

REMARKS AT THE DIGITAL BROADBAND MIGRATION: EXAMINING THE INTERNET'S ECOSYSTEM

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I want to thank Dale Hatfield, Phil Weiser, and Silicon Flatirons for the opportunity to speak at this year's conference. As I talked with Dale and Phil about the topic for my remarks today, I thought I would be a one-person reaction panel, highlighting some of my key takeaways from the conference and talking about how the agenda at NTIA this year might address some of these issues. I knew even before the conference began that speaking here was going to be a daunting task, but nonetheless, I do have some observations about the conference, and hopefully some broader thoughts to leave you with as we end this year's conference. None of this is fully baked, but hopefully you will at least find it to be worth chewing over.

My first observation: I think it is really misleading to call the Internet an ecosystem.¹ So, even though I have signed papers that refer to the Internet ecosystem, I'm changing my mind about that.² Yes, there are a lot of complex interrelationships as we would see in any natural ecosystem.³ But, here's the big difference for me: I associate the dynamics

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1. See Lawrence E. Strickling, Assistant Sec'y of Commerce for Commc'ns and Info., Remarks at The Media Institute: The Internet: Evolving Responsibility for Preserving a First Amendment Miracle, (Feb. 24, 2010), *available at* http://www.ntia.doc.gov/presentations/2010/MediaInstitute_02242010.html.

2. See, e.g., Letter from Lawrence E. Strickling, Assistant Sec'y of Commerce for Commc'ns and Info., to Julius Genachowski, Chairman, Fed. Commc'n Comm'n, National Broadband Plan, GN Doc. No. 09-51, Jan. 4, 2010, *available at* http://www.ntia.doc.gov/filings/2009/FCCLetter_Docket09-51_20100104.pdf.

3. See LA.-MISS. GULF COAST ECOSYSTEM RESTORATION WORKING GRP., EXEC.

of a natural ecosystem with two important concepts. First, the presence of some set of biological laws—some known to us, such as natural selection; others, perhaps not so apparent—that, second, lead to a balance or some sort of equilibrium state. Even when we have disturbances in these natural ecosystems, like a devastating fire or the introduction of some foreign invasive species, these natural operations and laws kick in and bring that ecosystem back to some equilibrium state.⁴ Maybe the new equilibrium is different from what there was before, but there is always a sense that you are moving towards a balance or an equilibrium.⁵

I think applying that concept to the Internet leads us to perhaps accept the idea that the Internet is really self-regulating in the same way. That there is some natural order that will always emerge no matter how the system might be disturbed, and that policymakers should just leave the Internet alone.⁶ I suggest that unless some of you share the view that my colleague, Danny Weitzner, raised for the sake of argument earlier at this conference—that there is really no societal value to protecting the Internet in its current state, or in any particular state—that this idea to leave the Internet alone is just simply wrong.⁷ And I would suggest to you that none of you believe it anyway.

We are not talking about the Internet as some national park or wilderness area that we are just going to set aside and let evolve on its own. It is not a forest of computer servers with mountain ranges of content just waiting to be protected.⁸ In fact, I'm going to stop with these analogies to nature because I just don't think they're helpful any longer.

And that brings me to my second point. When we talk about Internet governance, we should really look at the Internet as an agglomeration of human actors.⁹ It is a large and growing social

OFFICE OF THE PRESIDENT, ROADMAP FOR RESTORING ECOSYSTEM RESILIENCY AND SUSTAINABILITY (Mar. 2010), *available at* <http://www.whitehouse.gov/sites/default/files/microsites/ceq/100303-gulf-coast-roadmap.pdf>.

4. See John Tschirhart, *General Equilibrium of an Ecosystem*, 203 J. OF THEORETICAL BIOLOGY 13 (2000).

5. *Id.*

6. See Philip J. Weiser, *The Future of Internet Regulation*, 43 U.C. DAVIS L. REV. 529, 542 (2009).

7. *Id.* at 531 (suggesting that government oversight of the Internet will ensure that the social and economic benefits of the Internet will not be impaired by disputes between private actors).

8. See B.G., *The Internet is not an Ecosystem*, ECONOMIST: BABBAGE, (Apr. 12, 2010, 18:21), http://www.economist.com/blogs/babbage/2010/04/verizon_and_its_new_metaphor. *But see* INTERNET SOC'Y, INTERNET ECOSYSTEM (2009), *available at* <http://www.itu.int/osg/csd/wtpf/wtpf2009/ieg/january-meeting/bg/isoc-factsheet-internet-ecosystem.pdf>.

