

TAB C

**BEFORE THE  
FEDERAL COMMUNICATIONS COMMISSION  
WASHINGTON, D.C. 20554**

In the Matter of

**Qwest Communications  
International Inc.**

)  
)  
) WC Docket No. 02-148  
)  
)  
)  
)  
)  
)  
)

Consolidated Application for Authority  
to Provide In-Region, InterLATA Services in  
Colorado, Idaho, Iowa, Nebraska  
and North Dakota

**DECLARATION OF NATALIE J. BAKER, ARLEEN M. STARR, AND DOUGLASS  
DENNY ON BEHALF OF AT&T CORP.**

**I. BACKGROUND**

1. **Natalie J. Baker.** My name is Natalie J. Baker. My business address is 1875 Lawrence Street, Denver, Colorado 80209. I am employed by AT&T Corp., and I serve as District Manager for Local Services and Access Management in the Network System Division for the company's Western Region.
2. My primary responsibility is management of the cost to AT&T for local network elements, interconnection, and carrier access charges in the company's fourteen-state Western Region. In that capacity, and relevant here, I am required to analyze public policy and the attendant wholesale prices for network elements charged to AT&T. Over the last five-plus years, I have participated in arbitrations, permanent cost cases, universal service, and access reform dockets before state commissions in the fourteen-state Qwest Region. I have also supported the AT&T position through industry workshops, ex parte meetings, and preparation of written comments in various state regulatory and legislative proceedings.

3. I began my career in telecommunications with AT&T Wireless Services (McCaw Cellular Communications) in 1990 where I held several positions including District Manager of Resellers, District Manager of Indirect Distribution, and Retail Development Manager. On January 1, 1996, I assumed the position of Manager with AT&T's Local Infrastructure and Access Management organization in the Network Computing and Systems Division. In December 1998, I was promoted to District Manager, Local Services and Access Management for the Western Region
4. I hold a Ph.D. in Public Affairs at the University of Colorado and Master's degrees in Public Administration and Business Administration from the University of Colorado and the University of Denver respectively. Additionally, I hold a B.S. in Sociology / Education from Indiana University, Bloomington, Indiana.
5. **Arleen M. Starr.** My name is Arleen M. Starr. My business address is 1875 Lawrence Street, Denver, Colorado 80202. I am employed by AT&T as a manager in the Local Services and Access Management organization. My responsibilities include analyzing local exchange carriers' intrastate costing and pricing methodologies and studies. As an expert witness, I have submitted testimony on local and access cost and price issues within AT&T's Western Region. I have previously submitted testimony in Arizona, Colorado, Idaho, Iowa, Minnesota, Montana, Nebraska, New Mexico, North Dakota, Oregon, South Dakota, Utah, Washington and Wyoming.
6. I graduated from DePaul University in 1983 with a Bachelor of Science degree in Commerce, with an emphasis in Accounting. I received a Masters of Business Administration from DePaul University in 1990, with an emphasis in Finance. I have

also completed various training seminars offered by AT&T and other educational organizations in marketing, economics, accounting, and costing methods in the telecommunications field.

7. I began my career with AT&T in 1984 in the Consumer Marketing Department. I had various responsibilities in this organization, including managing the expense and capital budgets. From 1986 to 1990, I held various positions in the Financial Regulatory Department in Chicago. My responsibilities included intrastate financial analysis and providing reports and data to the regulatory commissions in the Central Region. From 1992 to 1996, I worked in the product equipment business, with financial responsibilities in the product management, sales, and service areas. I assumed my current responsibilities in May of 1996.
8. **Douglas Denny.** My name is Douglas Denny. I am employed by AT&T as a Manager with Network Services, in the Local Services and Access Management group. My responsibilities include tracking, reviewing and analyzing local wholesale prices in Qwest's region; reviewing cost studies; and representing AT&T as a witness in state regulatory proceedings in the Qwest region relating to local wholesale price/cost issues.
9. I received a B.S. degree in Business Management in 1988. I spent three years doing graduate work at the University of Arizona in Economics, and then I transferred to Oregon State University where I have completed all the requirements for a Ph.D. except my dissertation. My field of study was Industrial Organization, and I focused on cost models and the measurement of market power. I taught a variety of economics courses at the University of Arizona and Oregon State University. I was hired by AT&T in

December of 1996 and have spent most of my time with the Company analyzing cost models.

10. I have testified before most commissions in Qwest's 14-state territory on cost models -- including the HAI Model, BCPM, GTE's ICM, U S WEST's UNE cost models, and the FCC's Synthesis Model. I have also testified about issues relating to the wholesale cost of local service -- including universal service funding, unbundled network element pricing, geographic deaveraging, and competitive local exchange carrier access rates.
11. The purpose of our testimony is to demonstrate that the UNE rates adopted by the Iowa, Idaho, Nebraska and North Dakota statecommission's are not remotely TELRIC-compliant.

**II. THE UNE RATES ADOPTED BY THE IOWA, IDAHO, NEBRASKA AND NORTH DAKOTA STATE COMMISSION'S ARE INFLATED BY MYRIAD TELRIC VIOLATIONS.**

12. Qwest argues that the UNE rates set in Iowa, Idaho, Nebraska and North Dakota can stand on their own. They cannot. The state commission in each of these states set rates for loop, switching and other critical elements on the basis of Qwest's "actual" costs rather than efficient forward-looking costs as TELRIC requires.

**A. Iowa.**

13. The most recent UNE prices adjudicated for Qwest in Iowa are also in clear violation of TELRIC. The Iowa Utilities Board last set UNE and interconnection prices for Qwest in an adjudication in 1998, based on a record compiled in 1996-97. *US West Communications, Inc.*, Docket No. RPU-96-9 (Iowa Utils. Board, Apr. 23, 1998). In its 1998 final decision, the Board expressly declined to apply the TELRIC methodology,

explaining that the Board was unwilling to accept its assumption of long run cost optimization. *In re: U S West Communications, Inc.*, Docket No. RPU-96-9 (Iowa Utils. Bd.), Final Decision and Order (issued April 23, 1998), slip op. at 13-14.

14. Qwest's assertion that the Board's overall approach nonetheless complied with "forward-looking economic cost" principles and was "largely consistent with the FCC's TELRIC rules" (Thompson Iowa Pricing Declaration at 15-16) is refuted by the Board's own findings. The Board made clear that it was adopting an incremental cost standard in which Qwest's embedded network and operations are assumed to remain almost entirely unchanged – *i.e.*, a species of *short run* incremental cost:

[T]he Board finds it is inappropriate to determine UNE prices using TELRIC methodology because it incorporates two assumptions that are difficult to reconcile with the cost-based pricing requirements of 47 U.S.C. § 252(d)(1) and IOWA CODE § 476.101(4)(a)(1). First, TELRIC produces a cost for network elements which assumes that U S West's existing technology will be instantaneously replaced. Second, TELRIC methodology assumes an optimal network that will never exist and which will produce services the current network cannot provide. Since neither of these things will happen, hypothetical TELRIC costs are unlikely to be actual costs U S West will incur to provide UNEs . . .

*In re: U S West Communications, Inc.*, Docket No. RPU-96-9 (Iowa Utils. Bd.), Final Decision and Order (issued April 23, 1998), slip op. at 13-14. The Board described its non-TELRIC cost standard as a measure of the "actual costs U S West will incur in providing unbundled network elements in the near future," rather than the "costs of an imaginary transition from the existing embedded network to a hypothetical forward-looking network." *Id.* at 14-15.

15. The Board elaborated on this point in response to a request for clarification of the April 1998 decision by the Consumer Advocate Division of the Iowa Department of Justice:

“the Board’s costing and pricing principles use least-cost technology *compatible with the existing embedded network.*” *In re: U S West Communications, Inc.*, Docket No. RPU-96-9 (Iowa Utils. Board), Order Granting Rehearing In Part For Purposes Of Clarification And Correction (issued June 12, 1998), slip op. at 2 (emphasis added). The resulting costs, the Board added, “will be based on *actual costs U S West will incur* in providing UNEs.” *Id.* at 4 (emphasis added).

