Abstract

This paper proposes a cryptography technique based on two dimension 2D chaotic system and DNA sequence. The 2D chaotic map generates two artificial DNA sequences S1 and S2 to get a cipher message by encrypting the plain message using the first sequence S1. The sender uses the second sequence S2 to hide the cipher message randomly in a real third sequence S3 that is selected from DNA database. The hamming code approach is applied on the original message M to ensure reliable secret communication. The proposed approach provided a more security method compared to previous approaches.

References

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**Index Terms**

Computer Science Algorithms

**Keywords**

DNA Cryptography Chaotic maps and Hamming code.