ETI VIEWS AND NEWS
ECONOMICS AND TECHNOLOGY, INC.
May 2010

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Why Broadband Internet Access Should Now be Reclassified as a Title II Telecommunications Service

In its 2005 *Broadband Wireline Internet Access* (BWIA) Order, the FCC, building on its earlier *Cable Modem Order* and the Supreme Court's *Brand X* decision that affirmed it, concluded that broadband Internet access service involved close integration of a telecommunications and an information service, and held that the entire integrated package should be treated as an "information service" and be entirely deregulated. The Commission reasoned at that time that it could continue to supervise the practices of Internet access providers, including their compliance with the FCC's policies regarding net neutrality, by means of its "ancillary jurisdiction" under Title I of the *Communications Act*. And in 2009, the FCC asserted such ancillary jurisdiction in an *Order* prohibiting Comcast from engaging in certain traffic management practices with respect to its Internet access customers, which the FCC determined to violate its "net neutrality" principles.

Comcast appealed, and in April 2010 the D.C. Court of Appeals ruled that the FCC, having disavowed Title II regulation of even the telecommunications component of Comcast's broadband Internet access services, could not reach the network management practices at issue via the Commission's "ancillary" regulation. Aimed primarily at restoring its legal authority to enforce net neutrality requirements, the FCC has responded to the *Comcast* decision by announcing plans to reclassify the telecom component of broadband Internet access as a telecommunications service, subject to regulation under Title II. In that same announcement, FCC Chairman Julius Genachowski sought to reassure the incumbent providers of broadband Internet access services (the ILECs and cable companies) that, were it to succeed in restoring its Title II authority over broadband Internet access, the FCC would limit its use of this authority to the enforcement of net neutrality policies and would forbear from reinstating other common carrier obligations.

Apparently not mollified by FCC assurances, the incumbents have criticized this proposed change as unsupportable revisionism. We not only disagree, but believe that the FCC had unreasonably diverged from a longstanding and well-supported legal and policy course when, in 2005, it first adopted the rationale for classifying BWIA as an information service. The dichotomy between "telecommunications" and "information services" contained in the 1996 *Telecommunications Act* (TA96) is a direct reflection of the rules adopted by the FCC its 1980 *Second Computer Inquiry* (CI2). Until 2002 – that is, for the first 22 of the 30 years that CI2 rules have been in place – the FCC succeeded in applying this framework to the continuously evolving telecommunications network.

Then, as the FCC looked first to avoid regulation of cable modem service and then extended its rationale "in parity" to wireline providers of broadband Internet access, the Commission decided to treat broadband Internet access as a unique instance of a service in which the transmission component and the information service component were too "integrated" to treat separately. It is, in reality, this radical departure from the time-tested principles of CI2 that has undermined the FCC's ability to ensure non-discrimination and an open Internet and to foster competition for services requiring the use of Internet access facilities. The FCC's current initiative would actually restore the integrity of the line between telecommunications and information services, consistent with the flexible and time-tested principles of CI2.

The Broadband Internet Access market is highly concentrated

Another criticism of the proposed reclassification is that it would saddle the Internet with policies created for regulation of archaic technology platforms. But that claim seems to be driven by a gross misunderstanding of what the "reclassification" entails: Only the telecommunications components of the Internet would become subject to Title II regulation; there is no suggestion that *content* or *content providers* fall within the scope of FCC jurisdiction. On the other hand, clear benefits arise from permitting the FCC to oversee the broadband transmission platforms used for Internet access where competition is and will remain limited. As the United States Department of Justice recently advised the FCC in comments regarding the *National Broadband Plan*:

> We do not find it especially helpful to define some abstract notion of whether or not broadband markets are "competitive." Such a dichotomy makes little sense in the presence of large economies of scale, which preclude having many small suppliers and thus often lead to oligopolistic market structures. ...

Reclassification of the *telecom* component of broadband Internet access would work to *protect* content, content providers, and competition in the content markets from efforts by the "last mile" broadband Internet access oligopolists to leverage their considerable market power into the adjacent and (currently) highly competitive content markets.