9. Weiser, *supra* note 6, at 539; *see also* Susan P. Crawford, *The Internet and the Project of*

organization. There are no natural laws to guide it. And there most certainly is no natural equilibrium or balance point because the human actors that are participating in this organization all are demanding that laws or rules be created to govern all these relationships.¹⁰ And we individually are always trying to twist these laws or rules to our advantage; that's just human nature.¹¹

So let's not kid ourselves. Based on what I have heard in the last day-and-a-half, I think that I can state with high confidence that every interest group or industry segment in this room today, and here this weekend, wants a rule that protects its prerogatives. If you are a content owner, you want to be allowed to take action with ISP's against copyright infringers. If you are a small backbone provider, you want rules to govern Internet peering arrangements. If you are a user, you want net neutrality. And even the network owners, while they may be against the specifics of net neutrality, the fact is that the absence of net neutrality does not mean there's a void; it just means that the network owners get to make their own rules about whether and when to discriminate.¹² So there's still a regime, it's just not one that has been developed and is regulated by the government directly.¹³

All of this leads me to my third point, which is that given all of the human actors involved in the Internet, with all of their competing interests, governments have to be involved at some level, to help sort out these interests. Now, I am one who would subscribe to the view that this involvement does not have to necessarily be the existing regulatory schemes, many of which people characterize as heavy-handed. And I certainly agree with comments made yesterday that the existing structures are too slow, too inaccurate, and just not properly equipped to deal with all these issues. But there is a huge risk that in the absence of some level of oversight we are going to lose the one thing that the Internet must have—not just to thrive, but to survive—and that is the trust of all of the actors on the Net.¹⁴ We know if users can't trust the

Communications Law, 55 UCLA L. REV. 359, 360 (2007) (“The Internet’s value to people does not come from the nature of the connections we use to access it but, rather, from the human communications and relationships made possible by its universal interconnectivity and flexibility.”).

10. Weiser, *supra* note 6, at 538 (suggesting that the welfare of all Internet stakeholders depends on oversight to “assure all parties the opportunity to deal fairly with one another and build trust that a stable equilibrium will continue”).

11. *Id.* at 540-41.

12. See KALEB SIEH, SILICON FLATIRONS, THE 2010 DIGITAL BROADBAND MIGRATION: EXAMINING THE INTERNET'S ECOSYSTEM (2010).

13. See Weiser, *supra* note 6, at 542 (explaining that in the early days of the Internet, social norms that developed were enforced by private actors without government oversight).

14. See, e.g., ORG. FOR ECON. CO-OPERATION AND DEV., SHAPING POLICIES FOR THE FUTURE OF THE INTERNET ECONOMY 22 (2008) (affirming that in light of the importance of the Internet to the global economy, building and maintaining trust in the

Net—that their information will be protected, that they are being sent to the website that they want to be sent to—they are not going to use it.¹⁵ We know from the content providers that if their content is not being protected on the Internet, they will threaten to stop using it.¹⁶ We know that if foreign governments do not trust the Internet governance mechanism, they may threaten to balkanize the domain name system, which will potentially jeopardize the worldwide reach of the Internet.¹⁷ So, this issue of trust applies to every actor on the Internet.¹⁸

Policymakers need to think about how to define their role and what their ultimate goal ought to be: to really focus on preserving and maintaining trust in the Internet. Unfortunately, it is easier for government agencies—particularly regulatory agencies—to organize to prevent bad conduct, as opposed to nurture good conduct. So, we have the Department of Justice Antitrust Division, but we do not have the equivalent agency that’s charged with being *for* trust or building trust. At NTIA, we are not a regulatory agency, but we think we have a role to play to help build and preserve this trust. And our agenda for this year is designed to refocus NTIA on Internet and information policy.¹⁹ There’s an “I” in our name—remember, it’s NTIA—but people have always viewed our agency as more involved with the “T” piece, not the “I” part. But let me just go over some of our initiatives for the year.

Here are some of the questions that we will be addressing:

Privacy Policy

How can we enable the development of innovative new services and applications that will make intensive use of personal information while at the same time ensuring that users are protected from harm and unwanted

Internet and related information and communications technology networks must be a key policy area) [*hereinafter* SHAPING POLICIES].

15. *Id.* at 26.

16. See WORKING GRP. ON INTELLECTUAL PROP. RIGHTS, INFO. INFRASTRUCTURE TASK FORCE, INTELLECTUAL PROPERTY AND THE NATIONAL INFORMATION INFRASTRUCTURE 10 (1995) (highlighting the increased risk of piracy in the online environment, which may discourage authors from making their works available through this market mechanism).

17. See, e.g., *The Future of the Internet: A Virtual Counter-Revolution*, ECONOMIST, Sept. 2, 2010, at 10; see also, COMM. ON INTERNET NAVIGATION AND THE DOMAIN NAME SYS.: TECHNICAL ALTS. AND POLICY IMPLICATIONS & NAT’L RESEARCH COUNCIL, SIGNPOSTS IN CYBERSPACE: THE DOMAIN NAME SYSTEM AND INTERNET NAVIGATION 173 (2005) (recommending that coordination on internationalized domain name “across different countries, regions, and language groups should be undertaken to prevent the balkanization of the Internet”).

18. SHAPING POLICIES, *supra* note 14.

19. See Strickling, *supra* note 2; see also Strickling, *infra* note 27.

intrusion into their privacy? Do you see a trust component there? Yes, absolutely.

