

UNEPnet/ Mercure: UNEP's "Technology Focussed" Initiatives

Presentation to GSSD/IW4
Knowledge Networking and
Technology Collaboration,
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MIT, USA



FOR MORE INFO...

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Which Mick Wilson?

- The representative for UNEP's information technology initiatives (Mercure, UNEPnet)
- The member of the steering committee for UNEP/IUCN ECOLEX - environmental law info.
- The proxy for the GEF and UNEP/Technology, Industry and Economics activities on Knowledge Management Network
- The one of only 3 speakers from non-OECD countries

UNEP

- United Nations Environment Programme
not the "Energy" as GSSD says!
- "The Environmental Conscience of the United Nations system"
- Headquarters in Nairobi, Kenya
- Regional and out-posted offices in 8 countries

UNEP foci

- Environmental Assessment and Early Warning
 - global and regional
 - sectoral (air, water, land)
- Industry, technology and economics
- Policy development -> environmental conventions
- Policy implementation -> impact of conventions, national reporting
- Africa (UN)

Topics

- Environmental Law
- GEF partnerships
- Communications infrastructure
- GSSD questions

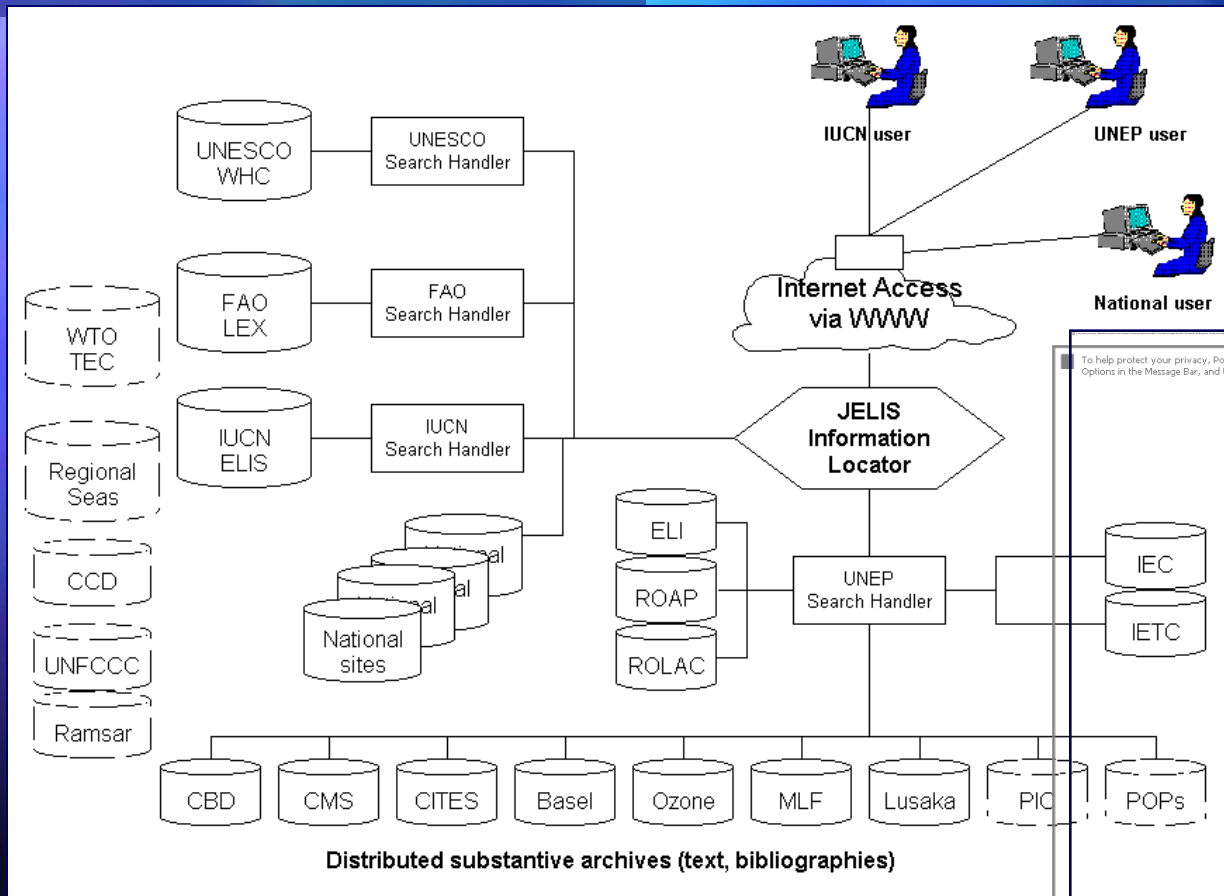
Substantive bits

- UNEP/IUCN ECOLEX
- UNEP/GEF Knowledge Management

UNEP/ IUCN Environmental Law

- ECOLEX ([www/ecolex.org](http://www.ecolex.org))