Internet access is telecom

Finally, one critic has alleged that since "nothing has changed" since the FCC modified its legal stance with regard to broadband Internet access (in the 2002 to 2005 period), a subsequent modification of those policies (presumably even to restore the earlier framework) would be impermissible as a legal matter. But the facts *have* changed. In the case of the earliest retail commercial "online services" as offered by companies such as Prodigy, Compuserve, AOL and Lexis/Nexis, most, or in some cases all, of the content that the end user could access resided on the host computers of these (as the FCC had referred to them) "enhanced service providers" or "ESPs." The arrival of the Internet has totally changed this paradigm.

Precisely because the Internet gave users access to rich content and applications offered by independent providers, over time Internet *access* providers have become increasingly less involved with Internet content and other "enhancements," and content providers no longer bundle their content with telecommunications. Today, very little, if any, of the content accessed by end users is provided by or resides on their ILEC or cable access provider's host platforms, and the role of Internet access providers (misleadingly renamed as "Internet Service Providers" (ISPs)) is confined mainly to creating and providing a transport path – i.e., pure telecom – between the end user and the various host websites as the end user may request. Thus, whether or not the enhanced functionalities or the level of "integration" that the FCC had ascribed to broadband Internet access services actually existed in 2002 or 2005, these conditions certainly do not exist today. The crux of the service provided by both ILEC and cable incumbents is transmission, pure and simple, and such "content" as these incumbents may offer to their access subscribers amounts to little more than a "throw-away."

A second basis for the "integration" theory underlying the FCC's *BWIA Order* was that broadband Internet access service also included "Domain Name Services" (DNS) which the FCC mistakenly believed to be an "information service." DNS involves translating web addresses into IP addresses for routing over the Internet. Compounding this misunderstanding, the FCC concluded that the provision of DNS (the "information service") together with the telecom component of the Internet access service rendered the entire integrated package an "information service." But DNS is not an "information service" as the concept has evolved under the CI2 and *Telecommunications Act* paradigms. DNS provides a *routing* function that is in every material sense analogous to numerous database-supported routing arrangements that operate within the traditional public switched telephone network (PSTN) and that have *never* been viewed as anything other than "basic services." Examples include 800 Database Service, which performs translations of dialed toll-free numbers into physical PSTN or special access addresses; Local Number Portability (LNP), which redirects dialed calls to the appropriate terminating carrier and central office switch, and customized toll-free routing arrangements that provide dynamic routing based upon the identity or geographic location of the caller and/or traffic conditions extant at particular call centers.

In *CI2*, the FCC established the correct distinction between "basic" and "enhanced" services:

> We find that basic service is limited to the common carrier offering of transmission capacity for the movement of information, whereas enhanced service combines basic service with computer processing applications that act on the format, content, code, protocol or similar aspects of the subscriber's transmitted information, or provide the subscriber additional, different, or restructured information, or involve subscriber interaction with stored information.

This same fundamental distinction, renamed "telecommunications" and "information services," is maintained in TA96. Did the FCC correctly apply this distinction when it classified broadband Internet access as an "information service" back in 2005? Is the BWIA classification correct today, as the Internet and its use have evolved? As to the inclusion of certain bundled services that might qualify as "enhanced services" under the CI2 rules, the answers are Maybe and No. As to the use of DNS to route Internet traffic, the answers are clear: No and No. Broadband Internet access was then, certainly is now, and will continue to be in the future, a *telecommunications* service, and treatment of it as a Title II telecommunications service is clearly the correct response.

