



Institute of Remote Sensing and Digital Earth
Chinese Academy of Sciences

The 11th AOGEOSS Asia Pacific Symposium, Sectional Meeting for TG 7

Summary of Environment Monitoring and Protection(GI-22-TG7)

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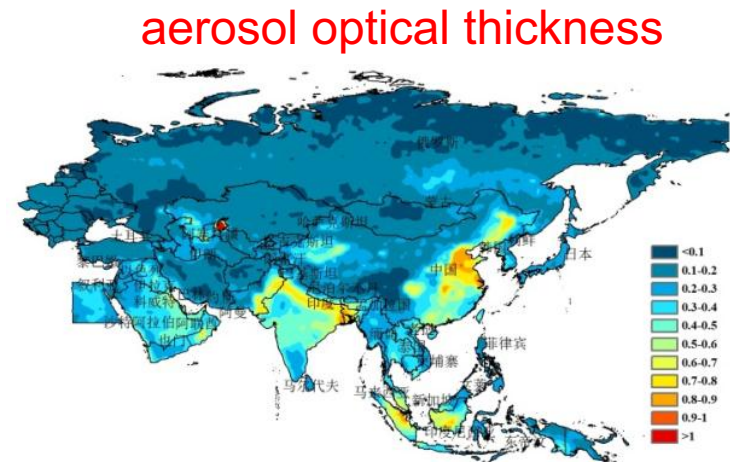
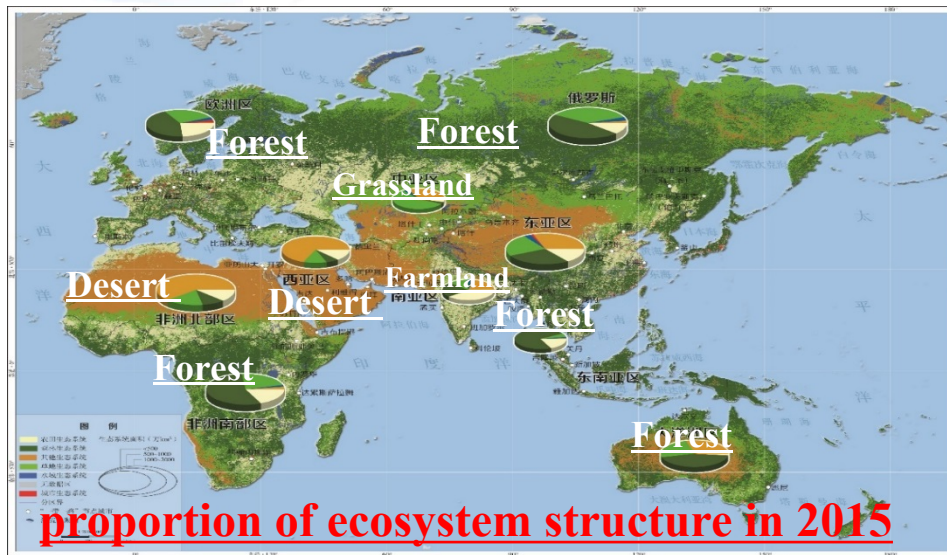
October 26, 2018
Kyoto, Japan



Overview of EMP (WG 7)



Progresses of TG7 are presented by different groups from Australia, China, Japan, and Nepal etc. We recognize that the environment deterioration is a significant challenge issue in AO region, Environmental Monitoring and Protection (EMP) is critical important at national and regional scale.



✓ There is a great disparity for the zonal climate condition, so the regional ecosystem structure is significantly different.

As a new AOGEOSS activity originated from **Global Ecosystem and Environment Observation: Annual Report from China (GEOARC)**, EMP has three sub tasks: Land Cover/Use, Ecological Environment and Atmospheric Environment.

EMP serve for the GEO's priority areas



We discussed the work plan for 2019 directly delivering on GEO's priority areas. EMP directly focuses on terrestrial ecological and atmospheric environment monitoring and protection for SDG 15, also investigates ecosystem responses to natural disasters and climate change closely related to SDG 11, 13 and 17.



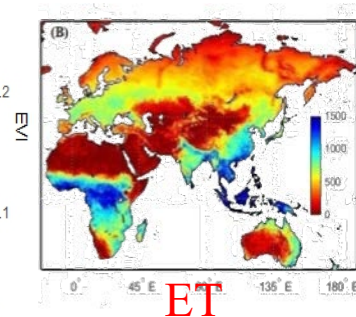
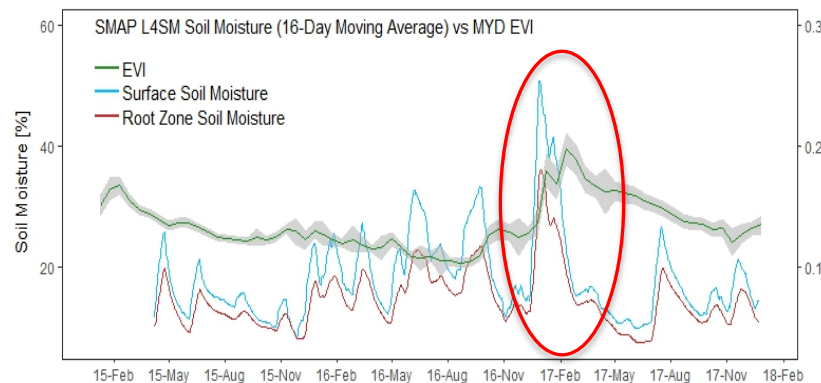
SDG11: sustainable cities and communities;

