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January 31, 2002

**BY HAND**

Ms. Magalie R. Salas  
Secretary  
Federal Communications Commission  
445 Twelfth Street, S.W.  
Washington, D.C. 20554

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JAN 31 2002

FEDERAL COMMUNICATIONS COMMISSION  
OFFICE OF THE SECRETARY

**RE:** *WorldCom, Cox, and AT&T v. Verizon*  
CC Docket Nos. 00-218, 00-249, and 00-251

Dear Ms. Salas:

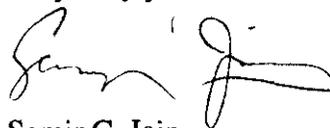
Enclosed for filing please find 4 public versions of Verizon Virginia Inc.'s ("Verizon VA") Post Hearing Reply Brief in the above-referenced arbitration proceedings.

Verizon VA is also serving 8 copies of the non-public version of the brief, as well as 2 copies of the public version, on Commission staff.

Verizon VA is providing AT&T and WorldCom the proprietary version of the Post Hearing Reply Brief, which contains information proprietary to Verizon VA, pursuant to the protective order issued in this case on June 6, 2001.

Please call Scott Randolph (202-515-2530) or me if you have any questions.

Very truly yours,



Samir C. Jain  
Attorney for Verizon Virginia Inc.

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Before the  
FEDERAL COMMUNICATIONS COMMISSION  
Washington, D.C. 20554

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JAN 31 2002

FEDERAL COMMUNICATIONS COMMISSION  
OFFICE OF THE SECRETARY

In the Matter of	)	
Petition of WorldCom, Inc. Pursuant	)	
to Section 252(e)(5) of the	)	CC Docket No. 00-218
Communications Act for Expedited	)	
Preemption of the Jurisdiction of the	)	
Virginia State Corporation Commission	)	
Regarding Interconnection Disputes	)	
with Verizon Virginia Inc., and for	)	
Expedited Arbitration	)	
	)	
In the Matter of	)	CC Docket No. 00-249
Petition of Cox Virginia Telecom, Inc., etc.	)	
	)	
	)	
In the Matter of	)	CC Docket No. 00-251
Petition of AT&T Communications of	)	
Virginia Inc., etc.	)	
	)	

**VERIZON VIRGINIA INC.**

**POST HEARING REPLY BRIEF**

**(Public Version)**

JANUARY 31, 2002

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**BEFORE THE  
FEDERAL COMMUNICATIONS COMMISSION**

**POST-HEARING REPLY BRIEF  
OF VERIZON VIRGINIA INC.**

**I. INTRODUCTION**

Throughout these proceedings, Verizon VA has urged the Commission to adopt the most economically appropriate interpretation of TELRIC and, within the constraints of that regulatory regime, estimate as accurately as possible the forward-looking costs of providing UNEs to CLECs. Verizon VA's studies are designed to do just that. In the guise of pleading with the Commission to reject "compromise results," Petitioners, on the other hand, advocate an extreme interpretation of TELRIC and a cost model and inputs that, while certainly producing low rates, have little to do with the forward-looking costs that Verizon VA or any other carrier could ever incur in providing UNEs. Thus, Petitioners are correct when they state that "[t]he parties have presented the Commission with a stark choice." (AT&T/WCom Br. at 1.) But they are right about little else.

Accepting Petitioners' approach would result in rates less than half those the Commission has found to be acceptable and TELRIC-compliant within the past three years. (VZ-VA Br. at 5-6.) Petitioners do not, of course, suggest that such a decrease is due to some precipitous drop in costs. In order to obtain UNEs at the lowest possible rates, they simply urge the Commission to reduce rates substantially by accepting AT&T/WorldCom's model or finding some other pretense to lower rates below any realistic measure of forward-looking costs.