Market Structure Regulation Will Lead to Increased Competition and Will Stimulate Increased Investment and Jobs

A recent ETI report, *Regulation, Investment and Jobs: How Regulation of Wholesale Markets Can Stimulate Private Sector Broadband Investment and Create Jobs*, demonstrates that the most powerful tool the FCC has at its disposal to advance its broadband agenda and revitalize the telecommunications industry's economic engine is competition. Contrary to RBOC claims, by returning to policies like those implemented immediately following TA96 that were intended to ensure that ILEC wholesale access facilities are ubiquitously available and fairly priced, the FCC has the opportunity to set in motion a new era of innovation, investment and job growth in the telecommunications industry. ETI does not support a return to the traditional rate of return- based regulation of the last century, but instead urges adoption of broad market structure regulations designed to ensure the most efficient use of the nation's existing and future network infrastructure.

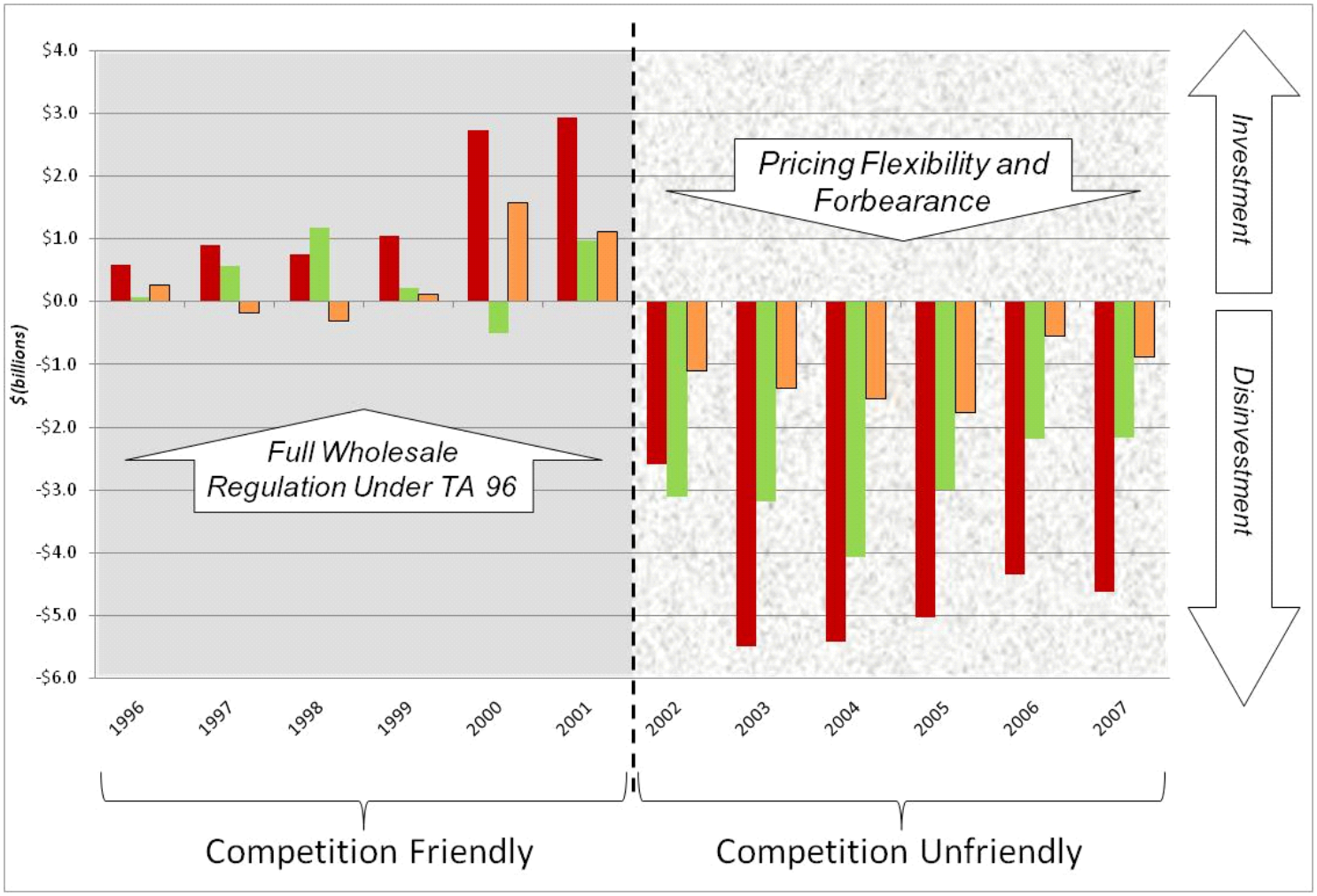
In a previous ETI report published in the spring of 2009, *The Role of Regulation in a Competitive Environment*, we demonstrated that the "competition-friendly" regulatory policies in effect during the five years immediately following the 1996 Act spurred incumbents and competitors alike to invest or expand their investments in telecommunications facilities. During that time, comprehensive unbundling requirements of the new Sections 251 and 252 of the 1996 legislation, along with relatively strict enforcement of the rate-constraining mandates of Sections 201 and 202 of the *Communications Act of 1934*, were intended to ensure that competitors could purchase local transmission facilities, as either unbundled network elements (UNEs) or as Special Access, at relatively low and nondiscriminatory prices. The availability of reasonably priced local transmission facilities regulated in this manner enabled competitors to serve broad segments of the telecommunications market nationwide. We also showed that with the subsequent shift to a "competition unfriendly" regulatory regime – when the FCC dismantled many core protections that had been instituted so as to assure the availability and economic pricing of wholesale inputs – conditions

