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BER Reduction of Rayleigh Flat Fading Channel by Using Diversity and MPSK Modulator

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Abstract: *Wireless communications is a type of data communication that is performed and delivered wirelessly. This is a broad term that incorporates all procedures and forms of connecting and communicating between two or more devices using a wireless signal through wireless communication technologies and devices.Now-a-days the requirements of wireless communication are to have high voice quality, high data rates, multimedia features, lightweight communication devices etc. But the wireless communication channel suffers from much impairment. One of them is fading which is due to the effect of multiple propagation paths, and the rapid movement of mobile communication devices. In a typical wireless communication environment, multiple propagation paths often exist from a transmitter to a receiver due to scattering by different objects. Signal copies following different paths can undergo different attenuation, distortions, delays and phase shifts. So, this is necessary to reduce the problem of fading, but not at the cost of additional bandwidth. This paper deals with the performance enhancement of Rayleigh flat fading channel by reduction of Bit Error Rate.*

Keywords: Communication, Fading, Diversity, Fading channels, Wireless Communications, WLAN

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