

Interactive comment on "Impact of magnetic storms on the global TEC distribution" *by* Donat V. Blagoveshchensky et al.

Anonymous Referee #1

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The data and observations are interesting. The paper may become acceptable for publication after incorporating the following comments.

1. In addition to the Figures presented, I suggest adding some graphs with the TEC data observation during storm time period together with the average of the observations on quiet days with ± 1 standard deviation.

2. In each graph from Figures 2 to 5, I suggest that the main and recovery phase of each geomagnetic storm be highlighted. For example, include a yellow and gray rectangle on each graph to represent the main and recovery phase of the sto

3. Figure 3: The resolution quality of this Figure is very poor.

4. I suggest that it be discussed, clearly, how each phase of the storms (main and

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recovery phases) affect the ionosphere. The disturbances observed in the ionosphere during the storms were more pronounced during the main phase or recovery phase ???? Does the main and recovery phase affect the ionosphere in the same or different ways depending on the intensity of the storm ??? If necessary: a) include a new section to discuss only what was observed in the ionosphere during the main phase; b) subsequently do the same process for recovery phase.

Interactive comment on Ann. Geophys. Discuss., https://doi.org/10.5194/angeo-2018-4, 2018.