Abstract

This paper simulates a BER for OFDM system by using the wavelet transforms rather than using the Fourier transforms which reduce the BER for the same SNR. The coding algorithm using the convolutional coding and hamming coding in a series concatenated levels for wavelet based OFDM when applying the AWGN channel. This proposed coding improves the system performance. The mathematical formula for the BER in this system is deduced. The results show a decreased value of BER for the proposed coding algorithm.

References

Improve the Performance of DWT-OFDM System over Selective Fading Channel" IEEE, 2006
15. ACKNOWLEDGMENTS
16. Thanks to my god to finish this work. A great thanks to El-Azhar university Electrical department.

Index Terms

Computer Science Information Sciences

Keywords

OFDM; BER; SNR; AWGN; DWT; IDWT; QAM