The Commission should reject Petitioners' invitation to choose an ends-based approach to setting rates rather than undertake an analysis of the incumbent's TELRIC costs. To have any legal validity, the TELRIC standard must have some defining principles and not simply be a manipulable policy vehicle to provide CLECs with low UNE rates. Such an approach would not only be unprincipled, but would also disregard an at least equally critical policy concern: setting UNE rates so far below any plausible estimate of the incumbent's forward-looking costs would send false economic signals to the market, discouraging true facilities-based entry and encouraging uneconomic entry via the incumbent's facilities. If this Commission does not recognize the danger of setting UNE rates too low, but instead falls into line behind some states that have been more concerned with the rates charged to CLECs than estimating incumbents' UNE costs, then it is unlikely that any state commission will either.

In their attempt to support their proposed ends-based approach, Petitioners substitute rhetoric and distortion for substantive analysis. They resort to misrepresenting the record and ad hominem accusations that Verizon VA has presented false evidence to the Commission, without pausing to point to even a shred of evidence to support that inflammatory charge.

Even more significantly, Petitioners do not even feign interest in estimating the forward-looking costs in a real-world competitive market for local telephone service in Virginia. In fact, AT&T/WorldCom now concede that their assumption of entry by a hypothetical competitor of their own imagining is entirely divorced from reality, acknowledging that a real-world carrier could and would never engage in such entry or make the deployment and other decisions Petitioners propose. (AT&T/WCom Br. at 24.) This is a startling, and ultimately fatal, concession. As Drs. Shelanski and Tardiff have explained — and AT&T/WorldCom have not even attempted to refute — costs and prices in a competitive market are the product of rational

business decisions by real-world competitors. (VZ-VA Ex. 117 at 9-10.) Because, by Petitioners' own admission, the assumptions in their cost studies would never guide a competitor's decisions in the real world, the economic significance of the resulting illusory "costs" is non-existent.

For the same reason, the network design that Petitioners assume is without economic relevance. In designing their model network, AT&T/WorldCom evince no concern over whether that network is capable of providing the requisite services to all Virginia customers, let alone whether it can do so in a manner that meets applicable service quality standards. They are not even concerned about whether the technology they propose is commercially available. But, as Verizon VA explained in its initial brief (VZ-VA Br. at 29-33), a model that produces the costs of a network incapable of serving customers in the real world is useless for developing UNE rates. And it is certainly inferior to a study, such as Verizon VA's, that unquestionably models a network with the requisite capabilities.

Contrary to what Petitioners claim, setting UNE rates cannot be an abstract exercise in computer modeling divorced from the real world. Instead, an appropriate cost model must account for the demand and technology uncertainties that carriers actually confront, the competitive, technological, and regulatory risks that necessarily affect costs, and the rational, efficient investment and entry decisions that real-world firms make. Petitioners ignore these crucial considerations. Verizon VA, by contrast, has proffered studies that, within the constraints of TELRIC, take account of these factors and reflect efficient and cost-minimizing decisions drawn from Verizon VA's experience in operating a network that serves all Virginia customers. Verizon VA's model therefore produces the best estimate of its TELRIC costs of providing UNEs, and the Commission should accordingly adopt the resulting UNE rates.

## **II. ECONOMIC PRINCIPLES**

Apparently unwilling or unable to refute Verizon VA's interpretation of TELRIC or to defend their own interpretation as more economically correct, AT&T/WorldCom resort to distortions of Verizon VA's studies and contorted interpretations of testimony and briefs filed in other proceedings. Their tactics cannot, however, distract from the key point: Verizon VA has interpreted and applied TELRIC in the most economically appropriate manner that, to the extent possible given the regulatory constraints, reflects the rational decisions Verizon VA would make going forward, acting efficiently over the long run. Petitioners, on the other hand, have adopted an extreme interpretation that makes no economic sense, is concededly unrelated to the real-world operation of competitive markets, and fails to account for the competitive and regulatory risks inherent in TELRIC. Moreover, as Verizon VA demonstrated in its initial brief and AT&T/WorldCom fail to refute in theirs, Petitioners do not even consistently apply their own interpretation of TELRIC in their studies; most notably, for example, they use entirely inconsistent assumptions to support their unjustifiably low proposals for the cost of capital and depreciation.