16. Qwest’s related claim that the cost model inputs adopted by the Board in 1998 were “consistent with the Act” (Thompson Iowa Pricing Declaration at 18 *et seq.*) is also at odds with reality. Consistent with its rejection of TELRIC principles, the Board repeatedly rejected TELRIC-compliant input values in favor of embedded or short run values for several major UNE cost inputs.
17. Thus, for example, the Board accepted U S West’s assumption that forward-looking network operations expense would be only 10 percent below embedded levels. Final Decision and Order (issued April 23, 1998), slip op. at 24.
18. Likewise, the Board rejected the structure sharing assumptions of the Hatfield Model (the cost model sponsored by AT&T) because the model was “based on TELRIC,” “assumes a ‘scorched node’ environment,” and “also assumes U S West will construct a new local exchange network using the most efficient, currently available technology.” *Id.* at 26. Instead, the Board “set structure sharing inputs at levels at which sharing presently occurs” – *i.e.*, generally at the levels achieved by existing carriers in their embedded plant. *Id.* at 26-27.

19. Similarly, rather than estimate the mix of aerial, buried and underground cable to be found in an efficient forward-looking local network appropriate for Iowa, the Board assumed that the mix of structure would equal the “levels which reflect U S West’s plant *presently in use.*” *Id.* at 29 (emphasis added).
  
20. Unsatisfied with mischaracterizing the Board’s 1998 action, Qwest also misstates its subsequent fate on judicial review. Judicial review took place in 1998-99 before the United States District Court for the Southern District of Iowa. Qwest repeatedly cites January 1999 findings of the court that the Board’s overall costing approach—and specific inputs adopted by the Board—were “appropriate” and “consistent with the Act.” *See* Thompson Iowa Pricing Declaration at 7-8, 18 (citing *U S West Communications, Inc. v. Thoms*, Civil No. 97-CV-70082, Order Affirming Some Provisions of the Interconnection Agreements and Remanding Others (S.D. Iowa, Jan. 25, 1999), slip op. at 69-70). Three months later, however, in the wake of the Supreme Court’s 1999 decision in *AT&T v. Iowa Utilities Board*, 525 U.S. 366 (1999), the District Court reconsidered and vacated the very findings on which Qwest now relies. *U S West Communications, Inc. v. Thoms*, Civil No. 97-CV-70082 (S.D. Iowa), Memorandum Opinion, Ruling Granting AT&T’s and MCI’s Motion for Reconsideration and Order Amending Judgment (Apr. 19, 1999). In the latter decision, the court held that the Board’s costing approach in fact violated the TELRIC standard, and thus was “inconsistent with current federal law”:

The Board adopted neither the TELRIC option nor the proxy option in establishing rates for interconnection and access to unbundled elements. Indeed, the Board specifically rejected the TELRIC methodology because the Board was unwilling to accept two of its underlying assumptions. *See* Board’s Final Decision and Order, at 13-14 (April 23, 1998), as modified by order on June 12, 1998. In its stead, the court [sic] adopted an incremental cost approach. *See id.* at 14-15. By adopting a pricing methodology other than those specified in the FCC’s pricing rules, *the*

*Board's pricing approach is inconsistent with current federal law.*

*U S West Communications, Inc. v. Thoms*, Civil No. 97-CV-70082 (S.D. Iowa), Memorandum Opinion, Ruling Granting AT&T's and MCI's Motion for Reconsideration and Order Amending Judgment (Apr. 19, 1999), slip op. at 4-5 (emphasis added). The court remanded the pricing issues to the Board, directing it to "comply with the requirements of the FCC's rules." *Id.* at 5.

21. The Iowa Utilities Board has never complied with the court's remand order. On March 15, 2000, Qwest filed a tariff proposing, *inter alia*, to deaverage its UNE prices (another requirement of the *Local Competition Order* with which the Board had not complied in its 1998 order). On June 22, 2000, the Board issued a notice proposing to consider both the proposed deaveraging and the District Court order in a single docket. On August 2, 2000, however—in the wake of the decision of the Eighth Circuit in *Iowa Utilities Board*, 219 F.3d 744 (2000), overturning the FCC's pricing rules—the Board announced that it would defer the pricing issues raised by the District Court remand until the Supreme Court resolved the fate of the *Local Competition Order*. Hence, the Board limited the scope of the proceeding to Qwest's deaveraging proposal. *In re: U S West Communications, Inc. (n/k/a Qwest Corporation)*, Docket No. RPU-00-1 (TF-00-64), Order Sustaining Objections to Consideration of Certain Remanded Issues (issued Aug. 2, 2000).

22. On June 22, 2001, Qwest filed cost studies in support of rates for elements not covered in the 1996-98 rate proceeding. The Board denied a request by McLeodUSA and the Office of Consumer Advocate to expand the scope of the proceeding to review Qwest's existing UNE prices in compliance with the District Court's 1999 remand order. The further

proceedings ordered by the District Court, the Board asserted, were premature “because of the uncertainty regarding the legal status of the FCC’s TELRIC pricing rules.” *In re: Qwest Corporation*, Docket No. RPU-01-6, Order Granting Intervention and Denying Request to Expand Scope of Proceeding (issued Sept. 19, 2001), slip op. at 5-6.

23. On May 16 and 24, 2002, Qwest filed tariff revisions and an SGAT proposing reductions in certain of its existing rates for UNEs and interconnection. On June 7, 2002, the Board issued an order allowing the rate changes to take effect. The Board made no finding, however, that the reduced rates complied with the FCC’s pricing standards or the District Court’s remand order, and instituted no proceeding to address these long-outstanding issues. *In re: Qwest Corporation*, Docket No. TF-02-202, Order Approving Tariff (issued June 7, 2002).
24. The net result of these proceedings is that today – six years after enactment of the 1996 Act and the FCC’s issuance of its *Local Competition Order* – the Iowa Utilities Board has never prescribed any rates for UNEs or interconnection that even purport to comply with the TELRIC standard.

**B. Idaho.**

25. Qwest makes only a token effort to defend Idaho’s UNE rates on the merits. That is because the UNE rates in Idaho, like in Iowa, are stale and have never been found to be TELRIC compliant by the IPUC.
26. The UNE rates at issue were set by a series of orders by the IPUC’s appointed Arbitrator in 1997. Notably, the Arbitrator himself viewed these rates as “interim.” First Order Addressing Substantive Arbitration Issues, *Interconnection Contract Negotiations*

*Between AT&T Communications of the Mountain States, Inc. and US WEST Communications, Inc. Pursuant to 47 U.S.C. Section 252, USW-T-96-15, at 38 (Id. PUC March 24, 1997) ("First Arbitration Order").* In approving these orders, the IPUC conducted no independent review of the UNE rates but simply asserted *ipsi dixit* that "we are satisfied that the resolution of the disputed issues contained in the arbitrator's First Order and Second Order satisfy the Act." Order No. 27050, *Interconnection Contract Negotiations Between AT&T Communications of the Mountain States, Inc. and US WEST Communications, Inc. Pursuant to 47 U.S.C. Section 252, USW-T-96-15, at 2 (Idaho PUC July 17, 1997) ("IPUC Arbitration Order").* Despite the fact that the costs of providing UNEs have declined considerably in the five years since these rates were first determined, *see* Lieberman Dec. ¶ \_\_\_, the IPUC has yet to set new UNE rates.

