Abstract

Effective facial feature is needed to build a robust face recognition system capable of suppress the effect of illumination and pose variation. In this paper, a robust face recognition system is proposed. In the proposed system, two level haar wavelet transform is used to decompose frontal face image into seven sub-image bands. Thereafter eigenface feature is extracted from these bands. The feature is used as input to the classification algorithm based on Back Propagation Neural Network (BPNN). The proposed system has been tested using 150 frontal face samples with illumination and pose variation. The results obtained are very encouraging.

References


Efficient Face Recognition System using Artificial Neural Network


Index Terms
Keywords
Eigenface  Haar Wavelet Transform And Neural Network