

Survey on Various Image Compression Techniques Used in Image Processing to Improve the Quality of Image

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Abstract: This paper presents study of assorted lossy compression techniques. The 2 techniques are Wavelet Difference Reduction (WDR) based compression and Singular Value Decomposition (SVD) based compression and SVD based compression reduces the psycho visual redundancies present within the image through rank reduction technique. WDR may be a lossy compression technique. It gains compression by taking the discrete wavelet transform of the input image so encodes the transform values using difference compression method. Singular Value Decomposition (SVD) is one in every of the simplest compression techniques. SVD based compression technique gives better visual quality at higher singular values. Various compression parameters like PSNR, MSE and compression ratio are evaluated for the assorted techniques. During this survey, compare how SVD is applied to colour images, the technique of compression and maintain the standard of the image using SVD and also the algorithm to compress a picture using image processing tool MATLAB and compared the WDR SVD lossy compression techniques.

Keywords: Lossy Compression, SVD, WDR, MATLAB, etc.

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