### **A. Verizon VA's Studies Are Long Run and Forward-Looking.**

AT&T/WorldCom's claim that Verizon VA's studies are neither long run nor forward-looking is based on a misunderstanding or misrepresentation of those studies and key economic principles. Petitioners initially allege that Verizon VA's models "are not long-term studies but instead look forward only three years." (AT&T/WCom Br. at 13.) But, while Verizon VA's studies do use a three-year period to select the forward-looking mix of some technologies that

would be used in building out the network,<sup>1/</sup> to determine productivity and inflation, and to levelize labor rates, the recurring cost studies do not simply project what the network will look like in three years.<sup>2/</sup> Instead, as Verizon VA has repeatedly explained, the technology mix assumed for the forward-looking network in its recurring studies reflects greater amounts of fiber, IDLC, and GR-303 than Verizon VA expects will ever be deployed in its network, let alone in three years. (*See, e.g.*, VZ-VA Br. at 12-13.) Indeed, AT&T/WorldCom acknowledge precisely this point: as they note, Verizon VA’s methodology “produce[s] a mix of technologies for loops (including an *extraordinarily high* percentage of fiber and DLC) that Verizon does not anticipate having as its average blend of technology at *any* point in the foreseeable life of its assets.” (AT&T/WCom Br. at 16 n.11 (first emphasis added).)

Moreover, the use of a three-year study period for the limited purposes just described is entirely reasonable. As Drs. Shelanski and Tardiff explained, a real-world long-run study is necessarily constrained by how far into the future the analyst can reasonably make predictions. (VZ-VA Br. at 18-19.) Indeed, that would be true even if the study did not include an express

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<sup>1/</sup> AT&T/WorldCom assert that there is no reason to believe that the technology mix Verizon VA expects to use for new construction could serve as a useful proxy for the forward-looking mix of that technology over the new network. (AT&T/WCom Br. at 48.) This point is mystifying — it is hard to think of a better proxy for the real-world, forward-looking mix of technology that an efficient carrier would deploy, particularly when Petitioners have already conceded that Verizon VA’s technology choices for new construction may well be “entirely rational.” (AT&T/WCom Ex. 11 at 17; Tr. at 5631-32.) As explained, Verizon VA assumed this technology mix would be deployed network-wide, even though such widespread deployment would not occur by the end of three years or any time in the foreseeable future. (VZ-VA Br. at 13.)

<sup>2/</sup> Verizon VA’s *non-recurring* cost study does assume the forward-looking mix of the technology that it expects to have in place at the end of the three-year planning period. As Verizon VA has previously explained and discusses again below, this approach is entirely appropriate for non-recurring costs. (*See, e.g.*, VZ-VA Br. at 183-84.)

limitation on the length of the planning period — if the analyst cannot reasonably make predictions beyond three years, freeing the analyst to look beyond that time adds nothing to the value or reliability of the study. And Petitioners offer absolutely no evidence to challenge Verizon VA’s conclusion that, in the rapidly evolving telecommunications marketplace, a reasonable period is three years.<sup>3/</sup>

AT&T/WorldCom alternatively suggest that Verizon VA’s study cannot be long-run because it does not start from a completely blank slate and instead considers whether to retain existing assets in the network. In particular, AT&T/WorldCom argue that to consider the choice of keeping an existing asset is “to be constrained by the existing network.” (AT&T/WCom Br. at 15.) But that is nonsensical. By eliminating even the possibility of retaining an asset or network characteristic, Petitioners are the ones who seek to constrain Verizon VA’s possible choices: Considering an additional choice cannot seriously be termed imposing a constraint. Petitioners are left with no response to the testimony of Drs. Shelanski and Tardiff establishing that the key to a long-run analysis is to permit all facilities and characteristics to be variable and to assume replacement or change only where it is efficient to do so. As Drs. Shelanski and Tardiff explained, that is what Verizon VA’s studies do. (*See* VZ-VA Br. at 16-19.)

