An Efficient Video to Video Face Recognition using Neural Networks

International Journal of Computer Applications
Foundation of Computer Science (FCS), NY, USA

Volume 170

Number 8

Year of Publication: 2017

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10.5120/ijca2017914924

Abstract

The interpretations at face images are difficult owing to its wide variations like appearance, individual, different facial poses and illumination. In biometrics video based face recovery is vital and this paper proposes an efficient algorithmic mode which achieves high recovery rate. The face recognition system proposed in this paper comprises of three stages video partitioning, feature extraction and neural network for recognition. The video partitioning was based on the changes in scene and feature extraction was carried out by local binary pattern and Principal Component Analysis. The algorithm is tested on four publically available datasets and the experimental results substantially prove that the proposed algorithm achieves higher face recognition rate when compared with the recent related work.

References


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Index Terms

Computer Science  Artificial Intelligence
Keywords

Back propagation neural network, principal component analysis, facial features, Pearson Correlation Coefficient.