

Radio observation of Perseid Meteor Shower

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Perseid meteor shower was observed with radio wave in Myoko City from Aug 10 to 13.

Then, by comparing our data with Sugimoto's data acquired in Hachioji City and the data collected by YSFH students with visual observation, the credibility of our data turned out to be bad.

A receiver (HRO-RX1a) and an antenna toward to Sabae City were connected each other. They were connected to the laptop. At the same time, meteor shower was observed with visual observation in Myoko city. The amount of meteors in 10 minutes and 60 minutes were tallied up. Each data was compared in correlation coefficient, scatter plot and graph. Observing time was from every 22:00 - 3:00 (next day), on Aug 10th - 12th.

Relations between data acquired in Myoko City with radio observation, one taken with visual observation and Sugimoto's one couldn't be found. Correlation coefficient between radio and visual was 0.27. And one between radio meteor observation in Myoko City and one in Hachioji City was 0.38. It was unable to observe meteor because radio wave was stopped on August 11th and 12th. The amount of meteors between 2:00 and 3:00, Aug 11th was larger than any other period. In that time, there was much background noise. This means sensitivity of the receiver was too high. Sensitivity was changed according to background noise. The timing of changing sensitivity turned out to be incorrect afterward.

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