different phenomena. Most of the pdf is governed by two parameters: mean and variance of the random variable. In recent literature the mean value is taken constant but in this paper we consider the mean value as a slowly varying random variable and depend on the parameters of large scale fading. In this paper the concept of large and small scale fading is combined, in analysis of performance of cognitive radio network in context of medium access probability specially at 1900MHz and 2100MHz.
November 2002.


Index Terms
Computer Science
Networks
Keywords

Blocking probability; path loss model; fading channel; MRC; spatial false alarm.