



The International Polar Year – IPY

www.ipy.org

The concept of the International Polar Year 2007-2008 is of an international programme of coordinated, interdisciplinary scientific research and observations in the Earth's polar regions.

IPY themes:

1. To determine the present environmental status of the polar regions by quantifying their spatial and temporal variability.
2. To quantify, and understand, past and present environmental and human change in the polar regions in order to improve predictions.
3. To advance our understanding of polar - global interactions by studying teleconnections on all scales.
4. To investigate the unknowns at the frontiers of science in the polar regions.
- 5. To use the unique vantage point of the polar regions to develop and enhance observatories studying the Earth's inner core, the Earth's magnetic field, geospace, the Sun and beyond.**
6. To investigate the cultural, historical, and social processes that shape the resilience and sustainability of circumpolar human societies, and to identify their unique contributions to global cultural diversity and citizenship

In early November 2004, **the community was invited to submit** to the IPY International Programme Office (IPO), **by 14 January 2005, brief expressions of intent for IPY activities.** In the event, a very large number **(870+)** of EoI's were submitted.

The Joint Committee has assessed all the EoI's at its March 7-9 2005 meeting, and from this assessment has **identified a number of potential IPY topics** (or missions) that can be linked back to the original **six IPY themes.** **EoI's can be clustered** around these 50+ topics and one or more **potential lead** projects identified for most of the topics.

New submission under the “umbrella” of the pertinent lead project, or even independently was called on May 2005. The **first deadline** was **June 30, 2005**; **the last** one will be on **January 16, 2006**.

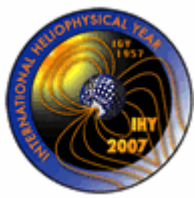
At this stage there is only a [Preliminary IPY Planning Chart](#).

For what concerns **COST296 main interests** the reference lead project is **ICESTAR-IHY (Interhemispheric Conjugacy in Geospace Phenomena and their Heliospheric Drivers)**. Both **ICESTAR** and **IHY** are independent projects, **joint** together only **for the IPY initiative**. ICESTAR (Interhemispheric Conjugacy Effects in Solar-Terrestrial and Aeronomy Research) is funded by SCAR (Scientific Committee on Antarctic Research) <http://www.siena.edu/physics/ICESTAR/>.

The lead contacts of ICESTAR-IHY are **Richard Harrison and Kirsti Kauristie**.

COST296 Participation to IPY initiative ICESTAR-IHY (**from what we know...**):

Alfonsi Lucilla
De Franceschi Giorgiana
Kersley Len
Pryse Elery
Romano Vincenzo
Stamper Richard
Zolesi Bruno



The International Heliophysical Year – **IHY**

<http://ihy.gsfc.nasa.gov/>
<http://www.ihy.rl.ac.uk/index.shtm>

To mark the 50th anniversary of the highly successful International Geophysical Year (IGY) of 1957, several groups world-wide are making plans for multidisciplinary and multinational campaigns, mainly as part of an International Polar Year (IPY). As part of this, it is proposed that there be an **International Heliophysical Year (IHY) to provide some co-ordination of the many solar, heliospheric and near-Earth spacecraft and ground-based observatories for specific scientific campaigns.**

International Heliophysical Year European General Assembly (January 10-13, 2006, Paris)
http://calys.obspm.fr/IHY/IHY_colloque/

IHY Scientific Instruments And Observatories:

If you would like to see an observatory or instrument visit:

http://orpheus.nascom.nasa.gov/~zarro/ihy/ihy_obs.html

IHY started to collect ideas for “Coordinated Investigation Programme (CIP)”, i.e. scientific research or activities to be performed during IHY. The CIPs will form the basis for the IHY scientific plan.

To submit a CIP: http://www.ihy.rl.ac.uk/CIP_form.htm

COST296 participants already involved (*from what we know...*):

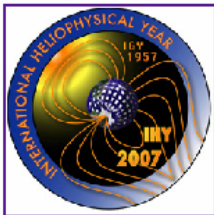
Lucilla Alfonsi

Giorgiana De Franceschi

Vincenzo Romano

Richard Stamper

Bruno Zolesi



IHY SCIENTIFIC INSTRUMENTS AND OBSERVATORIES



Note: If you would like to see an observatory or instrument added to this list, please contact [Barbara J. Thompson](#).

Additionally, if you are willing to serve as an instrument representative for planning and coordination purposes, please let us know.

We will need at least one contact for each instrument.

 to [IHY Science Coordination Database](#)

[Graphics-free version of this page](#)
(For slower download speeds)

SPACECRAFT OR OBSERVATORY	INSTRUMENT OR OBSERVATION TYPE	INSTRUMENT EXPERT/ PLANNING CONTACT
 <p>Advanced Composition Explorer (ACE)</p>	Cosmic Ray Isotope Spectrometer (CRIS)	Eric CHRISTIAN
	Electron, Proton and Alpha Monitor (EPAM)	Eric CHRISTIAN
	Magnetometer (MAG)	Chuck SMITH
	Solar Energetic Particle Ionic Charge Analyzer (SEPICA)	Eberhard MOEBIUS
	Solar Isotope Spectrometer (SIS)	Eric CHRISTIAN
	Solar Wind Electron Proton Alpha Monitor (SWEPAM)	Eric CHRISTIAN
	Solar Wind Ion Composition Spectrometer (SWICS)	Eric CHRISTIAN
	Solar Wind Ions Mass Spectrometer (SWIMS)	Eric CHRISTIAN
 <p>Aragats Space Environmental Center (ASEC) of Armenia</p>	Neutron Flux Monitor, Multidirectional Muon Monitor and Surface Scintillation Array	Ashot CHILINGARIAN





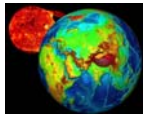
Other related initiatives...

eGY

<http://www.egy.org/index.html>

The Electronic Geophysical Year, 2007-2008 (eGY). **eGY focuses on themes of electronic data location and access, permission and release of data, conversion of data into modern digital form, data preservation, capacity building, particularly in developing countries, and outreach.** Promoting the development of a network of **Virtual Observatories** is a central feature of eGY. [Example of VO is the VGMO-Virtual Global Magnetic Observatory](#)

For Europe the representatives are still to be decided...



CAWSES

<http://www.bu.edu/cawses/>

CAWSES is an international program sponsored by SCOSTEP (Scientific Committee on Solar-Terrestrial Physics) established with an **aim of significantly enhancing our understanding of the space environment and its impacts on life and society.** The main functions of CAWSES are to help coordinate international activities in observations, modeling, and applications crucial to achieving this understanding, to involve scientists in both developed and developing countries, and to provide educational opportunities for students of all levels.

The CAWSES international coordination office at Boston University is funded by the U.S. National Science Foundation (NSF).

Proposals/Questions

Other proposals from COST296 to join IPY initiatives?

The case for a COST296/COST724 joint CIP to be submitted to IHY?

What about the eGY?





A Virtual Global Magnetic Observatory: VGMO.NET as a Component of the Worldwide “Data Fabric”

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