Abstract

The Paper proposed a comparative analysis of wound patterns for the process of recognition whether the wound is stabbed wounds using any sharp metals or accidental wounds. The analysis is on the basis of characteristics of wounds in terms of parameters like shape, size and crime scene. And this paper also presents analysis of different segmentation techniques, possible better combination of features to extract for the recognition and finally analysis on different recognition methodologies. Different schemas of recognition are presented in which combination of different segmentation algorithms, features vectors and two approaches of classifiers, and also the comparative analysis of these schemas is discussed. Based on comparative analysis, the combination of three stage techniques of recognition has given results in diverse. From these schemas of recognition, the structural method has given better results compared to the other schemas on the available database of 500 images of pattern consisting of stabbed wounds and accidental wounds. The authenticated experiments out-turns the superiority of the proposed approach over the other approach considered in this work and also compares and suggest the false positive recognition verses false negative recognition. The
Comparative Analysis of Techniques for the Recognition of Stabbed Wound and Accidental Wound Patterns

The proposed methodology has given better results compared to traditional methods and will be helpful in forensic and crime investigation.

References


**Index Terms**

- Computer Science
- Image Processing

**Keywords**
Classifiers, Features, Patterns, Segmentation, Selection, Wounds.