- Currently has 200+ MEAs
- Links
 - Env. Law metadata
 - IUCN Env. Law Centre, Bonn
 - with full text
 - UNEP Nairobi
- Other repositories welcome
 - FAO etc.

UNEP/IUCN ECOLEX - 2000 and beyond



UNEP/ IUCN Environmental Law

- Simple, low-impact interface
- Efficient delivery
 - pre-generated; disk is cheap
- Multi-lingual metadata
 - not consistent e.g. sometimes German
- Only English full text at present
- Other UN languages being prepared

UNEP/ IUCN Environmental Law

- Simple, practical outputs
 - To what MEAs is country 'X' a signatory
 - What countries have ratified MEA 'Y'
 - What year was the Montreal Protocol adopted and how many countries have signed it?

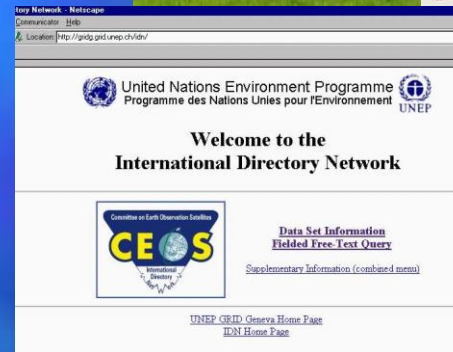
UNEPnet/ Mercure:



Everyday uses include

5000+ users

- General internet
- Video-conferencing
- Conferencing
- Publishing (e.g. SoE reports)
- Search/Research
- Emergencies
- (Tele-education)



Mercure Concept



Mercure Concept



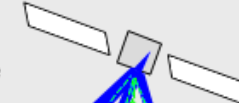
Ground stations delivered and installed by Austria, Belgium, Norway, Spain, Switzerland and United Kingdom
Startup Sep 96, handover Nov 97

Atlantic Ocean Intelsat



North-south axis Geneva-Nairobi, views east & west
via Atlantic and Indian Ocean satellites
9 'A'-class stations (384 kb/s) at 7 sites
9 'B'-class stations (16-64 kb/s) at 9 sites
'B' stations link via 'A'-stations in their hemisphere

