



## 專題演講

# Forbidden energetic electrons and their ionizing effect at low latitudes.

Speaker : **Dr. Alla V. Suvorova**

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Time : 106 年 2 月 17 日 星期五 14:00~15:00

Place : 健雄館(科四館)S4-811 教室

摘要/Abstract :

Strong long-lasting enhancements of energetic particles in the equatorial and low-latitude ionosphere over the globe were discovered recently. Our studies revealed that enhanced fluxes of the  $>30$  keV electrons can be a strong source of ionization of the F region at low-middle latitudes. The ionizing effect of energetic electrons can contribute significantly to long-duration positive ionospheric storms. An influence to low-middle latitude ionospheric scintillations was suggested. Being forbidden in the theory of radiation belts, the phenomenon of particle flux enhancements is still very poorly investigated and not completely understood. We have found that the energetic particles are injected to the ionosphere from the inner radiation belt. We are developing a probabilistic model of this phenomenon using statistics of NOAA/POES measurements collected for two solar cycles. The model could be a link in space weather monitoring and forecasting of the low-latitude ionosphere.

※歡迎聽講※

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