

WORLD METEOROLOGICAL ORGANIZATION

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COMMISSION FOR BASIC SYSTEMS
OPEN PROGRAMME AREA GROUP ON INTEGRATED OBSERVING SYSTEMS

INTER-PROGRAMME EXPERT TEAM ON SATELLITE UTILIZATION AND
PRODUCTS

ITEM: 5.4

FIRST SESSION

Original: ENGLISH

GENEVA, SWITZERLAND, 16-19 MARCH 2015

NAEDEX-APSDEU Data Exchange Mechanism

(Submitted by Anthony Rea)

Summary and Purpose of Document

To provide a summary of the last NAEDEX-APSDEU Meeting and the underlying data exchange process.

ACTION PROPOSED

The first session is invited to note the information provided.

DISCUSSION

1. The combined 13th Asia-Pacific Satellite Data Exchange and Utilisation (APSDEU) and 25th North America Data Exchange (NAEDEX) Meeting was held in Guangzhou, China, on 26-28 May 2014. This international data exchange meeting provides an important forum linking meteorological satellite operators with major numerical weather prediction centres. The meetings are not WMO sponsored but the WMO Space Programme attends as an observer.
2. APSDEU-NAEDEX is targeted at reviewing the current exploitation of observational data at all the major operational NWP centres and updating the requirements of all centres for real time access to observational data, principally from satellites. The mechanisms to meet these requirements are also addressed.
3. The meeting was hosted by CMA and was attended by representatives from:
 - Bureau of Meteorology;
 - China Meteorological Agency (CMA);
 - Deutscher Wetterdienst (DWD);
 - European Centre for Medium Range Weather Forecasting (ECMWF);
 - EUMETSAT;
 - Japan Meteorological Agency (JMA);
 - Korea Meteorological Administration (KMA);
 - Météo-France;
 - Meteorological Service of Canada (MSC);
 - National Oceanic and Atmospheric Administration (NOAA);
 - UK MetOffice; and
 - World Meteorological Organization (WMO) Space Programme.
4. The US delegation was smaller than had originally been planned due to unforeseen circumstances. This follows a reduced presence at the previous (2012) meeting due to restrictions on travel for US government employees.
5. This meeting was the third joint meeting of the APSDEU and NAEDEX groups. The merging of the two groups reflects the rising importance of Asia-Pacific satellite operators over the past decade and the recognition, by North American and European parties, that their needs can no longer be fully met by an exchange between themselves.
6. Whilst the scope of the meeting is the exchange of any data of value to numerical weather prediction (NWP), whether as input or for validation, the focus is primarily on the exchange of satellite data between its members. This is due to satellite data making up the bulk of observations assimilated into operational NWP. Most of the meeting attendees represent either data providers or data users, predominantly NWP centres.
7. As the meeting is not WMO sponsored, it can focus on high-level data users and does not need to consider the needs of the full spectrum of capabilities across all WMO members. This allows the group to respond to changing capabilities and requirements rapidly and effectively, with limited bureaucratic overhead.

Conduct of Meeting

8. The APSDEU-NAEDEX meeting format is based on the framework developed for NAEDEX, which has evolved over the previous 24 sessions. The NAEDEX framework is formalised and outcome-focused. Firstly, each participant gives an update on activities within their own agency; this is followed by a review of actions from the previous meeting. The crux of the NAEDEX meeting is the tabling of consolidated formal data requirements from each side of the Atlantic; i.e. from Europe and North America. Each requirement is discussed in turn with the aim of fulfilling the requirements through agreed action items (Figure 1 - NAEDEX Process).

9. The APSDEU-NAEDEX joint meeting was conducted based on the NAEDEX framework, but with three sets of capabilities and requirements, spanning operators and users across Europe, North America and the Asia-Pacific. The meeting commenced with presentations from satellite operators and users, with the main focus being the tabling and addressing of user requirements across European, North American and Asia-Pacific satellite and surface-based observing capabilities (Figure 2 - Modified APSDEU-NAEDEX Process).

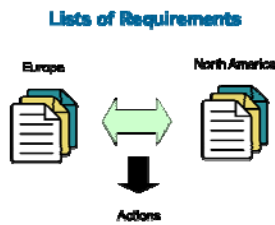


Figure 1 - NAEDEX Process

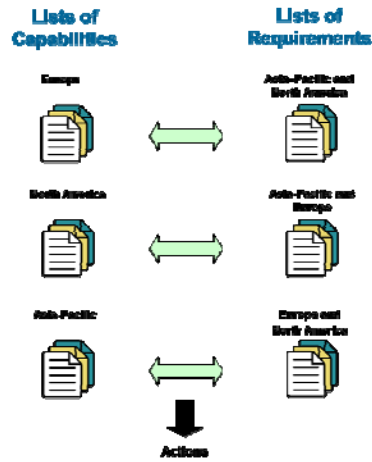


Figure 2 - Modified APSDEU-NAEDEX Process

10. The meeting presentations can be found at:
http://www.nws.noaa.gov/data_exchange_mtgs/ under the heading:
 APSDEU-13 NAEDEX-25 CMA, Guangzhou China May 2014