Abstract: **A Novel Cloud Detection for Infrared SST Application using VIIRS Radiances**

Prahbat Koner

Infrared SSTs are widely used for different oceanic applications due to their abundance. However, the quality of these SST and data coverage is very much dependent on the applied cloud detection methodology. In this work, a new and novel cloud detection methodology using both spectral differences and radiative transfer calculation will be presented. The quality of the abovementioned cloud methodology will be established using experimental filter, which is already published. The improvement of the quality of sea surface temperature (SST) product and data coverage applying new methodology will also be compared with other operational SST product from VIIRS radiance.