

International Cooperation

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IMAGE, 1982 - 1994

International Cooperation

- The Landsat programme inaugurated a long and successful history of international cooperation in satellite-based earth observation
- It also established the basic rules, still valid today, for satellite-based imagery acquisition and distribution

International Cooperation

A/ Principles for satellite-based imagery:

- Unlimited data acquisition
- Direct data transmission to non US receiving stations*
- Non discriminatory data distribution
- Open, worldwide catalogue of available data

* Not planned initially but introduced following a request from Canada during the UNISPACE I Conference here in Vienna in 1961

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A/ Principles for satellite-based imagery:

- These principles were later adopted by most government Earth observation satellite programmes (France, India, ESA, Japan, etc.)
- These basic principles were incorporated by COPUOS in the draft resolution on remote sensing principles discussed in 1985 and 1986 and adopted by the UN General Assembly in December 1986 (UNGA Resolution 41/65)

International Cooperation

B/ International Cooperation

- “Principal Investigator” programme open to the international research community as part of the initial ERTS-1 (Landsat-1) and Landsat-2 programmes
- Establishment of the Landsat Ground Station Operators Working Group (LGSOWG) gathering on a regular basis all the agencies owning and operating a Landsat direct receiving station

International Cooperation

B/ International Cooperation - Towards CEOS

- At Canada's initiative (CCRS), a space agency level multilateral meeting on remote sensing is organized in Ottawa, Ontario on 8 & 9 May 1980.
- This "First Multilateral Meeting on Remote Sensing" establishes two international coordination committees on Earth Observation: CLOS and CORSS.

International Cooperation

B/ Towards CEOS

- The CLOS (Coordination of Land Observation Satellites) committee includes NASA, CNES, and NASDA and meets in November 1980.
- The CORSS (Coordination of Ocean Remote sensing Satellites) committee includes CCRS, ESA, ISRO, NASA and NOAA, NASDA and meets for the first time in May 1982.

International Cooperation

B/ Towards CEOS

- These two committees work in parallel until 1984
- In 1984, the « Panel of Experts on Remote Sensing from Space », set up by the G7 working group on « Growth, Technology and Employment » recommends to merge the two committees
- The new committee is called CEOS (Committee on Earth Observation Satellites)
- CEOS holds its first meeting on 24 & 25 September 1984 in Washington DC

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B/ CEOS

- CEOS is a Space Agency level coordination committee
- It works on a non exchange of funds, best effort basis
- It does not have any permanent staff but NASA/NOAA, ESA and JAXA act as a permanent secretariat
- CEOS chair rotates every year, the current chair hosting the annual CEOS plenary
- It is still very much alive today and has grown considerably (30 full members and 22 associate members)

International Cooperation: Up to date list of the 30 full members of CEOS

- ASI (Italy)
- CAST (China)
- CDTI (Spain)
- CNES (France)
- CONAE (Argentina)
- CSA (Canada)
- CRESDA (China)
- CSIRO (Australia)
- DLR (Germany)
- European Commission (EU)
- European Space Agency
- Eumetsat
- GISTDA (Thailand)
- INPE (Brazil)
- ISRO (India)
- KARI (Rep. of Korea)
- MEXT/JAXA (Japan)
- NASA (USA)
- NASRADA (Nigeria)
- NRSCC (China)
- National Satellite Meteorological Center (China)
- NSAU (Ukraine)
- NOAA (USA)
- Netherlands Space Office (Netherlands)
- Roshydromet (Russia)
- Roskosmos (Russia)
- SANSA (South Africa)
- Tubitak Uzay (Turkey)
- UKSA (United Kingdom)
- USGS (USA)

International Cooperation

B/ CEOS

- CEOS continue to be very active and acts mostly today as the space agencies' input to the Group on Earth Observation (GEO) established in 2003
- The success of CEOS owes very much to the international cooperation principles established with the Landsat programme in the 1970s and 1980s

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Thank you for your attention