27. In reviewing Qwest's Section 271 application, the IPUC recognized that these existing rates could not be deemed to be TELRIC-compliant. The IPUC explained that it is "unable to determine whether Qwest's UNE prices are consistent with the public interest because Qwest has not established UNE prices for its Idaho services." Idaho Public Utilities Commission, Commission Decision On Qwest Corporation's Compliance With Section 271 Public Interest And Track A Requirements And Section 272 Standards, *US West Communications, Inc.'s Motion For An Alternative Procedure To Manage Its Section 271 Application*, Case No. USW-T-00-3, at 11 (Idaho PUC April 19, 2002) ("*IPUC 271 Order*"). "There is no evidence showing that Qwest's UNE prices reached through an arbitration that occurred four years ago satisfy current FCC TELRIC pricing requirements, that the arbitrated rates are currently effective because AT&T continues to purchase UNEs from the arbitrated prices, or that the UNEs identified in the

interconnection agreement meet the complete list of UNEs now required for pricing.” *Id.* Thus, the IPUC concluded that “[t]he lack of UNE prices for Qwest remains a gap in Qwest’s record for compliance with the Section 271 requirements,” *id.*, and “the Commission cannot conclude that Qwest has satisfied all the FCC requirements for approval of Section 271 interLATA service authority.” *Id.* at 12.

28. To address this “gap” in its Section 271 Application, Qwest “voluntarily” lowered rates for certain elements. *See* Idaho Public Utilities Commission, Notice of Qwest Corporation’s Filing of Generally Available Terms Including Rates For Unbundled Network Elements, *US West Communications, Inc.’s Motion For An Alternative Procedure To Manage Its Section 271 Application*, Case No. USW-T-00-3 (Idaho PUC May 30, 2002). These rates are based on Qwest’s “benchmarking” analysis, *see* Thompson Idaho Dec. ¶ 6, which, as explained by Mr. Lieberman is severely flawed. Notably, the IPUC made no independent determination as to whether these rates complied with the Act and the FCC’s pricing rules. Idaho Public Utilities Commission, Commission Final Decision on Qwest Corporation’s Compliance with Section 271, *US West Communications, Inc.’s Motion For An Alternative Procedure To Manage Its Section 271 Application*, Case No. USW-T-00-3 (June 10, 2002). Rather, the IPUC found that any complaints about the validity of those rates could be challenged in a separate proceeding. *Id.* at 7.

29. Thus, Qwest’s Section 271 application for Idaho must stand or fall on the validity of the UNE rates set in 1997 by the Arbitrator. And as explained above, the Idaho Commission itself has found that these rates cannot be deemed TELRIC-compliant.

30. The arguments provided by Qwest provide no basis for second guessing the IPUC's conclusion in this regard. In fact, the arbitration record reveals several facial violations of the Commission's pricing rules. For example, the Arbitrator refused to set geographically deaveraged rates on the ground that Qwest's retail rates were not deaveraged. *First Arbitration Order* at 28. The FCC's rules, of course, require at least three different geographically deaveraged rate zones. 47 C.F.R. § 51.507.
31. The structure sharing assumptions adopted by the Arbitrator were likewise at odds with the forward-looking costs of an efficient provider of local telephone services. The Arbitrator ordered that UNE rates be set on the basis of the following structure sharing percentages: 33% for aerial cable, 50% for buried cable, and 90% for underground cable. In the *Inputs Order*, the Commission determined that significantly higher structure sharing percentages should be used. *See Inputs Order* ¶ 243 (50% for most aerial cable and 65-100% for most buried and underground cable).
32. Similarly, the common cost factor set by the arbitrator, 13%, is far above forward-looking levels. *First Arbitration Order* at 32. That level was based on Qwest's existing overhead expenses. But as explained above, TELRIC principles dictate that the common cost factor be set on the basis of the costs of an efficient provider, not Qwest's "actual costs." Clearly, an efficient telecommunications carrier could achieve much lower overheads than Qwest achieved in 1996. This is not a matter of theory, but fact. All the other RBOCs have much already done so. The "average" RBOC (including Qwest) had an overhead of 10.5% in 1998 and 8.3% in 2000. *See para. 47, infra.*

33. Finally, the Arbitrator expressly disclaimed setting TELRIC-compliant collocation charges. In its *First Arbitration Order*, the Arbitrator set interim collocation rates based on US WEST's interstate tariff rates for collocation because "[n]either side has proposed collocation prices that are supported by sound cost analysis." *First Arbitration Order* at 34. AT&T subsequently showed that many of these rates were *higher* than the collocation rates actually proposed by US WEST in the arbitration. *Fifth Arbitration Order* at 6. To prevent a gross injustice, the Arbitrator ordered US WEST to reduce its rates to the level that it proposed in the arbitration. *Id.* at 7. However, in light of its prior finding that those rates were not "supported by sound cost analysis," the Arbitrator declared these collocation rates to be interim and admonished the parties to initiate further proceedings on this issue. *Id.* at 6.

### **C. Nebraska**

34. The UNE rates set by the Nebraska PSC for loops and switching, as well as other key UNEs, are well in excess of TELRIC levels.
35. **Loops.** The loop rates set by the Nebraska PSC are inflated because of the Nebraska PSC's reliance on the flawed Benchmark Cost Proxy Model ("BCPM"). More specifically, in its *Nebraska Pricing Order*, the Nebraska PSC considered both the cost model that it should use to set loop rates in Nebraska, as well as the inputs that should be used. Findings and Conclusions, *In the Matter of the Commission, on its own Motion, to Investigate Cost Studies to Establish Qwest Corporation's Rates for Interconnection, Unbundled Network Elements, Transport and Termination, and Resale*, Application No. C-2516/PI-49, ¶¶ 18-74 (Ne. PSC Apr. 23, 2002) ("*Nebraska Pricing Order*"). After rejecting Qwest's "ICM LoopMod" as "inaccurate," *id.* ¶ 68, the Nebraska PSC focused

- its attention on the other cost models sponsored in this proceeding – the HAI model, the Hybrid Cost Proxy Model (“HCMP”), and BCPM. Without any analysis or citation, the Nebraska PSC declared that “[a]ll are designed to reflect costs an efficient company would incur in providing facilities, using the latest and least-cost technologies.” *Id.* ¶ 70.
36. The Nebraska PSC recognized, however, that “results” generated by each model were “sensitive to the choice of inputs.” *Id.* ¶ 71. But rather than determine the proper inputs that should be used in each of these “TELRIC” models, the Nebraska PSC simply threw up its hands. *Id.* ¶ 72 (“[T]he Commission is reticent to make specific findings related to individual inputs in this proceeding related to Loop UNE rates.”). Instead, the Nebraska PSC found that “any possible bias contained in each model and its associated inputs, will be minimized by utilizing the HAI, HCPM, and BCPM, each model’s respective default inputs for cable placement, cost sharing, plant mix, and fill factors.” *Id.* ¶ 73. Thus, the Nebraska PSC determined the UNE loop rates for Nebraska by simply taking an average of the three cost models using each model’s default inputs. *Id.*
37. The Nebraska PSC’s explanation for this – that the average will minimize “any possible bias” – is mathematical nonsense. To the extent that one (or two) of the models calculate TELRIC-compliant rates, averaging in the results of a flawed cost model will result in *excessive*, non-TERIC-compliant rates. And, by including the rates generated by the BCPM, that is precisely what happened here.
38. This can be demonstrated directly by comparing the loop rates set by the Nebraska PSC to loop costs that would be generated by the Commission’s HCMP, which all acknowledge uses a properly forward-looking standard. The statewide average loop rate

set by the Nebraska PSC is \$21.83, while according to the HCPM, the average loop in Nebraska costs \$15.62. Thompson Nebraska Dec. ¶ 33. This is exactly in line with the results of AT&T's HAI model. Denney Direct at 4 (July 20, 2001) (\$15.67 monthly average loop cost for Nebraska). Thus, the reason why the loop rates set by the Nebraska PSC are so high is because the BCPM is not forward-looking and generates costs well in excess of those generated by the HCPM and the HAI model.