Child Protection and Freedom of Expression

As more and more children go online for educational and social activities, their protection is vital. So how do we ensure proper targeting of law enforcement resources to address serious crime while remembering that the most important line of defense against harmful content is the well-informed and engaged parent or teacher?²⁰ Again, parents need to trust the Internet. They need to know that their children will be protected online.

Cybersecurity

Clearly, this is an issue of trust. How do we meet the security challenges posed by the global Internet, which will require increased law enforcement efforts and private sector technology innovation, yet respect citizen privacy and the protection of our civil liberties?²¹

Copyright Protection and Piracy

How do we protect against the illegal piracy of copyrighted works and intellectual property on the Internet while still preserving the rights of users to access all lawful content across the Internet?²²

Internet Governance

In our role administering the federal government's relationships with ICANN,²³ how do we ensure that ICANN serves the public interest and conducts its activities with the openness and transparency

20. See ONLINE SAFETY AND TECH. WORKING GRP., YOUTH SAFETY ON A LIVING INTERNET (2010). The Working Group and its report, transmitted to NTIA and the Congress, was mandated by the Broadband Data Improvement Act, Pub. L. No. 110-385, § 214, 122 Stat. 4096 (2008) (codified at 15 U.S.C. § 6554), with recommendations to advance the goal of providing a safe online experience for children.

21. Cybersecurity, Innovation and the Internet Economy, *Notice of Inquiry*, Dkt. No. 100721305-0305-01, 2010 WL 2917751 (July 28, 2010).

22. Inquiry on Copyright Policy, Creativity, and Innovation in the Internet Economy, *Notice of Inquiry*, Dkt. No. 100910448-0448-01, 2010 WL 3843096 (Oct. 5, 2010).

23. ICANN is the Internet Corporation for Assigned Names and Numbers, a non-profit organization that coordinates, at the overall level, the global Internet's systems of unique identifiers, and in particular to ensure the stable and secure operation of the Internet's unique identifier systems. See *Bylaws for Internet Corporation for Assigned Names and Numbers*, ICANN, <http://icann.org/en/general/bylaws.htm#I> (last updated Oct. 28, 2010).

that the global Internet community demands?²⁴ Early last fall, we executed the new Affirmation of Commitments to establish what we hope will be a long-lasting framework for the technical coordination of the Internet naming and numbering system.²⁵ And we are looking forward this year to participating in the first of the administrative reviews called for in that document to ensure that the commitments agreed to by ICANN are carried out in full.²⁶ So again, there's a trust issue.

All of the efforts require collaboration among all stakeholders. We are going to involve other government agencies, foreign governments, where appropriate, and all key Internet constituencies—the commercial sector, academia, and civil society. Again, our objective is to move in the direction of building trust. In terms of the outcomes, we will be flexible. (And I was prepared to use that word even before I heard this morning's discussion of the importance of flexibility in governance.) Some of these efforts may result in recommendations for legislation or regulation, but if this work paves the way for individual actors to adopt new processes, so much the better.²⁷

What I am describing here is not a governance model, although maybe some of the academics in here can pull something more out of it. I am not even sure it is a model of any kind. But, I think it clearly is what Marc Berejka referred to as a “nudge.” It's an opportunity for us in the government to bring people together to work on these issues and try to come up with solutions that we think will solve these problems.²⁸ And, again, maintain trust. At the end of the day, all of these initiatives have as their goal to preserve and protect the trustworthiness of the Internet.

So, if we are successful, maybe we will change our name to the “National Trust the Internet Administration.” That's what we are all

24. See Lawrence E. Strickling, Assistant Sec'y of Commerce for Comm'ns and Info., Remarks at Inaugural Meeting of the United States Internet Governance Forum: Current Issues Affected by Internet Governance (Oct. 2, 2009), available at http://www.ntia.doc.gov/speeches/2009/Strickling_USIGF_091002.html.

25. See NAT'L TELECOMMS. AND INFO. ADMIN., AFFIRMATION OF COMMITMENTS BY THE UNITED STATES DEPARTMENT OF COMMERCE AND THE INTERNET CORPORATION FOR ASSIGNED NAMES AND NUMBERS (2009); see also Strickling, *supra* note 24.

26. See *Affirmation of Commitments—Reviews*, INTERNET CORP. FOR ASSIGNED NAMES AND NOS. (July 26, 2010), <http://www.icann.org/en/reviews/affirmation/>.

27. See Lawrence E. Strickling, Assistant Sec'y of Commerce for Comm'ns and Info., Remarks at The Internet Society's INET Series: Internet 2020: The Next Billion Users: Internet Policy 3.0: All Hands on Deck (Apr. 29, 2010), available at http://www.ntia.doc.gov/presentations/2010/InternetSociety_04292010.html (calling for the need to take advantage of the successful multistakeholder organizational models to address current Internet challenges, and to avoid reducing the debate to one of whether or not to regulate).

28. *Id.*; see also RICHARD H. THALER & CASS R. SUNSTEIN, NUDGE: IMPROVING DECISIONS ABOUT HEALTH, WEALTH, AND HAPPINESS (2008).

about this year, and that's my take away from this conference. We have got a lot of work to do, at least in our organization, but I think we can make a contribution here.