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<sup>3/</sup> Petitioners suggest that a foreseeability limitation is unnecessary because the Commission’s rules limit TELRIC to consideration of technologies that are “currently available.” (AT&T/WCom Br. at 16.) In addition to being highly ironic since, as discussed below, Petitioners frequently assume the use of technologies that are *not* currently available, their argument misses the point. Even if the set of technologies is known, a long-run study still requires judgments concerning what decisions will be most efficient over the long run in view of factors such as changes in demand and the pace of expected technological change — factors that are as difficult to predict as what the next best technology will be.

AT&T/WorldCom try a different version of this same argument by claiming that, because Verizon VA's model incorporates some existing network characteristics such as loop routes, its methodology necessarily was embedded rather than forward-looking. (AT&T/WCom Br. at 13, 49-51.) But as Verizon VA has explained, assuming the continued existence of a network characteristic is perfectly consistent with a forward-looking study so long as that characteristic represents the most efficient way of providing service in Virginia. (VZ-VA Br. at 15-16.) Verizon VA determined that the existing characteristics embodied in its model meet that test. Petitioners have made no contrary showing — indeed, as discussed in Verizon VA's initial brief, they have not even identified a single route that they believe would be more efficient if changed.

The test of a forward-looking, long-run study is not whether every facility or network characteristic is different from the current one. Rather it is whether, having considered the available options, the carrier has modeled the facilities and network characteristics that are as cost efficient over the long run (even if they would not always be the lowest cost at this very moment in a hypothetical static world) as the regulatory framework permits, and that result in a network capable of providing the requisite services with the appropriate service quality. In these proceedings, only Verizon VA's studies meet this test.

**B. Verizon VA's Studies Comply with the Most Economically Appropriate Interpretation of TELRIC.**

Rather than grapple with Verizon VA's substantive analysis, AT&T/WorldCom devote much of their discussion concerning TELRIC to their contentions that Verizon VA's witnesses were unwilling to declare its studies TELRIC-compliant and that Verizon has taken a different view of TELRIC in other proceedings. In both cases, however, Petitioners distort or take out of context what Verizon and its witnesses have said and attempt to manufacture inconsistencies where none exist. Verizon VA's economic witnesses have unequivocally stated that the studies

comply with the most economically appropriate interpretation of TELRIC. And regardless of how TELRIC has been interpreted by Verizon, CLECs, or some state commissions, the issue here is this Commission's interpretation of TELRIC. This proceeding presents the Commission with a clear opportunity to adopt the most economically appropriate interpretation of TELRIC and to reject an extreme and unrealistic interpretation.

AT&T/WorldCom's assertion that Dr. Shelanski has been unwilling to state that Verizon VA's studies are TELRIC-compliant is simply wrong. (AT&T/WCom Br. at 19.) In fact, Dr. Shelanski could not have been more clear in his direct testimony, when in response to the question "[i]s Verizon VA's cost model consistent with TELRIC," he unequivocally answered "[y]es." (VZ-VA Ex. 101 at 35; *see also* VZ-VA Ex. 101 at 3 (Verizon VA's model "complies with a reasonable interpretation of the Commission's TELRIC regime."); VZ-VA Ex. 117 at 21 ("Verizon VA's studies conform to the most economically appropriate interpretation of TELRIC.") Similarly, during the hearings, Dr. Shelanski stated that he "would be happy to explain why I think Verizon's model is consistent with an interpretation of total element long run incremental costs." (Tr. at 2834.)

Petitioners nevertheless seize upon Dr. Shelanski's testimony that he "can't really comment on what objectively as a legal matter the Commission's TELRIC rules are," as though that amounts to an admission concerning his view of Verizon VA's studies. (AT&T/WCom Br. at 19.) In fact, Dr. Shelanski was simply recognizing that TELRIC has been subject to different interpretations, including the extreme view offered by Petitioners; thus, he could not opine that Verizon VA's study was compliant with the *Commission's* interpretation of TELRIC without knowing what interpretation the Commission would ultimately adopt. Rather than presumptuously tell the Commission what it had meant, Dr. Shelanski simply testified that, in his

view, Verizon VA's studies complied with the most economically appropriate interpretation of TELRIC.