39. This should come as no surprise to the Commission, because in creating the HCPM, the Commission expressly rejected the underlying methodology employed by the BCPM to calculate loop costs, as well as many of the default inputs used in that model. In its *Platform Order*, 13 FCC Rcd. 21323 (1998), the Commission found that the HAI model's approach for determining how to "group and serve . . . customers in an efficient and technologically reasonable manner" was superior to BCPM's "simplist[ic]" approach that "generat[e]d artificial costs." *Id.* ¶ 46. In particular, the Commission found BCPM's methodology flawed because it would "require separate facilities to serve customers that are [in fact] in close proximity." *Id.* Similarly, in determining what approach should be used to "design" the outside plant, the Commission found that the BCPM, unlike the HAI model, did not "adhere to sound engineering and forward-looking, cost-minimizing principles." *Id.* ¶ 54. Thus, the Commission found that BCPM did not use proper "optimization routines through use of sound network engineering design to use the most cost-effective forward-looking technology." *Id.* ¶ 61.

40. The Commission in its *Platform Order* and subsequent *Inputs Order*, 14 FCC Rcd. 20156 (1999) also rejected many of the key inputs used in the BCPM. For example, the Commission found that BCPM overstated costs by assuming that "loop lengths that

exceed 12,000 feet will be fiber cables.” *Platform Order* ¶¶ 68, 70. The Commission has also found BCPM “assum[ption] that an efficient telephone company will benefit only marginally from sharing” as contrary to TELRIC principles, which dictate substantial structure sharing. *Id. Inputs Order* ¶¶ 242, 243. And the Commission rejected the cable cost per input values supported by BCPM’s sponsors, which were based on cable costs reported by the incumbent LECs, in favor of the publicly available data provided and supported by AT&T and the HAI sponsors. *Id.* ¶¶ 103, 105.

41. **Switching And Other Recurring UNE Rates.** The other recurring UNE rates set by the Nebraska PSC are equally flawed. Reversing course from its approach on loops, the Nebraska PSC rejected the use of AT&T’s HAI model to set switching and interoffice transmission UNE rates – despite the fact that the Commission had substantially endorsed HAI’s switching cost algorithms and interoffice facilities module, *Platform Order* ¶ 75 – instead relying on Qwest’s proprietary ICM. That model, however, is not appropriately forward-looking. As Qwest conceded in the proceedings before the Nebraska PSC, its ICM was developed in order to allow Qwest to “recover, in the prices charged to new entrants, the actual “real world” costs that it incurs to provide interconnection and unbundled network elements. The cost recovery methodology the Commission adopts in this proceeding must allow [Qwest] to recover its actual costs.” AT&T Post Hearing Br. at 27-28 (Apr. 26, 1999) (quoting testimony of Alan Bergman). No amount of semantic gymnastics by Qwest can alter this fundamental defect.

42. Moreover, even if the SCM (the switching portion of the ICM) in fact attempted to calculate the efficient, economic costs of providing switching and interoffice transmission UNEs, the specific inputs used to calculate rates for these UNEs are patently

excessive and do not produce TELRIC-compliant rates. Two examples vividly illustrate the failure of the Nebraska PSC to use appropriately forward-looking inputs in the ICM.

43. *Inflation Factor.* A substantial component of the cost of a UNE is the wholesale expense that the ILEC incurs in providing the UNE. Wholesale expenses “represent the cost of maintaining, operating, marketing, and administrating wholesale services and network elements on an annual basis.” *Nebraska Pricing Order* ¶ 128. To do this, Qwest used 1999 expenses and then brought those expenses “forward” by applying a productivity factor, which measured efficiency gains since 1999, and an inflation factor, which measured expected increases in the underlying costs since 1999. *Id.* ¶¶ 128-32. The inflation factor in turn had two components, wage increases and material input price increases.
44. The inflation factor set by Qwest is not remotely consistent with basic TELRIC principles. To set the inflation factor, the Nebraska PSC looked at the average annual rate of change in the employment cost index (“ECI”) from 1985 to 1995. It then compared that value, 3.79%, to the factor proposed by Qwest, 4.3%. Remarkably, rather than finding this evidence to determine that Qwest’s factor was too high, the Nebraska PSC concluded that the 4.3% factor was proper because it was within the “range of the value calculated by the ECI.” *Nebraska Pricing Order* ¶ 149. But these numbers are not close in any relevant sense. The Qwest figure is a more than 20% greater than the ECI value.
45. Even more egregious, the Nebraska PSC determined that the costs of materials used to provide telecommunications services had increased at an annual rate of change of 1.28%.

*Id.* ¶¶ 15-52. The Nebraska PSC derived this figure on the basis of the producer price index (“PPI”) for communications equipment for 1985 to 1995. *Id.* This analysis is fundamentally flawed. First, it makes little sense to look at the annual rate of change of communication equipment prices from 1985 to 1995 to “inflate” 1999 vintage expenses. Rather, one would want to look at more recent data that is much more likely to be reflective of future cost changes. That data is available from the Department of Labor on the same website cited by the Nebraska PSC. *See Nebraska Pricing Order* ¶ 152 (citing <http://www.bls.gov/ppi/home.htm#overview>).<sup>1</sup> And it shows that after 1995, the PPI for Communications equipment leveled off (in 1996) and then began to fall. Thus, the most recent data show that from December 1995 to May 2002, the PPI for communications equipment has fallen nearly 7%.

46. Even this significant decline does not reflect the full magnitude of the decrease in the material costs between 1999 and today. The communications equipment account includes many types of communications equipment that have not experienced the significant cost declines that the core type of equipment used in local networks have experienced. For example, the PPI for communications equipment includes the costs of CB radios, electric marine horns, fire detection systems and traffic signals.<sup>2</sup> As Mr. Lieberman explains, the prices for the equipment actually used in local networks has and continues to experience dramatic declines.

---

<sup>1</sup> The Department of Labor routinely updates these data and, therefore, statistics on the PPI for communications equipment was available to the Nebraska PSC up through the first quarter of 2002 at the time the Nebraska PSC issued its decision.

<sup>2</sup> *See* <http://www.osha.gov/oshstats/sicser.html> (SIC code 366\_).

47. *Overhead.* The overhead factor set by the Nebraska PSC – 14.1% – is facially excessive. The reason for this is that, as the Nebraska PSC acknowledged in its *Nebraska Pricing Order*, the overhead factor was based on Qwest’s “actual overhead expenses” in 1996. *Pricing Order* ¶¶ 161-65; Qwest Nebraska Post-Hearing Br. at 39 (March 1, 1999). But TELRIC requires rates be based on efficient costs, not Qwest’s existing costs. Clearly, an efficient telecommunications carrier could achieve much lower overheads than Qwest achieved in 1996. This is not a matter of theory, but fact. All the other RBOCs have much already done so. As Mr. Denney showed, the “average” RBOC (including Qwest) had an overhead of 10.5% in 1998 and 8.3% in 2000. Denney Rebuttal at 10 (Aug. 1, 2001).
48. **NRCs.** Cost-based NRCs are essential to meaningful competition. That is because, NRCs are, by definition, a barrier to entry. They are costs that new entrants must pay, but that the incumbent does not. George J. Stigler, *THE ORGANIZATION OF INDUSTRY* 67 (1968) (an entry barrier is “a cost of producing (at some or every rate of output) which must be borne by a firm which seeks to enter an industry but is not borne by firms already in the industry”); *see also Bell Atlantic-NYNEX Merger Order*, 12 FCC Rcd. 19985, ¶ 129 n.247 (1997) (same). When such entry barriers exist, new entrants must charge higher prices than incumbents to recover their costs.
49. The NRCs set by the Nebraska PSC are competition foreclosing. Qwest’s NRCs were calculated by determining the amount of time Qwest employees spend on a particular activity, largely using manual processes, and then multiplying that time by the existing labor rate. *Nebraska Pricing Order* ¶¶ 178, 181. Nonetheless, despite expressly acknowledging the embedded cost nature of the NRCs, the Nebraska PSC labeled them

“forward-looking” because they “reflect all planned improvements due to additional mechanization of the service order process.” *Id.* ¶ 179; *see also id.* ¶ 180 (“Qwest testified that additional mechanization of the service order process, as negotiated in the 271 service quality process, is reflected in the ENRC.”).

