



# Update on ITU and WSIS Activities Related to Spam and Cybersecurity

#### OECD Spam Task Force Meeting Paris, France 3 October 2005

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## WSIS Thematic Meeting on Cybersecurity

- During the first phase of WSIS, number of recommendations were made in Declaration of Principles and Plan of Action that relate to building confidence and security in the use of ICTs and promotion of a global culture of cybersecurity
- In framework of its activities to implement the Plan of Action, ITU recently hosted a WSIS Thematic Meeting on Cybersecurity
- Event website at <u>www.itu.int/cybersecurity/</u> provides links to final agenda, background papers, presentations, electronic contributions, Chairman's Report and complete audio archives of meeting
- June 28: <u>Countering Spam Day</u>
  - Considered developments since June 2004 Thematic Meeting on Countering Spam
- CD-ROM provides materials from both 2004 Countering Spam and 2005 Cybersecurity/Spam Thematic Meetings as well as a related materials from ITU's daily work programme on these topics







#### General Points from Chairman's Report

- No clear consensus as to whether we are winning or losing war on spam.
- Spam under constant mutation from annoyance to general cybersecurity threat
- Threat vector shifting to new platforms such as mobile and Voice over Internet Protocol (VoIP) networks.
- Spam should be seen in broader context of "unwanted or unsolicited communications".
- Suggests a generic policy and regulatory approach will eventually emerge







# **Evolution of Zombie Botnets**

- Spammers are now more effectively leveraging zombie botnets, Spamhaus says that approximately 70% of spam is sent through zombies
  - These zombie botnets, besides relaying spam, are also being used to launch <u>Distributed</u> <u>Denial of Service (DDOS)</u> attacks







# Legislation

- On the legislative front, a great deal of experience has been gained as to the commonality, differences and effectiveness of different approaches of national anti-spam legislation.
- ITU commissioned study prepared by Harvard Law School entitled <u>A Comparative Analysis of Spam Laws: the Quest for Model Law</u> analyzes the level of consensus and differences among extant laws and made some preliminary recommendations for inclusion in national spam legislation.
- As spam has evolved into a more criminal activity, legislation is not particularly helpful unless tied to effective enforcement
- This enforcement is often expensive, complex, and crossjurisdictional in nature.







# **Technical Measures**

- On technical front, although there has been a lot of related activity, no single standard had yet emerged from number of proposals (e.g., <u>SPF</u>, <u>Sender ID</u>, <u>DKIM</u>, <u>CSV</u>, <u>CLEAR</u>).
- Note these technical proposals do not directly stop spam—rather they provide mechanism to authenticate sender thus preventing spammer's server from masquerading as another source
- As Internet converges with telephone network, in particular toward Next Generation Networks (NGN), a series of public network infrastructure requirements are being defined in NGN standard capability sets that reflect rapidly changing evolution of national policy and regulatory requirements for IP-enabled or NGN services
- Includes intelligence layer infrastructure for IP-enabled NGNs (roughly equivalent to SS7 for PSTN) whose global capability set and functionality is much more critical than for legacy PSTN networks
  - Broad international cooperation is necessary to define requirements







# **Consumer Awareness**

- We've seen a number of consumer education and industry players about anti-spam measures and Internet security practices:
  - Safer Internet initiative in EU
  - Click Spam in France
  - Netherlands initiatives
  - UK Get Safe Online
  - Online OnGuard in the US
- Question is how we can make generic version of these activities so that they can be re-leveraged by developing economies who do not have the resources to create from scratch







## ITU-T World Telecommunications Standardization Assembly (WTSA)

- Resolution 50: Cybersecurity
  - Evaluate existing and evolving new Recommendations with respect to their robustness of design and potential for exploitation by malicious parties
  - Raise awareness of the need to defend against the threat of cyber attack
- Resolution 51: Combating spam
  - Report on international initiatives for countering spam
  - Member States to take steps within national legal frameworks to ensure measures are taken to combat spam
- Resolution 52: Countering spam by technical means
  - ITU-T Study Groups, in cooperation with other relevant groups, to develop as a matter of urgency technical Recommendations on countering spam







