

National Conference on Innovative Research in Science, Engineering and Technology (NCIRSET – 2019) 28TH July 2019, Hyderabad, Telangana, India

CERTIFICATE NO: NCIRSET /2019/ C0719525

A STUDY OF IMAGE PROCESSING IN MACHINE LEARNING AND SATELLITE COMMUNICATIONS

KANDE SHARAD SANDESH

Research Scholar, Ph.D. in Electronics and Communication Engineering, Dr. A.P.J. Abdul Kalam University, Indore, M.P.

ABSTRACT

The satellite image based applications are highly utilized nowadays from simple purposes like vehicle navigation to complex surveillance and virtual environment modeling projects. On increased population rate, the depletion of natural resources is highly unavoidable and it leads to increased threats on natural hazards. In order to protect and overcome the physical losses on devastation of properties, the risk mapping models such as weather forecasts, drought modeling and other hazard assessment models are in need. Though many intelligent risk mapping models do exist, the high level of intelligence needed to predict the real time events is still unresolved. And it leads to increased research efforts on designing intelligent assessment models using more advanced machine learning (ML) schemes for better satellite image interpretation. This paper focuses on bringing a clear understanding on satellite image interpretation methods right from the traditional statistical models to the more recent ML methods through stating the gradual revolution in satellite image analysis.

Keywords: Satellite Communications, Satellite Image Interpretation Methods, Image Processing, Machine Learning,