

STATISTICAL ANALYSIS OF SKIN CANCER IMAGE –A CASE STUDY

SANTOSH ACHAKANALLI¹ & G. SADASHIVAPPA²

¹M.Tech Student, Department of Digital Communication Engineering, R.V. College of Engineering, Bangalore,
Karnataka, India

²Professor, Department of Telecommunication Engineering, R.V. College of Engineering, Bangalore, Karnataka, India

ABSTRACT

Skin cancers account for more than 40% of all malignancies all over the world, and the incidence continues to rise. This increase is attributed to environmental exposure, principally sunlight. Melanoma is considered the most dangerous type of skin cancer. Early detection and diagnosis depends mainly on important issues, accuracy of feature extracted and efficiency of classifier method. The aim of this paper is to assess what is the role of Image processing in dermoscopy analysis and to determine features of melanoma Images for statistical analysis. The different stages of detection involves- collection of dermoscopic images, filtering the images for removing hairs and noise, segmenting the images using Maximum Entropy Threshold, feature extraction using Gray Level Co-occurrence Matrix (GLCM), and classification using Artificial Neural Network (ANN).

KEYWORDS: Artificial Neural Network, Feature Extraction, Melanoma, Skin Lesion