

Extending Broadband to all Americans

**Remarks of Commissioner Kathleen Q. Abernathy
at
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(As prepared for delivery)

Thank you very much. I am delighted to have the opportunity to discuss one of the FCC's most important policy initiatives — if not *the* most important: promoting universal access to broadband technologies. While the normal operation of market forces leaves little doubt that broadband will be rolled out in our nation's cities, the FCC has paid special attention to ensuring the deployment of broadband to *rural* America. Sparse populations and rugged terrain increase both the costs and risks borne by service providers in rural areas, so the FCC has an important role to play in making sure that those communities are not left behind by the digital revolution.

I am especially pleased to have legislative staff in the audience, because I know that Congress shares the FCC's keen interest in promoting broadband deployment. Section 706 of the Telecommunications Act of 1996 directs the Commission to remove regulatory barriers to deployment and to take other steps necessary to stimulate infrastructure investment. This provision has been a key consideration for me as the FCC has grappled with a number of proceedings over the last three and a half years. What I would like to do today is to provide an overview of the Commission's multifaceted efforts to promote broadband deployment — whether by wireline carriers, cable operators, wireless carriers, satellite operators, electric utilities, or others. Then I would be happy to take some questions, if we have time.

Before I talk about what the FCC is doing to promote broadband deployment, let me say a few words about why it matters. What is so special about broadband? When I first heard about it years ago, I was tempted to think it just meant faster e-mail — which is nice, but not particularly earth shattering. Now that I have learned more about broadband, I have come to understand that the potential benefits are immeasurable. It is increasingly clear that broadband technology will fundamentally reshape the way we communicate, the way we work, the way we learn, the way we receive health care, and the way we are entertained.

Perhaps the most powerful benefit of broadband is that it has the power to make geographic isolation irrelevant. It brings a world of information to rural communities via the Internet, so that school children have access to the same resources in a remote corner of Alaska as they do in Washington, D.C. Broadband enables telemedicine, which gives rural families access to medical specialists without having to travel long distances. And it fuels economic expansion by connecting small businesses to millions of potential customers all over the world and by allowing larger businesses to set up call centers and otherwise tap into a new employee base. Broadband networks also are inherently more efficient than narrowband networks, so they allow service providers to lower their costs. As a result of the consumer benefits and efficiencies, analog networks are rapidly giving way to packet-switched networks that transmit a converged stream of voice, video, and data via Internet Protocol.

As a staunch believer in free markets, my starting position is to get out of the way and let market forces deliver broadband to consumers. But, as I mentioned a moment ago, when it comes to rural areas, the FCC must take a more active role, especially in

light of section 706 of the 1996 Act. That's why we have been actively pursuing this statutory goal by removing regulatory impediments to investment by wireline carriers, allocating more spectrum for wireless broadband services, and fostering the development of other broadband technologies. I'll talk about each of these areas in turn.

Wireline Networks

As many of you know, cable broadband networks serve roughly 60% of all broadband customers, and DSL providers serve around 40%, with a relative handful of consumers served by alternative platforms. Part of cable's marketplace advantage may reflect superior technology or more aggressive deployment, but it also may reflect years of disparate regulatory treatment. While cable broadband facilities are not regulated at the federal level, wireline facilities were potentially subject to extensive regulation, until the FCC took important deregulatory action in 2003.

Specifically, the *Triennial Review Order* refrained from imposing unbundling obligations on next-generation fiber loop facilities. The Commission concluded that significant competition would emerge from cable and other technologies — as well as from wireline competitors — without resorting to a forced-sharing regime that is fraught with implementation problems. Just as importantly, the Commission found that imposing unbundling obligations at deeply discounted TELRIC rates would discourage investment by incumbent LECs and new entrants alike. Relying in part on section 706, we decided to forego an unbundling obligation in order to stimulate new broadband deployment.

In the wake of that decision — which, unlike other parts of the *Triennial Review Order*, was upheld by the D.C. Circuit Court of Appeals — the Commission made important clarifications to ensure that carriers would not be deterred from serving

particular populations or deploying particular network architectures. We made clear that apartment buildings would be subject to the same regulatory treatment as single-family homes; we put fiber-to-the-curb architectures on a par with fiber-to-the-home deployments; and we used our forbearance authority to ensure that the regulatory relief granted under section 251 of the Act would not be undermined by unbundling obligations imposed under section 271.

This string of decisions is unquestionably bearing fruit. Several Bell companies have committed to billions of dollars in new investment in fiber networks, and smaller carriers also have announced plans to step up their deployment.

Other Broadband Platforms

While it is great that wireline companies are increasing their broadband deployment in the wake of the Triennial Review Order and that cable operators continue to extend their own market-leading broadband capabilities — that is not enough. The Commission also must promote the deployment of other broadband platforms. While cable and DSL providers serve nearly 30 million broadband customers. Other platforms *collectively* serve only a small fraction of that amount. Our ultimate goal is for consumers to be able to choose from among a multiplicity of broadband services, rather than just one or two. Some platforms may be better suited for urban areas, while others may be better suited for rural areas. And consumers may choose to make trade-offs among price, capacity, and attributes such as mobility. Moreover, the emergence of new broadband platforms will promote a high degree of innovation, both technologically and in terms of consumer-friendly service packages. Finally, more robust broadband competition may someday enable the Commission to dismantle economic regulation for

all communications services, including voice services, thereby fulfilling Congress's goal of developing a procompetitive, deregulatory framework.

