

Results from the Sustained Arctic  
Observing Network Workshop  
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# Background

- WMO attended 2nd Sustained Arctic Observing Network (SAON) Workshop hosted by the SAON Initiating Group (IG) and the Canadian International Polar Year (IPY) Secretariat
- Overall purpose of three SAON Workshops: to seek ways to sustain the enhanced observing networks established and coordinated as part of IPY
- Each Workshop addressed specific topic moving towards recommendations for the Arctic Council on an approach to achieve a sustained Arctic Observing Network.
- Large increase in observations in the Arctic as a result of IPY, mostly through IPY Projects
- However, there is not yet an overall network complete with an information infrastructure
- Need for a sustained infrastructure is one important area that the SAON Workshops are addressing

# SAON-II Presentation Outline

- WMO Structure
- WMO's Global Observing System (GOS)
- WMO Integrated Global Observing Systems (WIGOS)
- WMO Information System (WIS)
- WIGOS , WIS and IPY
- WMO EC Panel of Experts on Polar Observations and Research

# SAON-II

- WMO described WIGOS and noted that the new Global Cryosphere Watch would be one of its component
- SAON-II participants strongly agreed on the need to utilize existing infrastructures wherever possible including the ones that involved standards for observations, codes, protocols, metadata and quality assured products

# Further progress

- Canada intends to second an expert to the WMO Secretariat to develop the Global Cryosphere Watch (GCW)
- Many facets to GCW from research, observing networks, data exchange infrastructure, modelling to services with involvement by many Departments in the Secretariat including WCRP that prepared the IGOS Cryosphere Theme Report), WDS, CLW and OBS
- Recommendation that the seconded expert be jointly assigned to work in the RES and OBS Departments and include interactions with the other relevant Departments
- Concerned Departments working together to develop a concept paper outlining their respective expected results and deliverables

# WIGOS ,WIS and IPY

- Observing networks established or improved during IPY should be kept in operational mode for as many years as possible to provide data for the detection and projection of climate change (WMO EC–LVI Recommendation, June 2004)
- IPY projects provide great opportunity for the integrated observations of the polar environment. IPY should contribute to a suitable WIGOS Pilot Project for the integration of WMO observing systems and linked to one of the main Expected Results of the WMO Strategic Plan (WMO Cg-XV Recommendation, May,2007)

# Increased reports in IPY period

The successful start of IPY resulted in an increase in the number of reports from traditional observational networks of atmosphere in Polar Regions (according to results from WWW monitoring from 1 to 15 July 2007 compared with the same period in 2006)

## In the Arctic

- the number of synoptic stations transmitting 90-100% of expected reports increased by 8 stations located on the coast and islands of the Euro-Asian sector,
- the number of BUOY reports has increased by 1096

## In the Antarctic

- the number of synoptic stations increase by 2 stations,
- the number of BUOY reports increased by 18,150 (five times more)

# IPY data management activities

- At present a major impediment to effective IPY implementation is the lack of any formal support or system that would ensure quick, easy and reliable discovery of and access to IPY data, as well as the lack of a formal pathway for IPY scientists to archive their data and make available metadata to ensure their future access and archival
- WMO Inter-commission Task Group (ITG) on IPY supported the proposal by the IPY JC to consider the Canadian ArcticNet portal and its associated searchable metadata as an IPY portal, which would meet most of the needs of a great majority of the IPY scientists to provide access to data through searchable metadata related to their projects
- Noting that these activities would be highly useful as a Pilot Project to demonstrate an operational national contribution to WIS, the ITG recommended that WIS should work closely with ArcticNet to ensure it became fully compliant with the WIS portal and metadata standards



# Legacy of IPY observing systems

IPY legacy should be built upon the surge observational programmes and converted into sustainable long-term research and monitoring capabilities. ITG requested relevant technical commissions to be actively involved in this process within their areas of responsibility through the expert teams and panels related to the evolution of the GOS, WIS development, AMDAR, WHYCOS and GAW implementation. In strongly supporting the JC roadmap development towards creation of a legacy embracing IPY observing systems, the ITG urged WMO Members to participate in this activity

# WMO EC Panel of Experts on Polar Observations and Research

- Successful implementation of IPY 2007-2008 will result in a legacy of enhanced polar observing systems and research of polar environment
- WMO EC at its upcoming session (June 2008) will consider a new Panel of Experts on Polar Observations and Research to:
  - ensure coordination of acquisition, exchange, and archiving of observational data from polar regions in compliance with WIGOS and WIS requirements
  - provide a WMO high-level Partnership in activities aimed to secure IPY observing system Legacy in close communications with operational agencies in Member-countries and international organizations such as the Arctic Council, International Arctic Science Council, the Antarctic Treaty Consultative Meeting, the Scientific Committee on Antarctic Research and others

**Thank you**