Petitioners are forced to admit that Dr. Tardiff similarly endorsed Verizon VA's studies as TELRIC-compliant. (AT&T/WCom Br. at 20.) As they note, Dr. Tardiff stated that Verizon VA's model "complies with a reasonable interpretation of what [the TELRIC] rules are." (Tr. at 2855.) Petitioners attempt to take the sting out of this testimony by suggesting that Dr. Tardiff took a different view of TELRIC in an article he previously co-authored, which observed that the Commission "has explicitly rejected proposals by the ILECs that the rates be 'based on' their own projected actual incremental costs . . . ." (AT&T/WCom Br. at 20.) But as Verizon VA has repeatedly noted, Verizon VA's studies are *not* based on its "own projected actual incremental costs." Indeed, it has explained that TELRIC — and Verizon VA's TELRIC-compliant studies — necessarily understate the "actual incremental costs" it expects to incur.<sup>4/</sup> (VZ-VA Br. at 10.)

Petitioners also proffer the non sequitur that Verizon VA's economic witnesses must not have been willing to testify that Verizon VA's studies are TELRIC-compliant because they expressed certain disagreements with TELRIC itself. (AT&T/WCom Br. at 19-20.) It is certainly true that Drs. Shelanski, Tardiff, and Hausman, as well as Verizon itself, believe that

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<sup>4/</sup> Perhaps recognizing the futility of their characterization of Dr. Shelanski's and Dr. Tardiff's testimony, Petitioners focus much of their attention on the failure of Dr. Hausman to discuss TELRIC. (AT&T/WCom Br. at 18-19.) However, the purpose of Dr. Hausman's testimony was not to opine on Verizon VA's studies' compliance with TELRIC or even to address Verizon VA's studies at all. Instead, as is evident from even a cursory reading of his testimony, Dr. Hausman focused on a narrow, albeit critical, point: that AT&T/WorldCom's MSM is internally inconsistent and fails to properly measure economic costs because it does not account for the effects of sunk costs and depreciation, which would be particularly significant under the MSM's radical assumptions of instantaneous, ubiquitous replacement. (VZ-VA Ex. 111 at 5-20.)

TELRIC is not economically correct and understates forward-looking costs. Indeed, as Petitioners note, Dr. Shelanski observed that in order to comply with TELRIC's constraints, Verizon VA's studies in some cases departed from what would be economically correct. (Tr. at 2949; *see also* VZ-VA Ex. 101 at 21-22.) But Verizon's and its witnesses' belief that TELRIC itself understates Verizon VA's forward-looking costs says nothing about whether Verizon VA's studies are TELRIC-compliant. As explained above, Drs. Shelanski and Tardiff unequivocally testified that they believed the studies do comply with TELRIC. Indeed, the fact that Verizon VA deviated from what it believes to be economically correct and thereby understated its costs actually underlines the fact that it designed its studies to comply with TELRIC.

AT&T/WorldCom finally attempt to suggest that Verizon VA's interpretation of TELRIC here differs from the interpretation voiced in Verizon's briefing before the Supreme Court. (AT&T/WCom Br. at 17-18.) They note, for example, that Verizon stated in its Supreme Court brief that TELRIC is not "tied to the incumbent's actual network and present or future cost structure." (AT&T/WCom Br. at 17.) But the supposed inconsistency to which Petitioners point is illusory. Neither Verizon VA's studies nor its interpretation of TELRIC here is premised on the belief that TELRIC permits full recovery of Verizon VA's "present or future cost[s]" or must be based on Verizon VA's "actual network." To the contrary, Verizon's cost studies here *understate* Verizon's present and future costs precisely because those studies *do* comply with TELRIC. In any event, these proceedings provide the Commission with an opportunity to apply its own interpretation, and it should apply the most economically rational one.