50. The federal courts have already rejected the Nebraska PSC’s reasoning that an ILEC’s existing processes can be the basis for setting TELRIC-based NRCs. In the *Bell Atlantic-Delaware, Inc. v. McMahon*, 80 F. Supp. 2d 218, 250-51 (D. Del. 2000) (“*McMahon*”) the court addressed AT&T’s challenge to the NRCs established by the Delaware PSC that, like those set by the Nebraska PSC, were based on Bell Atlantic’s existing processes for provisioning UNEs. Before this Court, Verizon renewed its argument that its NRCs were “forward-looking” on the ground that, while based on current processes for providing UNEs, Verizon accounted for planned improvements to its existing systems. *See id.* at 250 (citing testimony of Verizon witness Sanford). The Court rejected that argument, finding:

[t]he mechanization of Bell’s current internal service order processes is irrelevant to the legal standard for determining network element costs. At no point in their analysis did the Hearing Examiner’s address Bell’s proposed NRC charges in light of “the most efficient telecommunications technology currently available and the lowest cost network configuration.” 47 C.F.R. §51.505(b)(1). There is simply no mention of the “most efficient, currently available” telecommunications technology – even though the Commission since has conceded that Bell’s service order processing system does not meet this standard . . . . Where, as here, an agency ignores a controlling legal standard, its rulings are arbitrary and capricious. *See Florida Power Light Co.* 470 U.S. at 743.

*McMahon*, 280 F. Supp. 2d at 251.

51. There can be no doubt that Qwest’s processes are not the most efficient available. Alltel put in considerable evidence demonstrating that its labor costs were lower and that it

could process orders more quickly than Qwest because of more advanced systems. The Nebraska PSC refused to even consider this evidence, stating that “Alltel provides no basis that demonstrates why these costs should be similar.” *Nebraska Pricing Order* ¶ 191.

52. In short, while assuming “additional mechanization” of Qwest’s existing processes does certainly mean that Qwest’s NRCs are not set on the basis of the most inefficient processes possible, that is not sufficient to make the NRCs TELRIC-compliant. TELRIC principles in this context require more than simply marginally improving the efficiency of processes that are patently inefficient. Rather, it requires a blank slate approach that disregards Qwest’s existing processes and looks to determine the “most efficient, currently available” methods for provisioning UNEs.
53. Qwest’s NRCs are invalid for a second, independent reason. The Commission included in its initial billing charge 60% of the costs of *disconnecting* a CLEC customer. *Nebraska Pricing Order* ¶¶ 195. 197.<sup>3</sup> The Nebraska PSC did so on the ground that Qwest claimed that there is “no guarantee” a CLEC will pay once a customer has left the CLEC. *Id.* Thus, a CLEC must pay up front a portion of the costs of disconnecting a customer even if that customer never actually discontinues service with the CLEC. Of course, with having to pay for “losing” a customer before it even provides services, a CLEC is at a huge competitive disadvantage in winning the customer in the first place.

---

<sup>3</sup> The Nebraska PSC admitted that it had no data on CLEC customer “churn” and that the numbers that it was using were constructed out of whole cloth. *Id.* ¶ 197.

54. **Collocation Rates.** Finally, there can be no claim by Qwest that the collocation rates adopted in the *Nebraska Pricing Order* have been found to pass muster under TELRIC. In its *Nebraska Pricing Order*, the Nebraska PSC acknowledged that the Staff had demonstrated that Qwest's proposed NRCs were substantially overstated and that it "share[d]" these "valid concerns." *Nebraska Pricing Order* ¶ 217. The Nebraska PSC was also "concerned that costs, such as engineering, essentially may be incurred once, but charged to each job, allowing them to be recovered multiple times." *Id.* Nonetheless, the Nebraska PSC made no attempt to set truly TELRIC-complaint rates, instead finding that the rates should be used as a "starting point for determining the appropriate TELRIC compliant rates." *Id.* To date, the Nebraska PSC has not initiated the promised proceeding to "reexamin[e] Qwest's collocation rates [in order] to determine more accurate TELRIC compliant rates." *Id.* ¶ 218.

**D. North Dakota**

55. The most recent UNE prices adjudicated for Qwest in North Dakota are also in clear violation of TELRIC. The North Dakota Public Service Commission last adjudicated the UNE prices charged by Qwest to AT&T in an arbitration in 1997. *AT&T Communications of the Midwest Inc. Interconnection Arbitration Application*, Case No. PU-453-96-497 (North Dakota PSC, Order Approving Arbitrated Agreement issued June 23, 1997).

56. In its final decision in the arbitration, the North Dakota PSC stated that the prices set in the arbitration were "interim" only, and were "subject to true up upon the completion of the Commission's cost study for U S West" in a subsequent case. *Id.* at 6 (Finding of Fact No. 2). Since 1997, however, the PSC has neither completed such a cost study nor

established permanent rates to replace the interim rates. *See U S West Communications, Inc. Interconnection/Wholesale Price Investigation*, Case No. PU-314-97-12 (North Dakota PSC), Findings of Fact, Conclusions of Law, and Order (Apr. 27, 2000) at 4-5. Nor has the PSC ever adjusted Qwest's interim rates for UNEs and interconnection to reflect changes in Qwest's costs since 1997.

57. Even at the outset, the 1997 arbitrated rates failed to comply with TELRIC. For example, the UNE prices set in the arbitration were designed to recover a weighted average cost of capital of 11.35 percent, based on U S West's testimony that the cost of capital proposed by AT&T, 10.01 percent, failed to reflect the assertedly "substantial increases in competition and business risk" in the post-1996 competitive environment. *See AT&T Communications of the Midwest Inc. Interconnection Arbitration Application*, Case No. PU-453-96-497, Rebuttal Testimony of U S West witness Robert G. Harris (filed Feb. 14, 1997) at 2-11; *id.*, Arbitrator's Decision (March 19, 1997), slip op. at 73. The past five years have exposed the hollowness of this claim. The relevant risks are those of Qwest's wholesale business, not its retail local business or its other, riskier ventures. The risks of incumbent suppliers of UNEs are low, and are likely to remain low for the foreseeable future. *Bell Atlantic-Delaware, Inc. v. McMahon*, 80 F.Supp.2d 218, 240-241 (D.Del. 2000). The Commission's 1996 finding that network elements are likely to remain "bottleneck, monopoly services" without "significant competition," *Local Competition Order* ¶ 702, has only been underscored by the subsequent collapse of the CLEC sector.

58. The arbitrated UNE prices included a common cost factor of 18 percent, a market even further above forward-looking efficient levels than Qwest's 13 percent markup in Idaho, *supra*. *See AT&T Communications of the Midwest Inc. Interconnection Arbitration*

*Application*, Case No. PU-453-96-497 (North Dakota PSC, Arbitrator's Decision issued March 19, 1997), slip op. at 77.

