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Abstract

Image restoration is to improve the quality of a digital image which has been degraded due to various phenomena like blur, noise. An image with uniform motion blur and Poisson noise is considered. Images acquired at different exposure times are obtained and SNR values for each image are calculated. The blurred and noisy images are restored using the pseudo-inverse filter and SNR values are calculated. The images are then analyzed using the Fourier analysis. The RMSE (Root Mean Square Error) values are obtained. The exposure time at which the restoration performance is better, is considered to be the optimal exposure time which results in the better image quality.

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Index Terms

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Keywords