became so unfavorable to investment by competitive carriers that entrants were compelled to scale back their capital spending and, in many cases, to withdraw from the market altogether. Facing only limited remnants of the post-TA96 competition, the ILECs' incentives to expand their own capital expenditures were diminished, and their investment outlays were scaled back accordingly. Thus, while the combined net book value of telecom plant for what is now AT&T, Qwest, and Verizon rose from $142-billion in 1996 to $155-billion in 2001, by 2007 it had dropped to only $101-billion.

Regulation, Investment and Jobs expands upon our earlier work and also examines the correlation between "competition-friendly" and "competition-unfriendly" regulatory regimes vs. telecom sector employment levels. Telecom sector jobs grew steadily between 1996 and 2000. Although some employment losses in 2001-2002 could be attributed to general economic factors (in particular, the collapse of the "tech bubble"), jobs in the telecom sector failed to rebound even as conditions in the general economy improved. With "competition-unfriendly" regulatory policies in place, the telecommunications sector has experienced steady and persistent job losses – a drop of more than 400,000 jobs, including the loss of 140,000 jobs at the regional Bells, between 2001 and 2007. The only segment of the telecommunications industry where employment increased was wireless where, during the relevant period, there had been four or more competitors in virtually every geographic market.

In *Regulation, Investment and Jobs*, we also looked forward, charting the significant economic gains in terms of investment and employment that should be expected to arise as a direct result of restoring a competition-friendly regulatory regime:

- ***Stimulation of investment in high speed broadband infrastructure.*** A regulatory regime that is friendly to competitors can be expected to stimulate as much as $60-billion in new infrastructure investment over the next five years. Much of this will be geared toward serving business customer locations outside of the residential neighborhoods that have been the primary focus of ILEC and cableco broadband investment. This new competitive focus on the business market will make advanced broadband services more widely available to businesses of all sizes, and will help to forces prices down. Looking out to 2014, we developed forecasts of year-over-year investment growth and cumulative investment dollars based on three alternate sets of assumptions – the most realistic, moderate, and conservative. With reimposition of effective wholesale regulation, we project that the cumulative investment by ILECs and CLECs will increase between $20-billion (under the most conservative assumptions) and $60-billion (under the realistic scenario) by 2014, compared to the level of investment that can be expected to occur absent significant regulatory reform.



RBOC net capital investments – 1996-2007 demonstrating that deregulation resulted in "disinvestment" rather than investment.