SDG13: climate action;

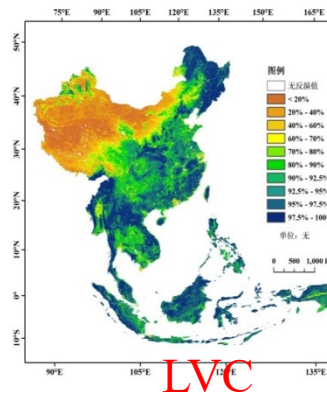
SDG 15: life of land: to protect the terrestrial ecosystem

SDG 17: Partnership for the Goals

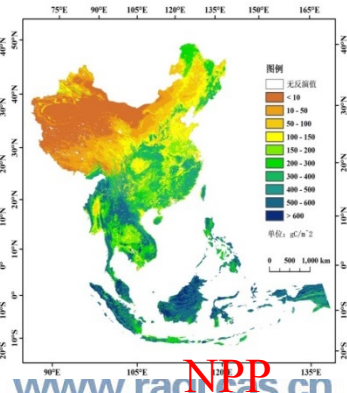
Paris climate agreement within the UNFCCC: As vegetation ecosystem is an important carbon sink, EMP is developing products related to vegetation ecosystem status and variation monitoring. The long time series of quantitative remote sensing products, including the vegetation phenology, LAI, FVC, Biomass and NPP/GPP, are used to study the climate change and the ecological effect and feedback of the ecosystem to the GHG, such as the carbon dioxide.



ET



LVC

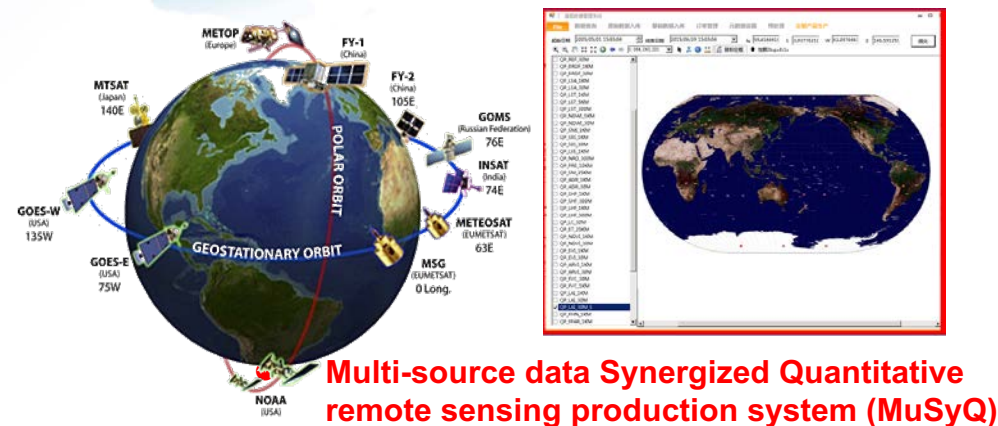


NPP

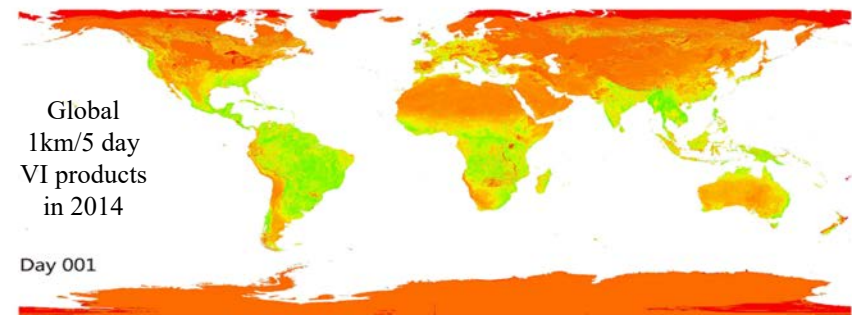
Strengthen the collaboration networks



By integrating multiple source EO data, EMP will not only monitor and assess terrestrial ecological and atmospheric environments, to but also generate annual policy relevant reports to support national governments and international organizations to make evidence-based decisions for environmental protection.



- Global 1km/5 day VI products derived from MODIS, FY3/MERSI multi-source datasets in 2014

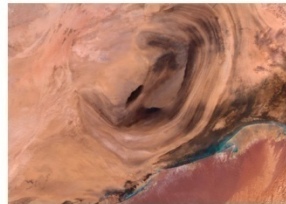


- Global Ecosystem and Environment Observation: Annual Report from China (GEOARC)** Reports and data can download from China GEOSS. (<http://www.chinageoss.org/geoarc/>)



All the EO data sharing, quantitative remote sensing product generation and validation, information analyzing and report composition need all AO partners to strengthen cooperation in the future: **Australia**, Bangladesh, **China**, India, **Japan**, **Korea**, Laos, Mongolia, Myanmar, **Nepal**, Pakistan, Vietnam.

Thanks!



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