Abstract

Image authentication techniques have recently gained great attention due to its importance for a large number of multimedia applications. Digital images are increasingly transmitted over non-secure channels such as the Internet. Therefore, military, medical and quality control images must be protected against attempts to manipulate them; such manipulations could tamper the decisions based on these images. To protect the authenticity of multimedia images, several approaches have been proposed. These approaches include conventional cryptography, fragile and semi-fragile watermarking and digital signatures that are based on the image content. The aim of this paper is to present emerging technique for image authentication. It also introduces the new concept of image content authentication and discusses the most important requirements for an effective image authentication system design. Methods which are described provide strict or selective authentication, tamper detection, localization and reconstruction capabilities and robustness against different desired image processing operations. [1]


Index Terms

Computer Science
Pattern Recognition
**Keywords**

- cryptography
- digital signature
- wavelet
- content authentication
- structural feature