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Update of National and International Activities for Space Weather Research and Operation

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The importance of space weather is increasing with glowing ICT technologies in our society. Many actions for improving space weather research and operation are proceeded in national and international. I introduce three topics from them in which we NICT involves as a main actor.

In Japan, "Committee for the advancement of space weather forecast" was established in the Ministry of Internal Affairs and Communications (MIC) and publish a report in June 2022.

Based on this report, NICT will take necessary researches and actions, such as researches toward the actual operation of the new space weather alert criteria established by the WG.

We now started a project to develop and deploy instrument for measuring space environment for safe and stable use of satellite operation, aviation and human activities in space. We plan to develop three kinds of sensors to measure energetic protons and electrons and charging on surface and inside spacecraft.

As an international activity, we contribute to develop space weather information services in WIGOS. NICT provides the ionospheric data with DCPC since January 2016, and registered metadata in OSCAR surface database.