A Multistakeholder Effort to Reduce Spam – The Case of Brazil

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Internet Governance in Brazil

The Brazilian Internet Steering Committee – CGI.br
- a multi-stakeholder organization
- created in 1995 to coordinate all Internet related activities in Brazil

Among the diverse responsibilities reinforced by the Presidential Decree 4.829, it has as attribution:

- to propose policies and procedures related to the regulation of Internet activities
- to recommend standards for technical and operational procedures
- to promote studies and recommend technical standards for the network and services’ security in the country
CGI.br and NIC.br Structure

GOVERNMENT (Appointed)  I. E.  CIVIL SOCIETY (Elected)
1 – Ministry of Science and Technology (Coordination)
2 – Ministry of Communications
3 – Presidential Cabinet
4 – Ministry of Defense
5 – Ministry of Development, Industry and Foreign Trade
6 – Ministry of Planning, Budget and Management
7 – National Telecommunications Agency
8 – National Council of Scientific and Technological Development
9 – National Forum of Estate Science and Technology Secretaries
10 – Internet Expert

Executive Branch

Administrative Support
Legal Counsel
Public Relations

Domain Registration
IP Assignment

Cert.br

Security and Incident Response

Studies and Surveys About ICT use

Cetic.br

Internet Engineering and New Projects

Ceptro.br

W3C
Brazilian Office

11 – Internet Service Providers
12 – Telecommunication Infrastructure Providers
13 – Hardware and Software Industries
14 – General Business Sector Users
15 – Non-governmental Entity
16 – Non-governmental Entity
17 – Non-governmental Entity
18 – Non-governmental Entity
19 – Academia
20 – Academia
21 – Academia
Anti-Spam Initiatives in Brazil – Historical Perspective

• Early 2000’s: Network operators changed contracts and established Acceptable Use Policies (AUP) forbidding spam
  – drastic reduction in spammers’ operations in the country (that used to sell open relays and hosting services for international spammers)

• Mid 2000’s: Brazil continually rising in the rankings of top spamming countries
  – needed to determine which really were the problems:
    • Local spammers?
    • Bullet proof services for international spammers?
    • Open relays?
    • Open proxies and/or infected machines (botnets/zombies)?
    • Bad practices of e-mail marketing?
  – need to involve multiple stakeholders to determine which policies and technical actions could actually be effective, depending on the problem

• 2005: Anti-spam Task Force (CT-Spam) created by CGI.br
  – brought together technical community, ISPs, network operators, academia, e-mail marketing associations, legal advisors and regulators
CT-Spam Initial Findings

• CERT.br abuse reports showed that
  – more than 80% of spam was due to open proxies (maybe botnets)
  – almost all remaining spam was direct delivery (probably botnets)

• We established the SpamPots Project and produced independent metrics about how the Brazilian Broadband Infrastructure was being abused by spammers who used open proxies and botnets
  – result: international spammers, abusing Brazilian networks to send spams to victims in other countries

• There was a residual amount of complaints from bad e-mail marketing practices

• There were no indications of big spammers’ operations inside the country anymore (hosting advertisement, selling delivery services)

• Decision was reached to start several working groups to act on each specific problem
Antispam.br Initiatives

Antispam.br is maintained by NIC.br/CGI.br, with technical coordination from CERT.br.

Main activities since 2005:
Port 25 Management working group (discussed in length in a bit)
Study on legal framework
  – evaluated bill proposals in Congress
  – created a report with a new text of legislation proposed to Congress
Email Marketing Self Regulation initiative (http://capem.org.br)
  – Involved ISPs, e-mail marketing associations and consumer rights organizations
  – Builds upon the success of self regulation framework already in place for other marketing sectors (e.g. CONAR - http://www.conar.org.br)

Best practices and awareness
  • ISPs and Telecom operators (http://www.antispam.br/admin/)
    – technical best practices: DKIM&SPF (DMARC), Greylisting, etc
  • End users
Anti-Spam and Security Awareness

Antispam.br website and cartoon videos about spam and security
http://www.antispam.br/videos/english/

“Secure Internet” Portal
- Points to all public awareness initiatives in the country
http://www.internetsegura.br/
Internet Security Best Practices for End Users

PT: “Cartilha de Segurança para Internet”
http://cartilha.cert.br/

ES: Translation in partnership with ISOC:
“Cartilla de Seguridad para Internet”
http://cartilla.cert.br/

• support material for trainers and teachers
• booklets, stickers and slides distributed to parties interested in promoting security campaigns
Port 25 Management Working Group

Why to create a working group as part of Antispam.br?

• Common Goal: reduce the abuse of the Internet infrastructure in Brazil by spammers
  – reduce direct delivery and the abuse of open proxies
  – Brazilian networks were being affected negatively

• The adoption of port 25 management needed to be articulated among different sectors, mainly
  – E-mail providers needed first to move mail submission to a different port (587/TCP – RFC 6409) and migrate all users
  – Then Telecom companies would be able to block outgoing port 25 traffic
Port 25 Management Working Group Members

Who was involved

• Coordinated by CGI.br – with technical coordination by CERT.br/NIC.br
• Initial players: Telecoms, ISPs and Associations of these sectors, Anatel (Telecom regulator), the CGI.br representatives for these sectors
• Players identified in further meetings: Federal Prosecutor’s Office, Consumer Defense organizations and Ministry of Justice
• A formal implementation agreement was signed
  – CGI.br, NIC.br, Anatel, Telecoms and ISP Associations
  – The consumer protection associations formally supported the agreement
Main Results

- Port 25 management: Brazil is not listed anymore as a top source of spam on lists that keep track of direct delivery / open proxy originated spam
- E-mail marketing self-regulation: the board created after the code of practice was adopted is working with the major marketing companies
- Awareness campaigns: this is an ongoing effort, specially considering the security aspect
- Legislation proposals: still being discussed in Congress – the proposed text was the base for a new text now being considered
References

• Antispam.br – Summary of Anti-Spam Efforts in Brazil
  http://www.antispam.br/en/

• Internet Society Anti-Spam Technology & Issues
  http://www.internetsociety.org/spam

• Managing Port 25 for Residential or Dynamic IP Space: Benefits of Adoption and Risks of Inaction

• OECD Anti-Spam Toolkit of Recommended Policies and Measures

• SpamPots Project
  http://honeytarg.cert.br/spampots/
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