With this in mind, the FCC has taken a number of proactive steps to promote the development of wireless broadband services. Last June, we provided increased flexibility in the MMDS and ITFS bands to create the possibility of innovative new uses, including commercial broadband services. We have also focused on identifying new spectrum, and that is why, in cooperation with NTIA, the Commission allocated 110 MHz of spectrum for 3G services, and we also issued licensing and service rules. I am optimistic that the FCC's efforts to develop more effective secondary markets for spectrum also will enable more consumers to reap the benefits of broadband technology. And we took several specific steps to facilitate improved access to spectrum in rural areas.

In addition to this focus on *licensed* providers, we have looked to *unlicensed* spectrum to foster the deployment of broadband services. Many of us have become quite familiar with the 2.4 GHz unlicensed band, as this spectrum has enabled an explosion of Wi-Fi "hot spots" in homes, offices, coffee shops, hotels, and many other settings. The FCC allocated an additional 250 MHz of unlicensed spectrum at 5.8 Gigahertz for Wi-Fi. Wi-Fi systems generally complement, rather than compete with, last-mile technologies. But the development of several new technical standards, including Wi-Max, as well as the Commission's recent NPRM concerning the potential for unlicensed devices to operate on a non-interfering basis in the unused broadcast television spectrum, could dramatically extend the range and robustness of wireless broadband services.

Another promising technology is broadband over powerline, or BPL. Electric utilities have field-tested BPL systems and successfully delivered broadband Internet

service to a small number of consumers. I believe that BPL holds tremendous promise for consumers, because it could bring broadband to any home that has electricity. In order to encourage this new technology we adopted rules to prevent harmful interference to other licensees, such as amateur radio operators, but we resisted efforts to explore the potential imposition of economic regulations on BPL services. Why? Because we want to give this nascent service room to develop before there is any proceeding concerning regulatory obligations. In fact, I doubt that there will *ever* be a need to impose common-carrier-type obligations on a nascent platform such as BPL.

Finally, satellite operators also are striving to be part of the broadband future. High-speed services are already available from DBS providers, and other companies and joint ventures are preparing to launch a new generation of satellites that will be capable of providing more robust — and hopefully more affordable — broadband services. Such offerings might be especially attractive in rural areas, where terrestrial networks are particularly costly. I also believe that the FCC's recent efforts to reform the satellite licensing process will eventually help speed the delivery of new services to consumers.

Removing Other Regulatory Barriers to Deployment

In addition to promoting additional infrastructure investment, the Commission must continue to break down other barriers to deployment. One important area concerns right-of-way management. There is no question that local governments have legitimate interests in regulating rights-of-way and recovering the cost of digging up streets (and any other costs). But in some cases, providers have complained of burdensome application processes, excessive processing delays, and exorbitant fees that appear to bear no relation to cost. The Commission has been working with state and local governments

to address these concerns and to develop best practices. And we should continue to play an active role in this area to ensure that right-of-way management does not become a barrier to deployment.

The Commission also has been considering the appropriate regulatory framework for broadband Internet access services provided over cable and DSL networks. While the Triennial Review tackled the question of unbundling obligations for broadband *facilities*, the Commission also must address the regulatory obligations attached to the provision of broadband *services*, including the extent to which nondiscrimination obligations exist and whether services must be tariffed and backed by cost studies. One of my priorities has long been to harmonize the disparate treatment of cable broadband and DSL-based Internet access services. Unfortunately, these proceedings have been slowed up as a result of the *Brand X* litigation. But I am hopeful that the Supreme Court will clarify our regulatory authority and put us back on track on these important reform efforts.

Lastly, apart from broadband Internet access services, the Commission has been working on an appropriate regulatory framework for IP-enabled services such as VOIP. VOIP has flourished in an environment of minimal regulation, and we need to ensure that it remains that way. In November, the Commission took a critical step by preempting state utility regulation. This will eliminate the prospect of states' creating a patchwork of burdensome and potentially inconsistent rules — a threat that would have chilled investment and innovation.

Looking ahead, the FCC needs to complete its own rulemaking on IP-enabled services. We will focus on ensuring the fulfillment of core social policy obligations, including access to E911 services, access for persons with disabilities, the ability of law

enforcement to conduct surveillance, and the preservation of universal service. I do not know at this point how much regulation will be required, but I am committed to regulating with a light touch and ensuring that any rules we adopt are narrowly tailored to these compelling governmental interests. In particular, it seems clear that there is currently no need to impose economic regulations concerning entry, rates, or service quality. Such intervention in the marketplace has traditionally been justified as a means of curbing the abuse of market power, yet in the IP arena, there is no dominant provider. Rather, all are new entrants. Imposing common-carrier-type regulations would surely hamper investment and innovation, so it is critical for policy makers to avoid such requirements at the federal and state level.

In closing, I think it is important for regulators to recognize that technology is moving faster than we are. We need to develop more flexible regulatory structures that are centered on the fulfillment of core social policy objectives, and less bound up with arcane service categories or labels like telecommunications service or information service. It will undoubtedly be a major challenge for regulators to construct an appropriate regime that promotes investment and innovation, rather than retarding these benefits. At some point soon, Congress may need to step in and address limitations in the statute. But I am committed to doing my best to help bring the promise of broadband to all Americans, and I look forward to working with my colleagues, with Congress, and with private industry on this critical goal.

Thank you very much for allowing me to speak with you today, and if we have time, I would be happy to take some questions.