INTEGER WAVELET TRANSFORM BASED DIGITAL SIGNATURE SCHEME FOR IMAGE AUTHENTICATION

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Abstract

A perceptual image hash function maps an image to a short binary string based on image's appearance to human eye   and has applications in image indexing, image authentication and watermarking. In this paper we discuss an integer wavelet transform based digital signature scheme for image authentication. The scheme extracts hash from the original image; the hash is encrypted using chaotic signals generated using logistic mapping to get the digital signature. The initial values of logistic mapping are taken as private keys. The authenticity and integrity is verified by comparing the generated signature with the received signature of the image.