E059-012 Room: C513 Time: May 30 12:00-12:15

Observation and Mechanism of Lithosphere-Atmosphere-Ionosphere Coupling Associated with Earthquakes

- # Masashi Kamogawa[1], Hironobu Fujiwara[2], Jann-Yenq Liu[3], Yu-Jung Chuo[4], Hideho Ofuruton[5], Toshiyasu Nagao[6], Seiya Uyeda[7], Yoshi-Hiko Ohtsuki[2]
- [1] Dep. of Phys., Tokyo Gakugei Univ., [2] Dep. of Phys., Waseda Univ., [3] Inst. of Space Sci., NCU in Taiwan, [4] Inst. of Space. Sci., NCU in Taiwan, [5] Tokyo Metro. College of Aero. Eng., [6] Earthquake Prediction Res. Center, Tokai Univ., [7] Int'l Frontier Program on Earthquake Res., RIKEN

http://faculty.web.waseda.ac.jp/kamogawa/index.html

Many kinds of observations pointed out the existence of earthquake-related ionospheric. At first, we show that we could reproduce the same results as the previous ionosonde results in Taiwan by using the same method and recent data. Furthermore, we show the development of GPS TEC analysis. The results of the Ionosonde and the other measurements would require the existence of the charged area on the ground surface as one of the possible interpretation. In order to understand the physical mechanism, it is important to investigate the existence of the charged area on the ground surface. On the other hand, there also is possibility to exist the long term oscillation on the ground surface which might be able to be detected by the superconducting gravimeter. We tried to compare these observation results.