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Solar activity and Electromagnetic emissions in VHF band acquired from ground base monitors during "Martin Luther King Storm" happened on January 15^{th} and 17^{th} 2005

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Abstract

In this paper , we present a study of electromagnetic emissions in the very high frequency band (i.e.,140-420 MHZ) that are possibly related to preseismic deformation. The ground based monitoring network has been installed in western Greece . The network consists of 4 stations and it has been operating since June 2004. Two anomalous signals were clearly observed on all measuring frequencies (142,178,230,320,390,415 MHz) on 15/01/2005 and 17/01/2005. Their times of occurrence and durations coincide with the peak times and durations of two strong solar flare events detected from

GOES satellite. Fractal spectral analysis using wavelet transforms has been applied to the time series recordings.