Indeed, the Commission's own reply brief in the Court demonstrates that the extreme view proposed by some CLECs is not the correct interpretation of TELRIC. It makes clear, for example, that TELRIC does not require assumptions such as the instantaneous, ubiquitous

replacement inherent in Petitioners' model. As the Commission explained, while a replacement network such as the MSM has all-new switches with the requisite capacity to serve all current demand, "TELRIC . . . does *not* assume that an efficient carrier would provide the switching element with large-capacity switches, rather than with a mix of smaller switches and so-called 'add-on modules.'"<sup>5/</sup>

In the end, Petitioners' suggestions that Verizon VA's economic witnesses did not endorse its models as TELRIC-compliant or that Verizon VA's interpretation of TELRIC is inconsistent with Verizon's Supreme Court brief serve as little more than unsuccessful attempts to distract from the substantive issues in these proceedings. As Drs. Shelanski and Tardiff clearly testified, Verizon VA's cost studies not only comply with TELRIC, they comply with the most economically appropriate interpretation of TELRIC. And it is that interpretation the Commission should adopt here.

**C. AT&T/WorldCom Advocate an Extreme Version of TELRIC that Their Own Studies Even Fail To Apply Consistently.**

AT&T/WorldCom's claim that Verizon VA has not challenged that their studies are TELRIC-compliant (AT&T/WCom Br. at 12) is misleading and overlooks two basic points. First, the extreme interpretation they posit is unrelated to the real-world operation of competitive markets and is economically indefensible. Second, AT&T/WorldCom do not even apply their interpretation consistently: while they assume instantaneous and ubiquitous deployment of new

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<sup>5/</sup> Reply Brief for Petitioners Federal Communications Commission and the United States, *Verizon Communications, Inc., et. al. v. Federal Communications Commission, et. al.*, Nos. 00-511, 00-555, 00-587, 00-590 and 00-602 at 9 n.7 (July 2001) (emphasis added) ("FCC Reply Brief").

technologies in a competitive market when it produces lower costs in their model, they ignore those assumptions when determining the cost of capital and depreciation, presumably because consistent application of those assumptions would increase costs. Even their own economist could not defend this approach.

As Verizon VA explained in its testimony and initial brief, AT&T/WorldCom's assumption that forward-looking costs are immediately driven down to the costs of a network that instantaneously and ubiquitously contains the current least-cost technology has nothing to do with the real-world economics of a competitive market, particularly one characterized by significant uncertainty concerning future changes in technology and demand and high sunk costs. (VZ-VA Br. at 19-23.) AT&T/WorldCom respond by asserting that Verizon VA has caricatured their theory because "TELRIC is not based on the insane assumption" that a carrier would repeatedly rebuild its existing network from scratch. (AT&T/WCom Br. at 24.) Instead, they say, their model assumes:

[A] *hypothetical* carrier using the most up-to-date technology serving total demand . . . *whether or not it or any other carrier deploys the most recent technology*. The economic assumption upon which the model is based, in other words, is *not* that there will be some carrier in the real world that every three years actually deploys a network identical to the one that TELRIC hypothesizes.

(AT&T/WCom Br. at 24 (emphasis in original).) AT&T/WorldCom's response reveals one of the most fundamental flaws in their approach. They acknowledge — as they must — that they do not expect that a carrier would actually enter the market under the assumptions they make. But if no real-world carrier would engage in the concededly irrational exercise of instantaneously building a complete network with the newest technologies, then costs in a real-world competitive market would not be affected (let alone be reduced) by that entirely theoretical possibility. In other words, if no competitor would ever exist that would or could build a network and deploy

the plant and technology in the manner Petitioners advocate, the theoretical costs of that hypothetical network would simply not be a competitive consideration.

As Drs. Shelanski and Tardiff explained, the costs in a competitive market are a product of the “rational business decisions” made by competitors and potential entrants — any attempt to “divorce business decisions from costs and prices is bizarre.” (VZ-VA Ex. 117 at 9-10.) Yet that is precisely what AT&T/WorldCom propose to do here. A firm in a competitive market does not dream up hypothetical scenarios about entry by an ideally efficient competitor that would have the lowest possible short-run costs and then price as though it faced such irrational entry. Rather, potential competition from a new entrant can affect costs and prices only if an existing firm faces a realistic prospect of that competition. AT&T/WorldCom have now conceded that they have no reason to believe that a rational carrier *would* enter under the assumptions they make. They assert that this fact is irrelevant, but to the contrary: it means their hypothetical entrant is irrelevant to a real-world carrier’s forward-looking costs.

