

INTEGRATED GLOBAL WATER CYCLE OBSERVATIONS (IGWCO) THEME AND ITS CONNECTIONS TO CEOP

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CEOS AND IGOS-P: EARTH OBSERVATION COORDINATION MECHANISMS

Mechanisms for coordinating and promoting Earth observations:

- Committee on Earth Observation Satellites (CEOS)
44 space agencies and Earth observation data users
- Integrated Global Observing Strategy-Partnership (IGOS-P)
14 international and UN organizations, including CEOS
- Group on Earth Observations and the Global Earth Observing System of Systems

IGOS Partners



IGWCO LEADERSHIP



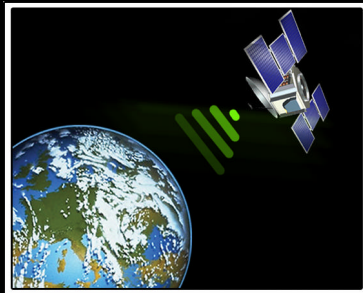
IGOS-P DECIDED THAT THE BEST WAY TO ADDRESS THE GEOGRAPHICALLY COMPLEX NATURE OF HIGH-CO2 OBSERVATION THEMES.



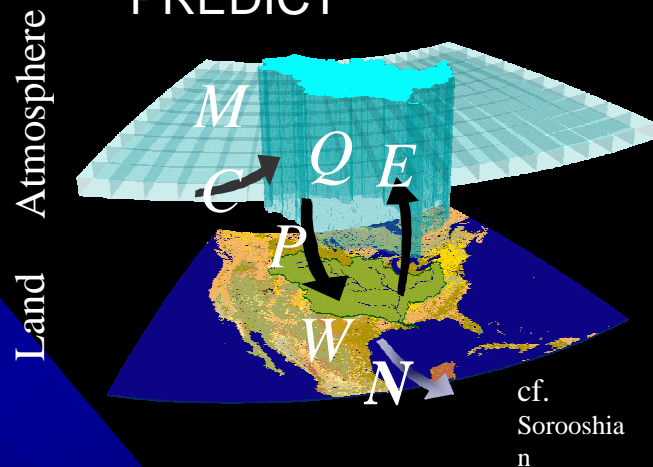
UNDER DEVELOPMENT

A VISION THAT MOTIVATES IGWCO COLLABORATION: IMPLEMENTING A NEW APPROACH TO WATER MANAGEMENT IN OUR LIFETIMES THAT IS FACILITATED BY OBSERVATIONS AND IMPROVED PREDICTION SYSTEMS.

OBSERVATIONS



IMPROVED CAPABILITY
TO ASSIMILATE AND
PREDICT



INTEGRATED DECISION
SUPPORT SYSTEMS

A DECISION PROCESS

INFORMATION INPUTS:
- QUALITY AND COVERAGE
- SPACE/TIME SCALE
MATCHES

EXTERNALITIES:
- VULNERABILITIES
- TIME FRAME FOR
DECISIONS
- ECONOMIC/SOCIAL
FACTORS

SUBJECTIVE FACTORS:
- VALUES
- SOCIO-ECONOMIC
PRESSURES

DECISION
PROCESS

ACTION

Towards a Global Observing System of Systems



IGOS-P IS DEVELOPING
THE STRATEGY FOR
INTEGRATING
OBSERVATIONAL
SYSTEMS

GEO IS DEVELOPING
A PLAN FOR A GLOBAL
EARTH OBSERVING
SYSTEM OF SYSTEMS
(GEOSS)

GEWEX, ESSP, ETC ARE
CARRYING OUT THE RESEARCH
NEEDED TO DEVELOP A PREDICTION
AND INFORMATION SYSTEM

THE INTEGRATED GLOBAL WATER CYCLE OBSERVING THEME (IGWCO) HAS THE FOLLOWING OBJECTIVES:



1. Provide a framework for guiding decisions on priorities and strategies regarding water cycle observations for:
 - Monitoring climate variability and change,
 - Effective water management and sustainable development of the world's water resources,
 - Societal applications for resource development and environmental management,
 - Specification of initial conditions for weather and climate forecasts,
 - Research directed at priority water cycle questions
2. Promote strategies that facilitate the processing, archiving and distribution of water cycle data products

CEOP HAS PLAYED A MAJOR ROLE IN:

- 1) THE LAUNCH OF IGWCO (CEOP WAS ADOPTED BY CEOS AS A PRECURSOR TO A WATER CYCLE THEME).
- 2) THE VISIBILITY OF IGWCO (CEOP IS HIGHLY VALUED IN CEOS AND IGOS-P CIRCLES. IGWCO GAINS VISIBILITY BY ASSOCIATION WITH CEOP).
- 3) THE IMPLEMENTATION OF IGWCO (IN SOME CASES CEOP ACTIVITIES HAVE PROVIDED A BASE FOR IGWCO ACTIVITIES SUCH AS CAPACITY BUILDING. IT HAS ALSO HELPED TO BRING SOME PARTNERS INTO IGWCO).

THE IGWCO UMBRELLA

INTEGRATED
PRECIP

SOIL
MOISTURE

WATER
QUALITY

VARIABLES

GROUND
WATER

RUNOFF

CEOP

INTEGRATION

OUTREACH
& POLICY
LINKS

CAPACITY
BUILDING

GLOBAL
WATER
SYSTEM

APPLICATION

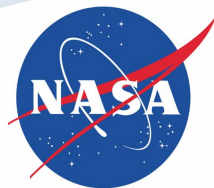
	GOALS	LEADERS	ACTIONS	COMM TO DEADLINES	FUNDING SOURCE
CEOP II	FINAL	Toshio Koike Sam Benedict	Phase II plan accepted*	YES	JAXA, MEXT
INTEG. PRECIP	YES	Phil Arkin	WORKSHOP HELD	Some	NO
GWSP INFO.	FAST TRACK PROJECTS	Charles Vorosmarty	Fast track Activities identified	Driven by GWSP Agenda	NASA seed Money
ISMWG	YES	Tom Jackson	Coordination Ongoing	YES	NASA
WATER Q/ INDICATOR	DRAFT	Pilar Cornejo, Steve Greb	Workshop Proposals under Development	SOME	GEO
CAP BLDG	YES	Michael Hales/ Ana Medico	CB Workshop in BA in Oct. '05	YES FOR ERN ASIA	NOAA, JAXA, WMO, GEO UNESCO, ETC



CREACIÓN DE CAPACIDADES EN AMÉRICA LATINA

"LA OBSERVACIÓN DE LA TIERRA AL SERVICIO DE LA GESTIÓN DE LOS RECURSOS DE AGUA"

Octubre 26-28, 2005, Buenos Aires, Argentina



Programa hidrológico internacional



WHAT'S NEW FOR IGWCO IN 2006

- NEW LEADERSHIP IN THE IGWCO EXECUTIVE WITH WMO TAKING THE LEAD.
- ONE AND POSSIBLY TWO CAPACITY BUILDING WORKSHOPS (INCLUDING ONE IN SOUTHEAST ASIA).
- THE LAUNCH OF A JOINT GARS-UNESCO-IGWCO GROUNDWATER WORKING GROUP.
- A MARCH 2006 WORKSHOP (AT ESTEC) ON IN-SITU SOIL MOISTURE MEASUREMENTS FOR VALIDATION PURPOSES.
- A SPECIAL SESSION ON SPACE OBSERVATIONS FOR WATER MANAGEMENT AT THE WORLD WATER FORUM IV MEETING.
- COORDINATION WITH GEO ON SEVERAL WORK PLAN GOALS INCLUDING ONE OR TWO WATER CYCLE WORKSHOPS IN LATE 2006.
- A GEO CP ON THE WATER CYCLE