- ***Industry-wide job creation***. The economic expansion resulting from restoring pro-competitive regulation of wholesale broadband services should lead to a large-scale growth in employment for ILECs and for CLECs, reversing the persistent job losses that occurred between 2001, when the FCC's policy of deregulating wholesale broadband services was initiated, and the present. As with our investment analysis, we forecast year-over-year job additions and cumulative job growth over a five-year period using the same three assumption sets. Even applying the most conservative assumptions, we forecast that there will be 135,000 more telecom sector jobs by 2014 if the FCC restores effective regulation to broadband wholesale services than if it accedes to a continuation of the current deregulatory regime. Under what we believe to be a more realistic assumption set, job growth in that sector over the same period could exceed 450,000.
- ***Stimulation of economy-wide economic growth and job creation.*** The adverse economic effects of stifling competition for the broad range of retail services that depend on reasonably priced access to ILEC broadband network elements and special access services are not confined to the telecom industry itself. As such, the lower prices and innovative broadband offerings stemming from a more competitive telecom sector can be expected to flow through to the general economy, resulting in greater productivity and increased employment across all economic sectors. The inefficiency in the general economy as a result of special access overpricing has been compounding for close to a decade. We estimate that through 2009 forgone GDP growth has been in the range of $66-billion, and that the general economy (excluding telecom) could have supported 234,000 more jobs had the economic benefits of competitive special access pricing been flowed to businesses economywide.

Visit http://www.econtech.com/pubs.php to view a full copy of *Regulation, Investment and Jobs: How Regulation of Wholesale Markets Can Stimulate Private Sector Broadband Investment and Create Jobs* and *The Role of Regulation in a Competitive Environment*.

ETI Analysis and Testimony Basis for Second Largest Jury Award in California in 2009

In 2007 and 2008, Colin B. Weir, Senior Consultant at Economics and Technology, Inc., testified on behalf of a class of approximately 150,000 California consumers who had purchased a product called "Avacor" from Global Vision Products, Inc. The class asserted a false advertising claim against the corporation and several of its principals. In January 2008, an Alameda County, California jury returned a verdict for the plaintiff class, and awarded damages based upon the ETI testimony.

In 2009, the same plaintiff class went to trial again, this time seeking to pierce the corporate veil to impose individual liability against two shareholders of the corporation. ETI was asked once again to calculate the economic damages to the class, and Mr. Weir offered damages testimony at trial.

The work involved a statistical analysis of nearly 13,000 actual Avacor purchase records to determine the amount of the average purchase of the product. This involved the electronic capture of the purchase data from paper invoice records, calculating valid sample sizes for the population, taking multiple systematic random samples of purchase data, calculating the average purchase price, and validating the statistical methods employed. Weir estimated total damages to the class at $50.02-million.

During cross-examination, Mr. Weir successfully defended the statistical methods underlying the ETI calculations, and showed the results to be quite conservative. At the conclusion of the four-week trial, the jury relied upon the expert testimony of Mr. Weir and returned a $50-million verdict for the plaintiff class.

VerdictSearch, the nation's leading publisher of verdict and settlement news and research, reported that the $50-million jury award in the *Global Vision* case was the second largest jury award in California in 2009, and among the Top-100 largest jury awards in the United States.

Visit http://www.econtech.com/video to view live video of Mr. Weir's direct and cross examination testimony at the trial.

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Regulation, Investment and Jobs: How Regulation of Wholesale Markets Can Stimulate Private Sector Broadband Investment and Create Jobs – February, 2010

Revisiting US Broadband Policy: How Reregulation of Wholesale Services Will Encourage Investment and Stimulate Competition and Innovation in Enterprise Broadband Markets -- February, 2010

The Role of Regulation in a Competitive Environment – March 2009

Live Video of Colin B. Weir's direct and cross examination testimony in *Thomas v. Global Vision Products (II)*
http://www.econtech.com/video

About ETI. Founded in 1972, Economics and Technology, Inc. has been a leading research and consulting firm specializing in telecommunications regulation and policy, litigation, taxation, service procurement and negotiation arenas. ETI serves a wide range of telecom industry stakeholders in the US and abroad, including telecommunications carriers, attorneys and their clients, consumer advocates, state and local governments, regulatory agencies, and large corporate, institutional and government purchasers of telecom services.