#### Related ITU-T Study Group 17 Activities

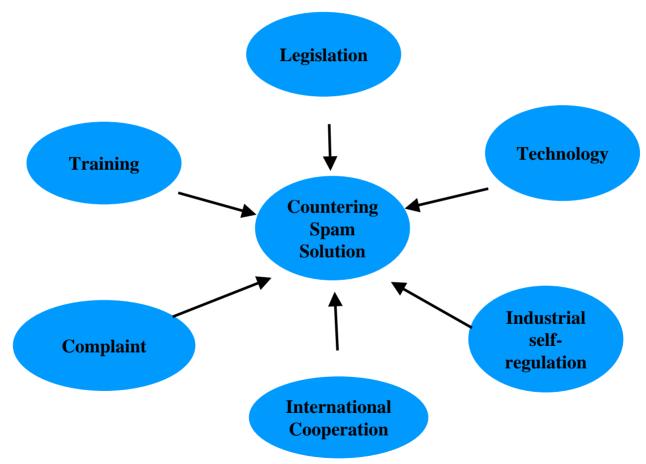
- Q.6/17: Cybersecurity
  - > X.sds, spyware/deceptive software
- Proposed Q.17/17: Countering SPAM
  - > X.gcs, Guideline on countering SPAM
  - > X.fcs, Technical framework for countering SPAM
  - > X.tcs, Technical means for countering SPAM







#### Draft Guideline Document on Countering SPAM (X.gcs)









# WSIS Prepcom 3: 19-30 Sept 2005: Spam and Cybersecurity

- Chapter Three: Internet Governance, 3b) Public Policy Issues Related to the Use of the Internet
  - We seek to build confidence and security in the use of ICTs by strengthening the trust framework. We reaffirm the necessity to further promote, develop and implement in cooperation with all stakeholders a global culture of cyber-security, as outlined in UNGA Resolution 57/239 and other relevant regional frameworks. This culture requires national action and increased international cooperation to strengthen security while enhancing the protection of personal information, privacy and data. Continued development of the culture of cyber-security should enhance access and trade and must take into account the level of social and economic development of each country and respect the development-oriented aspects of the Information Society. (Agreed)







# Chapter 3: Spam

- Chapter Three: Internet Governance, 3b) Public Policy Issues Related to the Use of the Internet
  - We resolve to deal effectively with the significant and growing problem posed by spam. We take note of current multilateral, multistakeholder frameworks for regional and international cooperation on spam, for example, the APEC Anti-Spam Strategy, the London Action Plan, the Seoul Melbourne Anti-Spam Memorandum of Understanding and the relevant activities of the OECD and ITU. We call upon all stakeholders, to adopt a mult-pronged approach to counter spam that includes, inter alia, consumer and business education; appropriate legislation, law enforcement authorities and tools; the continued development of technical and self regulatory measures; best practices; and international cooperation. (Agreed)
- Note there is nothing in this multi-pronged approach that cannot be argued to apply more generally to promoting global cybersecurity







# World Telecommunication Day 2006

- Each May 17th, ITU celebrates World Telecommunication Day, which celebrates ITU's founding in 1865 and its history of "helping the world communicate"
- Promoting Global Cybersecurity is 2006 theme:
  - ITU plans related awareness-raising campaign
  - Countering Spam awareness will be part of this...
  - Formulating our ideas and welcome your input...







# Links and References

- ITU Activities related to Cybersecurity and Thematic Meeting
  <u>www.itu.int/cybersecurity</u>
- ITU Activities on Countering Spam and Thematic Meeting
  - www.itu.int/spam
- ITU-T Activities on Spam (Study Group 17)
  - www.itu.int/ITU-T/studygroups/com17
- ITU-D Activities on Spam
  - www.itu.int/ITU-D/treg/
  - www.itu.int/ITU-D/e-strategies
- Anti-spam laws and authorities worldwide
  - http://www.itu.int/osg/spu/spam/law.html
- World Summit on the Information Society
  - www.itu.int/wsis