59. The North Dakota PSC has failed to establish a geographically deaveraged rate structure as required by the Commission. *Cf. Local Competition Order* ¶¶ 764-65; 47 C.F.R. § 51.507(f). In the 1997 arbitration, the PSC denied AT&T's request to establish deaveraged loop rates outright. *AT&T Communications of the Midwest Inc. Interconnection Arbitration Application*, Case No. PU-453-96-497 (North Dakota PSC), Supplemental Decision (Apr. 2, 1997) at 1-3. In 2000, the PSC approved a three-zone rate structure for two-wire loops. The PSC characterized these rates, however, merely as "interim deaveraged interim prices," based on a stipulation that "does not adopt or recognize any particular costing methodology or price deaveraging mechanism." *U S West Communications, Inc. Interconnection/Wholesale Price Investigation*, Case No. PU-314-97-12 (North Dakota PSC), Findings of Fact, Conclusions of Law, and Order (Apr. 27, 2000) at 4. "Further investigation and hearing is required to determine the appropriate methodology for permanent geographic deaveraging of unbundled network elements," the PSC stated. *Id.* at 5. No further proceedings or permanent rates have ensued, however.
60. On May 16, 2002, Qwest filed an SGAT proposing reductions in certain of its existing rates for UNEs and interconnection. The North Dakota PSC allowed the rate changes to take effect on June 7, 2002. The North Dakota PSC made no finding, however, that the reduced rates complied with the FCC's pricing standards and instituted no proceeding to address these long-outstanding issues. *Qwest Filing of a Statement of Generally Available Terms and Conditions Pursuant to 47 U.S.C. § 252(f)*, Case Nos. PU-314-97-

*Joint Declaration of Baker, Starr & Denny  
Qwest 271, WC Docket No. 02-148*

193 and PU-314-00-282. Hence, Qwest's Section 271 application for North Dakota must stand or fall on the validity of the rates set in the 1997 arbitration.

**VERIFICATION PAGE**

I declare under penalty of perjury that the foregoing Declaration is true and correct.

/s/ Natalie Baker

---

Natalie Baker

Executed on: July 2, 2002

**VERIFICATION PAGE**

I declare under penalty of perjury that the foregoing Declaration is true and correct.

/s/ Arleen Starr

\_\_\_\_\_  
Arleen Starr

Executed on: July 2, 2002

**VERIFICATION PAGE**

I declare under penalty of perjury that the foregoing Declaration is true and correct.

/s/ Douglas Denny

\_\_\_\_\_  
Douglas Denny

Executed on: July 2, 2002

TAB D

Before the  
Federal Communications Commission  
Washington, DC 20554

---

In the Matter of )

Qwest Communications International Inc., )  
Consolidated Application for Authority to Provide )  
In-Region, InterLATA Services in Colorado, Idaho, )  
Iowa, Nebraska and North Dakota )

WC Docket No. 02-148

---

**DECLARATION OF THOMAS H. WEISS  
ON BEHALF OF AT&T CORP.**

**I. BACKGROUND AND QUALIFICATIONS.**

1. My name is Thomas H. Weiss. My business address is 405 Crossway Lane, Holly Springs, N.C., 27540. I am the President of Weiss Consulting, Inc. I received a Bachelor of Science Degree in Electrical Engineering from North Carolina State University at Raleigh in January 1970. I earned a Master of Science degree in Business Management from Duke University Graduate School of Business Administration (now the Fuqua School of Business) in 1973.

2. I am a Registered Professional engineer licensed to practice in Maryland and Missouri. I am also a member of the National Society of Professional Engineers and the North Carolina Society of Professional Engineers, both in the Private Practice Divisions. I also hold memberships in three specialist branches of the Institute of Electrical and Electronic Engineers: the Communications Society, the Computer Society and the Network Society.

3. I have been an active participant in academics within various university programs. I am the author of *Public Utility Plant Investment Decisions in the Face of Advancing Technology and Regulatory Policy Reform*, Proceedings of the 27<sup>th</sup> Annual Regulatory Conference, Iowa State University, Ames (1988). I have been a speaker and a panel member at the 1984 Public Utilities Conference, University of Georgia College of Business and at the 1988 Iowa State University Regulatory Conference. I also have served as a member of the faculty at the 1989 United States Telephone Association Advanced Management Workshop, which was sponsored by the University of Kansas at Lawrence.

4. Prior to founding Weiss Consulting, Inc. in 1994 – a telecommunications consulting firm that provides technical, management and economic consulting services to federal and state governments, as well as to private businesses – I practiced as a telecommunications engineer with a national local exchange carrier, and I have also worked for private consulting firms. From January 1970 through June 1978 I was an engineer and financial manager with General Telephone Company of the Southeast, a local exchange operating company owned by GTE Corporation (now Verizon Communications, Inc.). From 1978 to 1986, I was employed as a Senior Consultant with the public utilities consulting firm, Hess & Lim, Inc. And from 1986-1994, I was Vice President of Baker G. Clay & Associates, Inc., another public utility consulting firm.

5. In 1997, I was appointed Vice President – Operations Research for Vermont Telephone Company, Inc. where, in a general management capacity over a three-year period, I was charged with responsibility to improve the company's operations efficiency, its relations with regulators in the State of Vermont, and to assist the CEO in recruiting and hiring a senior executive to be responsible for customer service and regulatory relations. In 2001, I was

engaged as a consultant to the U.S. Agency for International Development where I worked with telecommunications companies and the Telecommunications Regulators Association of Southern Africa ("TRASA") to develop regulatory accounting and cost allocation systems for implementation in TRASA's fourteen member states.

6. More generally, I am a Registered Professional Engineer with over thirty-two years of experience in the telecommunications industry. My consulting practice has focused on technology, management and regulatory issues. I have extensive experience analyzing the prices charged for services that are rendered by domestic telecommunications utilities in both wholesale and retail markets.

7. I have presented expert testimony on communications matters both in federal and state courts, and I have testified in over one hundred and forty proceedings before public utility regulators in twenty-four states and the District of Columbia. I also have testified on economic and regulatory issues before the Federal Energy Regulatory Commission. And I testified on behalf of AT&T and WorldCom before the Colorado Public Utilities Commission ("CPUC") in CPUC Docket No. 99A-577T, the most recent Qwest UNE pricing proceeding.

## **II. PURPOSE AND SUMMARY.**

8. The purpose of my Declaration is to demonstrate that the non-recurring charges ("NRCs") adopted by the Colorado Public Utilities Commission ("CPUC") for the provisioning of unbundled network elements ("UNEs") are vastly inflated by clear TELRIC errors. The NRCs adopted by CPUC for activities relating to UNE provisioning are based on Qwest's NRC cost model (ENRC, Version 2.0). As I demonstrated in my testimony before the CPUC in Docket No. 99A-577T, those Qwest cost studies contain numerous clear TELRIC errors that substantially overstate Qwest's Colorado NRCs. These errors include (1) the improper recovery

of disconnect costs at the time when a loop is initially provisioned; (2) recovery of costs for manual work activities that would be performed electronically in a forward-looking network; (3) recovery of costs for activities that are unnecessary in a forward-looking network; (4) reliance on improperly computed time estimates for various work activities; (5) recovery of nonrecurring costs that should be recovered through recurring rates; and (6) allocations of network related costs that are not properly attributable to non-recurring charges.

9. As a result of these clear TELRIC errors, Qwest's NRCs for hot cuts and basic installation are massively overstated, and create a substantial barrier to CLEC entry. As demonstrated below, many of Qwest's NRCs are inflated by more than 300%, and in some cases by more than 1,000%. In Part III of this declaration, I describe the myriad TELRIC errors that inflate Qwest's NRCs. In part IV of this declaration, I show how correcting these TELRIC errors affect Qwest's proposed hot cut rates and basic installation rates.

### **III. QWEST'S NON-RECURRING CHARGES ARE INFLATED BY CLEAR TELRIC ERRORS.**

10. The Commission has long recognized that cost-based pricing for NRCs is critical to making competitive local telephone entry economically feasible. *See, e.g., AT&T Communications*, 103 FCC 2d 277, ¶ 37 (1985) ("It is evident that nonrecurring charges can be used as an anticompetitive weapon to . . . discourage competitors"); Second Memorandum Opinion and Order on Reconsideration, *Expanded Interconnection with Local Telephone Company Facilities*, 8 FCC Rcd. 7341, ¶ 43 (1993) ("absent even-handed treatment, nonrecurring reconfiguration charges could constitute a serious barrier to competitive entry"). *See also* 47 C.F.R. § 51.507(e) ("[n]onrecurring charges . . . shall not permit an incumbent LEC to recover more than the total forward-looking economic cost of providing the applicable element"). Regardless of the level of the recurring rates charged by an Incumbent Local

Exchange Carrier (“ILEC”), an ILEC can and will evade competition if it is allowed to increase potential competitors’ costs significantly through inflated non-recurring charges. Carriers must pay NRCs up-front. If those NRCs are sufficiently overstated, then potential new entrants will not be able to afford to enter the market. Moreover, higher NRCs increase the level of market risk faced by potential new competitive local exchange market entrants because the high price of entry substantially reduces the potential competitors’ pricing flexibility relative to the pricing flexibility enjoyed by the incumbent. As described below, Qwest’s Colorado NRCs are inflated by clear TELRIC errors.