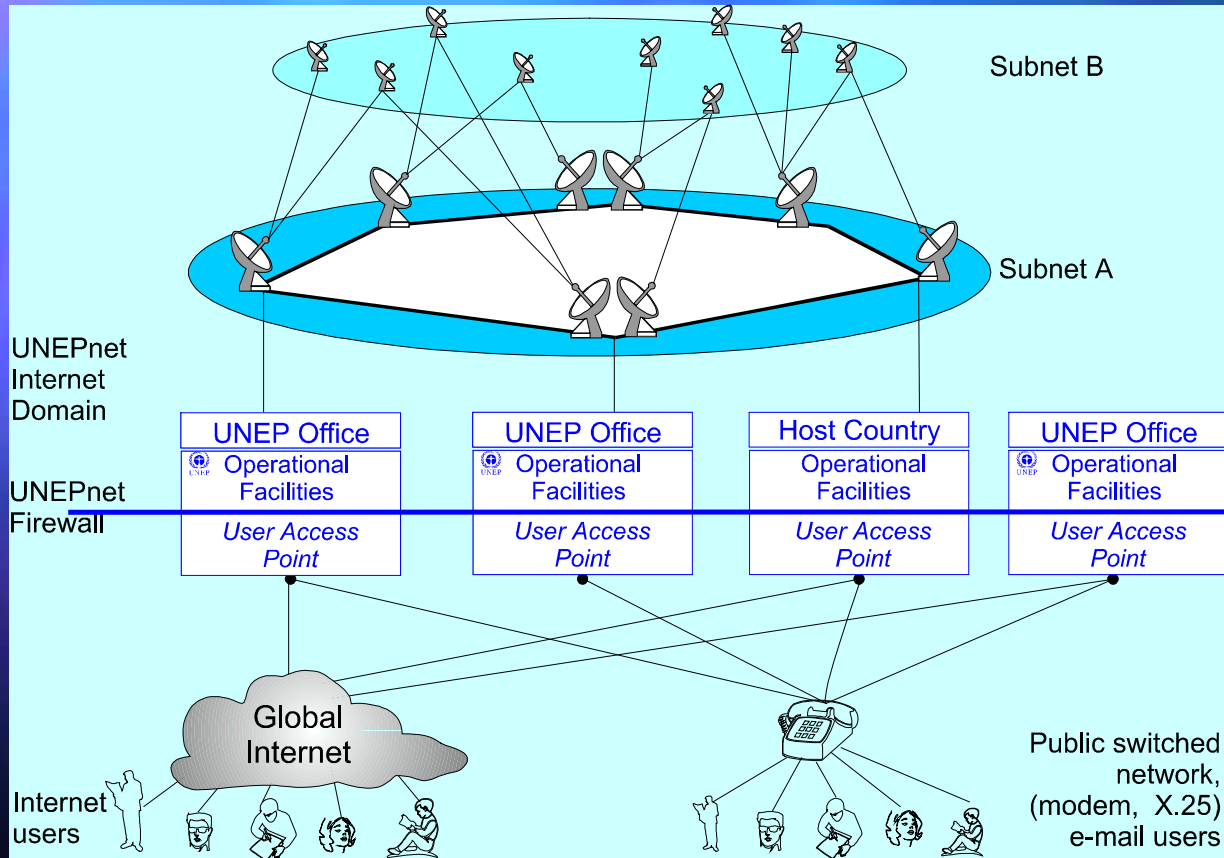
Indian Ocean Intelsat



Network control in Leuk, Switzerland
Combination of permanent
and demand-assigned links
IP routing implemented by UNEP
Capacity reserved for UNEP



UNEPnet Concept



- Characteristics:**
- internet (TCP/IP) autonomous system
 - limited access (non-transit) network
 - internal operational functions as well as public access to environmental information
 - local service via distributed service points
 - CEOSnet affiliate

