A glimpse from the IETF in Vancouver

The ecosystem of Internet organizations seems to be in flux in the year of the renewed IANA contract and an upcoming conference on future International Telecommunication Regulation (ITR) included the related ITU’s World Telecommunication Standardization Assembly 2012. Standardization efforts related to domain names include the much debated new attempt to create a successor for the port 43 Whois protocol.

Is Weirds weird?

There have been attempts before to improve, reform or substitute the Whois protocol. At the IETF in Vancouver the working group on “Web Extensible Internet Registration Data Service” (weirds) had their first full working group session only to realize that at least for TLD registries there still is a lot more to do with no guarantee if, how and how fast the new standard will be implemented in the future.

Andy Newton from the North American Number Registry ARIN and author of a weirds candidate proposal recalled the commitment of the group to not allow the more complicated domain names stuff to slow down the new WHOIS standardization, currently advanced by the much smaller number registry organizations. Differences are highlighted, for instance, in a dispute about the design of a data model.

A study prepared by a group of CNNIC, Nominet, .br and ICANN and presented in Vancouver illustrates the vast differences of data sets kept in different domain name registries currently °C with some classes of data objects potentially not even revealed yet, due to lack of structure or legal barriers to give away information about data. After all there are huge differences on privacy questions, participants observed.

When the WEIRDS chairs Olaf Kolkman (NLnetLabs) and Murray Kucherawy (Cloudmark) announced the members of a design team, a debate about a lack of balance started: ccTLDs were not appropriately represented there with only one (CNNIC) out of eleven, one list member complained.

Potential solutions for authentication were said to be difficult for the WG to pick from, if it wanted to avoid being too prescriptive and meddle with implementation issues. On the other hand some participants warned that too long a list to choose from for authentication, for example, would result in operators to use this as an excuse to not implement. With most items discussed rather controversially, the chairs did refrain from looking for early decisions.

Crossing IETF and ICANN boundaries

The WEIRDS work looks like an interesting indicator for shifting relations between the I-organizations (IETF, ICANN, IANA).

Both, ICANN and the IETF have started to work on a Whois successor protocol, with ICANN driven -at least in part- by the political agenda of some governments to grant "better", more accurate Whois
information. ICANN’s Security and Stability Advisory Committee (SSAC) now has presented its own work on a data model in report No 54 already.

While work on the standards (and data model?) is officially in the hand of the IETF, the ICANN data model certainly will become important in the upcoming work of the new IETF design team, with so far three of eleven members participating in both efforts.

A proposal to potentially use weirds.arpa for a bootstrapping mechanism for information about the whois concept in use and/or as a trust anchor might also involve IANA, which, on the other hand, is requested to stay away from policy decisions, according to the new IANA contract.

While the new IANA contract is no agenda item at the IETF in Vancouver, it is a topic of intensive background discussions. Especially additional “touch points”, for the first time also at the protocol assignment part, led to talks about potential reactions from the IETF side. Both, ccTLDs and IETF, are considering potential adjustments of IANA, if necessary a closer grip on the IANA functions that they respectively use. While for the protocol work the IETF has obviously been assured that the new IANA contract meant no change to current practice, the new, additional touch points were there, one source said.

**IETF endowment and IETF modern Global Standard Paradigm**

The relationships of the IETF with two more I-organizations were the topic of two initiatives presented during the IETF Plenary in Vancouver by IETF. The Open Internet Endowment got its “family start” announced by ISOC president Lynn St. Amour and IETF Chair Russ Housley.

With contributions to be collected first from IETF members and later in the year from general public, the endowment is planned to become a new additional funding resource to secure the IETF budget, which still is heavily subsidized by the ISOC (ISOC paying around 2 out of the 5 Million US Dollar IETF budget).

The endowment, while being primarily used for the IETF, also allows its board to sponsor other “open Internet” initiatives if the sponsor had not dedicated his contributions exclusively to the IETF. While there were some three dozen contributions over the first day, participants pointed to technical problems with the website and credit card payment. There were also questions about the choice of an endowment (as opposed to a foundation) and potential consequences for sponsors from countries outside the US.

The declaration on a “Modern Global Standard Paradigm”, on the other hand, is a statement addressed to the International Telecommunication Union (ITU) and will be presented at the World Telecommunication Standardization Assembly (WTSA) in November. IETF joined with the World Wide Web Consortium (W3C) and the IEEE to develop the so-called paradigm document. These three organizations by signing this document in the next weeks agreed to commit to the basic principles for the development of open standards.

The high-level principles included are due process and appeals process, consensus and balance, transparency, openness and access to everybody. Yet the text still has to be worked on, Housley acknowledged during the plenary meeting in Vancouver. In the current version the standardization bodies will commit to Fair, Reasonable and Non-Discriminatory (FRAND) license model. At the IETF currently there was no obligation to license IETF standards according to FRAND, though, participants warned at the meeting. The non-involvement of the IETF community in developing the paradigm was also criticized by some.
A research team at the Cooperative Association for Internet Data Analysis (CAIDA) in cooperation with universities in Italy and the European IP Address Registry provider RIPE creatively used the measurement of malware background noise in the networks of Egypt and Libya to get more insights about filtering methods. Libya’s approach had been much more sophisticated, said CAIDA-researcher Alberto Dainotti during the presentation of his findings at the Internet Research Task Force session in Vancouver this week. IRTF had awarded one of the annual Applied Networking Research Prizes to Dainotti. The malware traffic analysis had revealed that, in addition to taking down routes, Libyan authorities had also more focused packet filtering and jamming of satellite traffic. Dainotti said that ongoing work was aiming to establish an automatic alarm system, which would send an alert notice when malware traffic background noise signals went down, be it as a result from censoring attacks or natural disasters.

In a BoF session potential remedies for filtering or kill-switch attacks were discussed with Dutch academic Johan Pouwelse (TU Delft), who is asking for standardization of several components for public-interest microblogging services that should allow for anonymous, secured and potentially non-Internet-connectivity-dependent posts. The topic was welcomed by IETF participants, but a gap analysis was necessary to define what protocol work was still necessary for that “censor-free media”, the BoF agreed.

A high-level view on the state of “Netistan” finally was given by Google’s Chief Technology Advocate Michael Jones. Jones said that, being the state with the largest population on earth, its netizens still had to become aware of their power. Outages and the reversal of the SOPA, PIPA legislative efforts (and potentially the ACTA failure in Europe) could nevertheless be seen as one instance in which regions of Netistan used their power somehow.