11. *Qwest Improperly Recovers Disconnect Costs From Competitive Local Exchange Carriers Through Installation NRCs.* The purpose of UNE loop installation and migration charges is to recover the one-time expenses incurred by an ILEC for installing or migrating a UNE loop to serve a CLEC customer. These one-time expenses include costs that are associated with pre-ordering activity, ordering activity, and provisioning activity. Costs that are associated with the service disconnection activity do not fall into any of these categories and, therefore, should not be included in these up-front non-recurring charges. Qwest’s NRCs do not reflect this fundamental principle.

12. Qwest’s Colorado NRCs for installation and migration of UNE loops – activities which are incurred by incumbent local exchange carriers (“ILECs”) at the time service is initiated – include costs for disconnecting the loop, which is not incurred until service is terminated. To the extent disconnect costs are actually incurred, those costs should be recovered at the time that they are incurred, not at the time of installation. By collecting those costs at the time of installation, Qwest is effectively charging CLECs for losing customers that they have only just won. And these additional up-front disconnect costs impose a substantial entry barrier.

13. In the past, Qwest justified its practice of recovering disconnect costs from its *retail* customers at the time of service installation on the ground that it is difficult to collect a disconnect charge from a departing retail customer (especially where that retail customer moves out of state). But that reasoning does not apply to the installation of lines purchased by *wholesale* customers, *i.e.* CLECs. That is why the Utah state commission recently required Qwest to remove disconnect charges from its installation NRCs.<sup>1</sup> The Utah Commission explained that “Qwest has factors in place to deal with bad debt by wholesale customers” and that “[c]urrently these factors are at a very low level (two-tenths of one percent), showing that Qwest’s concern that CLECs will not pay them is unlikely to occur.”<sup>2</sup> Unlike retail customers, CLECs are often large businesses that continuously do business with Qwest. Thus, Qwest’s concern that a CLEC will “disappear” and never pay its disconnect charges are baseless.

14. Moreover, allowing Qwest to recover disconnect charges at the time of service initiation, allows Qwest to recover costs for activities that it may never incur. In current modern automated networks, after the initial physical connection has been established between an end-user premises and the network, both ILECs and CLECs maintain “Dedicated Inside Plant” (“DIP”) and Dedicated Outside Plant” (“DOP”) to most residence and business locations. Under this so-called “DIP/DOP” arrangement, the physical path between the customer’s premises and

---

<sup>1</sup> See *Application of Qwest Corporation for Commission Determination of Prices for Wholesale Facilities and Services*, Order, Utah Public Service Commission Docket No. 00-049-105, at 10-11 (June 6, 2002) (“*Utah Order*”) (finding “that it is poor policy to charge up-front for these costs that [Qwest] . . . may not incur until much later”).

<sup>2</sup> *Utah Order* at 10-11. Moreover, the Utah Commission correctly noted that, if disconnects could properly be recovered up-front (which they cannot), those up-front disconnect charges would have to be discounted to account for the time value of money based on the average amount of time that a CLEC keeps a customer. See *Utah Order* at 11. Qwest’s Colorado disconnect charges to not account for the time value of money.

the central office remains intact after a customer's service has been discontinued, thereby enabling the carrier to leave "warm dial tone" on the access line until a new customer occupies the premises. Under this modern dedicated plant arrangement, when a customer orders service to be discontinued (disconnected), no physical plant "disconnection" takes place and no premises visit is undertaken; all that happens is that plant records are updated to change the status of the physical facilities from an "active" status to "warm dial tone."<sup>3</sup> In this modern form of the network, customers that have paid installation NRCs that include disconnection costs will have paid for services that are never performed.

15. The complex relationship between Qwest and CLECs also militates against the recovery of up-front disconnect charges. The advent of competition in the local exchange market alters the traditional relationship between connections and disconnections for network elements that are associated with an existing Qwest customer migrating to a CLEC. For example, a service that is initially provided to a retail customer by Qwest may ultimately be disconnected due to a successful migration to a CLEC. And the costs of the wholesale activity are far less than they would be in the corresponding old-fashioned retail context. A large portion of the disconnect charge that was paid by the customer to Qwest at the time the customer initially ordered service from Qwest will be a windfall to Qwest. Moreover, at the time of the migration, Qwest will recover yet another disconnect charge from the CLEC as part of the migration NRCs. Thus, allowing Qwest to recover disconnect costs in its installation and migration charges results in overstated costs to retail and CLEC customers, and a windfall to Qwest.

---

<sup>3</sup> A "warm dial tone" is the same combination of tones normally received from the central office to alert the end user that the line is ready to accept dialing signals. However, while the "standard" dial tone allows the caller to make all forms of calls, a "warm dial tone" allows dial access only to the telephone company service office and to emergency numbers (e.g., 9-1-1).

16. To remove these disconnect charges from Qwest's installation and migration NRCs, I adjusted Qwest's ENRC model so that it no longer reflects most of these disconnect charges in its connect charges.<sup>4</sup> The impact of this change, along with the impact of correcting the other TELRIC errors in Qwest's ENRC cost study is summarized in Exhibit 1.

17. *Qwest's NRCs Reflect The Costs Of Activities That Are Unnecessary In A Forward-Looking Network.* A TELRIC-compliant non-recurring cost study would compute NRCs based on the most efficient forward-looking technology available to the ILEC. Qwest's non-recurring cost study fails to comply with this basic TELRIC principle. In fact, Qwest's cost study reflects the costs of several manual activities that would (and currently can) be performed electronically. In most cases, the automated processes are far less expensive than the manual processes assumed by Qwest's cost study.

18. For example, Qwest's NRC study for a Loop Coordinated Install, Cooperative Test, First ("hot cut") assumes that two separate work groups are involved in testing activities: (1) the field installation group and (2) the service delivery implementation group. *See* Exhibit 3, pages 36-38 (attached).<sup>5</sup> Aside from the fact that the costs of the installation activities of the field installation group are not capitalized (discussed below) as they should be in a forward-looking network these testing activities would not be performed because modern, and currently-available

---

<sup>4</sup> Qwest's ENRC model makes it difficult to remove disconnect costs. My attempts to eliminate disconnection from the NRC results by setting the probability of incurring disconnect costs to zero are met with an error message stating that zero probability is not among the viable input options for disconnect costs. Therefore, I have eliminated disconnection costs from Qwest's ENRC output results by setting the disconnection labor rates to almost zero (the ENRC model requires positive, non-zero labor rate inputs, so I set the labor rate inputs applicable to disconnections to \$0.01 per hour).

<sup>5</sup> In fact, Qwest's activity listing for virtually all loop install NRCs includes testing requirements at both ends of the loop by field installation and service delivery implementation personnel.

testing equipment, enables loop testing activities to be conducted by a single technician from either end of the loop thereby eliminating (in most cases) the need for a technician from both groups to be involved on each install. For example, the 965 DSP-SA test equipment manufactured by 3M Corporation allows a single technician, operating from either end of the loop, to conduct resistance, line loss, slope, and other tests without involvement by a technician located at the other end of the loop.

19. Based on this evidence, Qwest's assumption that manual intervention by two separate workgroups will be required for each installation and migration procedure is not TELRIC-compliant. To show the impact of this plain TELRIC error on Qwest's NRCs I have recomputed Qwest's NRCs based on the assumptions that manual intervention by the service delivery implementation personnel, will be required for two percent (2%) of loop installations. These adjustments are shown in Exhibits 2 and 3 (attached).

