

STATEMENT OF COMMISSIONER AJIT PAI

Re: *Numbering Policies for Modern Communications*, WC Docket No. 13-97; *IP-Enabled Services*, WC Docket No. 04-36; *Telephone Number Requirements for IP-Enabled Service Providers*, WC Docket No. 07-243; *Telephone Number Portability*, CC Docket No. 95-116; *Developing a Unified Intercarrier Compensation Regime*, CC Docket No. 01-92; *Connect America Fund*; WC Docket No. 10-90; *Numbering Resource Optimization*, CC Docket No. 99-200; *Petition of Vonage Holdings Corp. for Limited Waiver of Section 52.15(g)(2)(i) of the Commission's Rules Regarding Access to Numbering Resources*; *Petition of TeleCommunication Systems, Inc. and HBF Group, Inc. for Waiver of Part 52 of the Commission's Rules*.

Telephone numbers are at the heart of voice communications in the United States. They are used to connect one customer to another, to identify carriers on the public-switched telephone network (PSTN), to enable texting and multimedia messaging, and to route emergency calls. And yet, no one ever seems eager to talk about the Local Exchange Routing Guide or the Number Portability Administration Center or the North American Numbering Plan, let alone how to integrate those last-generation systems with next-generation technologies like the Session Initiation Protocol (for point-to-point Internet Protocol (IP)-based calls) or ENUM (for mapping telephone numbers into the Internet space).¹ In short, numbering gets no respect.

But today, numbers rightfully take center stage. We need to address the subject now because today's numbering system is becoming an anachronism. It assumes the dominance of old-school carriers interconnecting over time-division-multiplexed (TDM) circuits, using copper lines and the out-of-band Signaling System No. 7. But that's not how modern, IP-based networks operate.

This morning's item comes none too late. It's been nine years since then-Chairman Powell recognized that IP-based communications were the future and opened up a proceeding on IP-Enabled Services.² Since then, interconnected voice over IP service providers have proliferated and consumers have fled the PSTN. Meanwhile, the Commission has gained invaluable experience and perspectives. It has managed a database to allow point-to-point IP-based communications via telephone numbers.³ It has established a Technology Transitions Policy Task Force.⁴ And it has heard from its Technological Advisory Council that the old TDM infrastructure should sunset in the next five years.⁵

It is time for the FCC to acknowledge that the IP Transition is upon us—that old copper-based networks are fundamentally different from new IP-based networks, and that our legacy regulations slow

¹ Fun fact: The “E” in ENUM stands for E.164, the technical standard for telephone numbers, not “electronic.” For a useful and readable description of ENUM and précis on the integration of traditional and IP-based networks, see http://www.cisco.com/web/about/ac123/ac147/archived_issues/ipj_5-2/enum.html. More intrepid readers can turn to the International Telecommunications Union. See <http://www.itu.int/osg/spu/enum/>.

² See *IP-Enabled Services*, WC Docket No. 04-36, Notice of Proposed Rulemaking, 19 FCC Rcd 4863 (2004).

³ See *Telecommunications Relay Services and Speech-to-Speech Services for Individuals with Hearing and Speech Disabilities; E911 Requirements for IP-Enabled Service Providers*, CG Docket No. 03-123, CC Docket No. 98-67, WC Docket No. 05-196, Second Report and Order and Order on Reconsideration, 24 FCC Rcd 791 (2008) (creating the iTRS Numbering Database).

⁴ Press Release, FCC Chairman Julius Genachowski Announces Formation of ‘Technology Transitions Policy Task Force’ (Dec. 10, 2012), available at <http://go.usa.gov/TWFB>; Statement of Commissioner Ajit Pai on the Formation of Technology Transitions Policy Task Force (Dec. 10, 2012), available at <http://go.usa.gov/TWFW>.

⁵ Meeting of the Technological Advisory Council of the Federal Communications Commission (June 29, 2011), available at <http://go.usa.gov/TWFe>.

down the transformation from old to new (not to mention investment and innovation). Last month, I highlighted the importance of revising numbering for next-generation networks as one task we must undertake to facilitate the IP Transition.⁶ Needless to say, then, I am pleased that the Notice we adopt today takes a fresh look at many of our numbering rules, including those regarding number portability and numbering cost allocation.

I am particularly grateful to my colleagues for incorporating many of my suggestions. These related primarily to the upcoming trial that will allow interconnected VoIP providers to gain direct access to numbers. Most importantly, the trial now will place participants on a six-month schedule with a limited geographic scope, which will help us identify and hopefully resolve any unforeseen problems. And the trial will require reporting from participants on what worked and what didn't—for we can't benefit from the lessons learned unless we learn the lessons. Additionally, the Wireline Competition Bureau will report back to us (and the public) on the results of the trial, thanks to a proposal by my colleague, Commissioner Rosenworcel. All of these changes will ensure that the trial is a real experiment, one that will help us eschew opinions in favor of facts.

Speaking of trials, I feel compelled to mention another critical one that's necessary for a smooth, successful IP Transition: an All-IP Pilot Program. Just like the VoIP numbering trial we embrace today, an All-IP Pilot Program would allow providers to voluntarily test the waters of the IP Transition, in this case by turning off their old TDM electronics in a discrete number of wire centers and migrating consumers to an all-IP platform. Like today's trial, it would be geographically limited. Like today's trial, we'll need to include consumer protections to make sure that no consumer loses voice service. And like today's trial, we'll need to rigorously evaluate the results of that pilot program, so that we know how to make the IP Transition a success for all Americans. I hope we undertake the All-IP Pilot Program soon.

But enough words about that. Today is appropriately a day for numbers.⁷ I want to thank the numbering team in the Wireline Competition Bureau for all their work on this item. I look forward to reviewing the results of the trial and moving forward with a Report and Order in this proceeding early next year.

⁶ Remarks of Commissioner Ajit Pai, "Two Paths to the Internet Protocol Transition," Hudson Institute, Washington, DC (Mar. 7, 2013), *available at* <http://go.usa.gov/TWMj>.

⁷ Cf. Norton Juster, *The Phantom Tollbooth* 176–77 (1961) (“[The Dodecahedron asked,] ‘Don’t you know anything at all about numbers?’ ‘Well, I don’t think they’re very important,’ snapped Milo, too embarrassed to admit the truth. ‘NOT IMPORTANT!’ roared the Dodecahedron, turning red with fury. ‘Could you have tea for two without the two—or three blind mice without the three? Would there be four corners of the earth if there weren’t a four? And how would you sail the seven seas without a seven? . . . Why, numbers are the most beautiful and valuable things in the world. Just follow me and I’ll show you.’ He turned on his heel and stalked off into the cave.”).