AT&T/WorldCom next assert that, regardless of how real-world carriers rationally act, the value of their facilities is necessarily equal to the costs of the most current, least cost technologies. (AT&T/WCom Br. at 24-25.) Verizon VA previously explained the numerous fallacies in this assumption (VZ-VA Ex. 117 at 12-14; VZ-VA Br. at 23-26), and Petitioners do not even attempt to respond or offer any support for their claim. What they do instead is blatantly misquote Dr. Shelanski’s testimony. AT&T/WorldCom state that Dr. Shelanski testified that “the mere existence of new technology lowers recurring costs whether or not it is efficient for the carrier to deploy new technology . . . .” (AT&T/WCom Br. at 25.) In fact, what Dr. Shelanski explicitly said was that “the mere existence of new technology *may* lower

recurring costs whether or not it is efficient yet for the carrier to actually deploy that new technology.” (VZ-VA Ex. 110 at 21 (emphasis added).) This difference is critical.

As Dr. Shelanski explained, the effect of new technology on recurring costs requires a complex analysis and depends on numerous factors. It is certainly not the simple and direct relationship AT&T/WorldCom assume. The issue here is not the value of a piece of telecommunications equipment on the secondary market, but the appropriate rate for services provided over that facility as part of a network. Even if the development of a new generation of planes by Boeing might reduce the resale value of an older plane, it would not necessarily reduce the price for a passenger’s seat on an airline. And any such possible effect would likely be quite small and slow to develop, particularly because airlines would be likely to deploy the new planes incrementally (if at all). Moreover, any assessment of the effect of new technologies must consider the full cost of deploying those new technologies, particularly the cost of capital and depreciation, which would increase substantially to the extent one assumes faster deployment of the new technology. (*See* VZ-VA Br. at 23-26.)

AT&T/WorldCom do not even begin to address these complexities. Indeed, rather than estimate a cost of capital and depreciation in a manner consistent with their assumption that TELRIC requires determining costs as though the incumbent is subject to competition with a firm that instantaneously and ubiquitously deploys the latest technologies, Petitioners base their cost of capital and depreciation on a monopoly market. (*See* VZ-VA Br. at 26-29.) Even AT&T/WorldCom’s own economist, Ms. Murray, conceded the fallacy of this approach and acknowledged that “all the model assumptions have to be consistent. So, to the degree that it requires a competitive market to get all of the other assumptions, that would be true for the cost

of capital as well.” (Tr. at 3202.) Petitioners’ model fails this basic test and thus is not only inherently invalid but fails to accord consistently even with Petitioners’ own view of TELRIC.

Petitioners’ cost of capital and depreciation calculations are further flawed because they fail to take account of the risks inherent in the instantaneous replacement assumptions in their TELRIC theory. (See VZ-VA Br. at 28-29.) As Dr. Hausman explained, an appropriate model must account for the risks associated with sunk costs and economic depreciation, particularly because failing to account for sunk costs would confer a free option on CLECs. (VZ-VA Ex. 111 at 7-20.) While AT&T/WorldCom assert that the Commission simply rejected Dr. Hausman’s analysis (AT&T/WCom Br. at 22-23), the Commission in fact recognized the need to take these factors into account; it simply indicated that it believed TELRIC itself could account for these factors if properly applied.<sup>6/</sup> If there were any doubt on this point, it was put to rest when the Commission reaffirmed in its reply brief to the Supreme Court that “an appropriate cost of capital determination takes into account not only existing competitive risks . . . but also risks associated with the regulatory regime to which a firm is subject.”<sup>7/</sup> Petitioners, who dispute the need to even account for these risks, clearly have not done so in their model. Thus, in this respect as well, their model is not compliant with even their extreme interpretation of TELRIC.

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<sup>6/</sup> See First Report and Order, *Implementation of the Local Competition Provisions in the Telecommunications Act of 1996*, 11 FCC Rcd 15499, 15849 ¶ 686 (1996) (“*Local Competition Order*”) (“We agree . . . that . . . the combination of significant sunk investment, declining technology costs, and competitive entry may increase the depreciation costs and cost of capital of incumbent LECs.”); see also *id.* ¶¶ 687-88.