Applications/ utilization

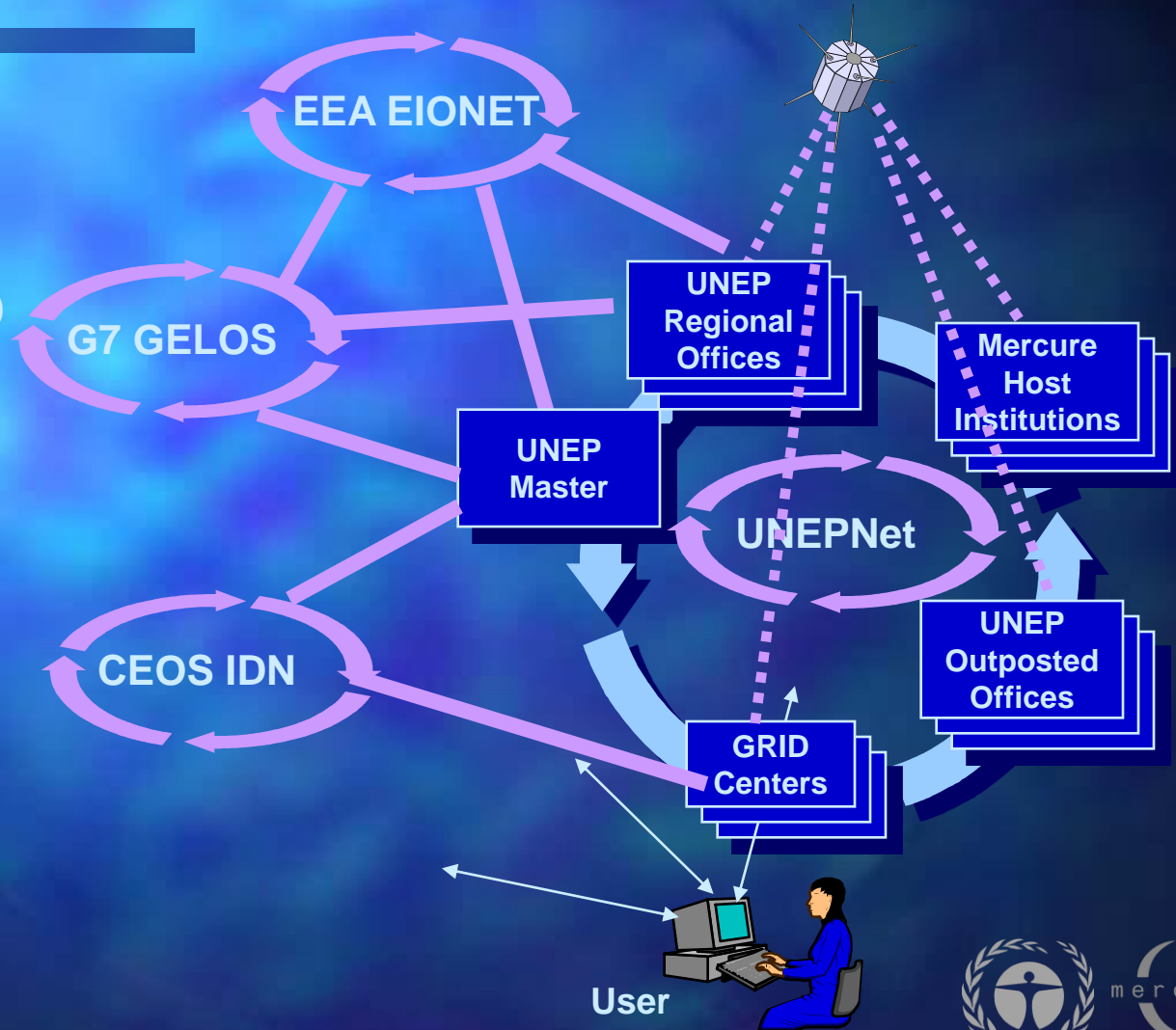
- SAWA
- SATcast
- CEOS/CILS
- G7/ENRM GELOS
- UNEP/IUCN JELIS
- + more to come

UNEPnet - distributed content and synchronization

“CILS” internet technology toolkit, funded by DLR 1995-99

“GELOS” internet toolkit developed through G7/G8 Information Society project 1995-1999

EU support 1999 - 2004?



Partners

- Undertake joint or complementary projects
 - ESA - SAWA and SATcast
 - IUCN - ECOLEX (Env. Law)
 - ITC Netherlands - tele-education
 - CEOS - networks, interoperability, metadata
 - IDN, CILS, INFEO, EOS-DIS, IMS
 - IGOS Partners - info. systems
 - G7/G8 - GELOS (now with EEA - CDS)
- Austria, Norway (self-funded players)
- Switzerland, Netherlands (Staff)
- EC, Germany (s/w funding)

What's Wrong with this Picture?



A number of things!

- 700 connections for 30 million people (Kenya)
- 40+ countries are missing esp. SIDS
- No suggestion of cost of use (\$80+/user-hour in Hanoi)
- No suggestion of level of usage (e.g. Somalia, Ethiopia)
- No suggestion of policy for usage (e.g. Cuba, Singapore)

UNEPnet/ Mercure and GSSD:

- We can help mirror GSSD sites
- We are interested adopting (or adapting) the GSSD “donut” concept - is it worth it?
- We want to discuss substantive linkages especially:
 - ECOLEX environmental law (with IUCN)
 - GEO Global Environment Outlook
 - Global Environment Knowledge Management (with GEF)

Question: where is GSSD going?

- How will it be decentralized?
 - Better network strategy
 - better for building trust
- How to achieve Quality Assurance?
- Must stay based on static HTML technologies
 - content and relationships bound to age
 - maintenance nightmare
- Is the GSSD “ring” adaptable?

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