<sup>7/</sup> FCC Reply Brief at 12 n.8.

### III. GLOBAL STUDY INPUTS

#### A. The Depreciation Lives Verizon VA Used in Its Studies Are Forward-Looking and Appropriate.

As Verizon VA has explained, the depreciation lives in Verizon's studies were determined using Generally Accepted Accounting Principles ("GAAP"). These lives are the same reliable, accurate, unbiased lives that have been previously approved by the Commission<sup>8/</sup> and that Verizon used for its 2000 financial reports. Although GAAP lives cannot possibly account for the risks inherent in TELRIC's successive replacement methodology, much less the extreme version of TELRIC advanced by Petitioners, GAAP lives are inherently forward-looking and account for the risks of competition and technological change intrinsic to the telecommunications industry. In contrast, as Verizon VA has shown, Petitioners advocate the use of lives that were prescribed almost eight years ago, in a very different era in the telecommunications market, and prior to the 1996 Act or the TELRIC regulatory regime with its attendant risks and requirements. In fact, as Petitioners' own depreciation witness, Richard Lee conceded, the lives recommended by AT&T/WorldCom are simply inconsistent with TELRIC's fundamental assumption of a competitive telecommunications marketplace. (Tr. at 3371.) They instead assume a world in which the ILEC is the sole provider of local service (Tr. at 3396), and

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<sup>8/</sup> See VZ-VA Br. at 40; Memorandum Opinion and Order, *Joint Application by SBC Communications Inc., Southwestern Bell Telephone Company, and Southwestern Bell Communications Services, Inc. d/b/a Southwestern Bell Long Distance for Provision of In-Region, InterLATA Services in Kansas and Oklahoma*, 16 FCC Rcd 6237 ¶ 74 (January 22, 2001) (*Kansas-Oklahoma § 271 Order*), *aff'd in part, rev'd in part*, *Spring Communications Co. v FCC*, 274 F.3d 549 (D.C. Cir. 2001); Reply Declaration of Daniel J. Whelan and Gary E. Sanford, *Application by Verizon Pennsylvania Inc. et al for Authorization to Provide In-Region, InterLATA Services in Pennsylvania*, FCC 01-269 Docket No. 01-138, at 16-18 (August 2001) (noting use of GAAP depreciation lives, which Commission did not change when approving Verizon PA's § 271 application).

thus are inconsistent with the central theme guiding Petitioners' cost studies: that UNE costs should be determined as though the incumbent faces competition from a new entrant that instantaneously and ubiquitously has deployed the most up-to-the-minute technology.

Petitioners' brief fails to address the critical failure of their depreciation lives to account for the fully competitive market and the inherent risks that are assumed elsewhere in their studies. In fact, rather than address this at all, AT&T/WorldCom devote the majority of their discussion to an effort to demonstrate, by manipulating Financial Accounting Standards Board (FASB) texts, that GAAP is biased due to the principle of conservatism, despite Verizon VA's demonstration that this argument is simply incorrect and outdated. (AT&T/WCom Br. at 97-101.) The remainder of their argument boils down to an effort to attack lives that Verizon VA does *not* use — and which typically are *shorter* than the lives it does use. And finally, Petitioners make the implausible argument that technology and the level of competition have not changed since 1994 and thus cannot have affected the length of depreciable lives in the industry. None of these arguments withstands scrutiny or supports use of the outdated 1994 lives in Petitioners' studies.

**1. Petitioners' Efforts to Show That GAAP Lives Are Biased Are Unavailing.**

AT&T/WorldCom seek to discredit the GAAP lives used by Verizon VA on the ground that those lives are overly conservative. They contend that financial accounting lives are “driven by corporate objectives, including the objective of protecting shareholders, and by the GAAP principle of conservatism, which encourages the accountant to err on the side of overstating costs for financial reporting when there is uncertainty about their precise level.” (AT&T/WCom Br. at 97.) But this argument simply rehashes the arguments raised by Mr. Lee that Verizon VA