20. *Qwest's NRCs Are Inflated By Improperly Computed Time Estimates For Various Work Activities.* Qwest's Colorado NRCs reflect Qwest's estimates for the amount of labor to complete particular NRC-related activities. Qwest's estimates of the amount of labor required to complete NRC-related activities were developed by employees that Qwest refers to as subject matter experts ("SMEs"); the SMEs provide single point estimates of the times required to perform NRC-related activities. For Qwest's NRC cost studies, it is this nominal estimate from the SME process that is multiplied by a labor rate to yield the direct cost for work groups to complete the activities necessary to bring UNEs to CLECs.

21. By relying on this single-point unit resource estimation process, Qwest overstates NRC-related labor resource requirements because Qwest's SMEs relied on their embedded (*i.e.*, not forward-looking) experience to estimate the times required to perform the activities at issue.

To compound that problem, Qwest's estimates of labor requirements do not reflect the results of any statistical study or other technique that would account for the diverse opinions of several SMEs. In short, Qwest's approach to resource requirements evaluations is not statistically valid and therefore is of little, if any, value to the objective of defining meaningful labor resource requirements.

22. For example, Qwest's NRC analyses assume that the central office frame technician will spend \*\*\* minutes on every order – \*\*\* minutes to "analyze" each order, \*\*\* minutes each to complete two cross connections \*\*\*, and \*\*\* minutes to complete (close-out) the order in the Work Force Administration ("WFA") system. From "front-to-back," as described below, this manual process should entail the expenditure of no more than 9 minutes of frame technician time to present an end-user loop to a CLEC's facilities.

23. Order "analysis" means that the frame technician simply reads the order to determine the frame locations at which jumper changes are to be made then, based on his/her most basic training, translating that information into the physical location of the jumpers (*e.g.*, horizontal or vertical side of the frame). Even a new frame technician can read an order and physically locate each one of two jumper terminals within 1.5 minutes, yielding a total order "analysis" time of 3 minutes. *See, e.g.*, Exhibit 3 (showing the NRC changes associated with a 3 minute analysis time for each order).<sup>6</sup>

---

<sup>6</sup> It should be noted that this 3-minute estimate is generous to Qwest since most basic loop installations involve only one jumper change, on the horizontal side of the frame to effect connection of an existing ILEC loop to the facilities of a CLEC.

24. Once the locations of the frame jumpers have been determined, the frame technician moves to each location where jumper activity is to occur, removes the jumper from the existing location, and reconnects the jumper at the new location – in short, this activity is a simple cross-connection that should involve no more than 2.5 minutes for each of the removal and reconnection activities. Accordingly, a total of 5 minutes for Qwest frame technicians to manually accomplish these simple tasks is sufficient for this activity. *See Exhibit 3.*

25. Having completed the physical changes necessary to accomplish the order for frame activity, it is necessary for the technician to advise Qwest's administrative systems that the required work is now complete. At Qwest, this notice is given by the frame technician using the WFA system and Qwest assumes that this interaction between the field and the administration system will require \*\*\* minutes of frame technician time for each order that requires frame activity. Actually, this process is accomplished in only one minute through a computer terminal at which the technician merely enters information necessary to identify the completed order (usually a local service request order number), the activity that was performed (usually by using work activity codes), the amount of time expended, and the time of day at which the work was completed.

26. It should be noted that this overall 9-minute work time (3 "analysis" minutes; 5 cross-connect minutes; and one records update minute) is generous to Qwest in that it is based on the time required to complete a single order when, in the real world, many such orders are completed in a group at the same frame by the same technician thereby creating economies of scale that are not recognized in either Qwest's frame work estimates or in the adjusted work times that are presented at Exhibit 3.

27. Qwest's NRC cost model also overstates the work time for Service Delivery Implementor<sup>7</sup> activities. Qwest has estimated that service delivery implementor activities will consume \*\*\* \*\* total minutes for each local service request loop order: \*\*\* \*\* minutes each to verify that the circuit is shown as available in two operations administrative systems, \*\*\* \*\* minutes to notify the customer that the circuit is available, and \*\*\* \*\* minutes post closing activities in the WFA Control Module ("WFA-CM").

28. Qwest's assumption that it will take the technician \*\*\* \*\* minutes to screen every order is unrealistic. This activity is a daily routine for experienced technicians and they should only require 1 minute or less of work time to screen the average order. Similarly, Qwest's assumption that it will be necessary for the technician to spend \*\*\* \*\* minutes to "verify" that the Central Office work has been completed is unnecessary because the technician should know whether the central office framework had been completed after screening the order.

29. Qwest's assumption that it will take \*\*\* \*\* minutes for the Service Delivery Implementor to manually notify the CLEC that work has been completed is also inaccurate. As a preliminary matter, this manual notification process should be completed electronically through e-mail or automated system downloads. A forward looking network with properly administered OSS would eliminate the need for manual processing of these activities. But even if manual notification were necessary, that notification should take a clerk or technician no longer than 1 minute to issue the notification either via e-mail or fax.

---

<sup>7</sup> Service Delivery Implementors are responsible for tying up the loose ends of a local service request order after the actual pre-ordering, ordering, and installation activities have been completed, e.g., ensuring that the required connection is shown as complete in the network administration systems, notifying the customer that the requested circuit is available, and closing-out the order in the administrative systems.

30. Qwest's assumption that the Service Delivery Implementor will have to spend \*\*\* \*\* minutes completing every order in the WFA system is also unjustified. The WFA-CM system should have been posted electronically when the Central Office Technician completed his or her work and updated the system. And even if the WFA had not been updated when the Central Office technician completed work (which would occur no more than 2% of the time), it would take less than a minute to correct or update the system. This activity would take no longer than 1 minute.

31. Overall, this entire segment of the provisioning process for basic loops should be completed electronically if integrated efficient database systems are properly administered. Qwest has inappropriately assumed that it would be necessary to perform a series of manual verifications and checks to ensure that Qwest employees have completed their work. Manual intervention by the Service Delivery Implementor should be warranted only on a small percentage of basic orders. It would be reasonable to assume that 2% of the orders require manual intervention by the Service Delivery Implementor and that the total work time required would be no more than 5 minutes.

32. *Qwest's NRCs Reflect The Costs Of Activities That Would Be Automated In A Forward-Looking Network.* A forward-looking NRC cost model should reflect the fact that a forward-looking OSS system automates most service administration features, including automated network reconfiguration and testing (especially in the loop portion of the network), and it would integrate the service administration and testing systems that are currently in place for retail markets. Qwest's cost studies do reflect the fact that its OSS systems are capable of performing these activities electronically. However, Qwest's ENRC model assumes that these processes will be performed by the OSS systems only 90% of the time. According to Qwest, a

CLEC order will “fall out” of Qwest’s OSS system 10% of the time, and will require very expensive manual processing. That assumption is not consistent with forward-looking principles.

33. A properly designed and implemented forward-looking OSS system would be capable of processing nearly 100% of all orders. Recent data submitted by Qwest in a proceeding before the Minnesota PUC confirms that fact. In particular, Qwest reported to the Minnesota PUC that Qwest *currently* succeeds in obtaining flow-through rates in its retail order processing system in the range of 94 percent to 96 percent, *i.e.*, only between 4 percent and 6 percent of orders currently are falling out of the current Qwest system-wide retail service provisioning system and, thereby, require manual handling. Given that OSS are continuously being updated and improved upon, and the fact that a formal industry-wide approach is underway to develop fully-automated and network-integrated OSS systems, a reasonable forward-looking fall-out rate would be near zero. In Exhibits 1-3 (attached), I have conservatively reflected a forward-looking fall-out rate in Qwest’s NRCs to be 2% for all valid NRC activities that would be subject to automated system fallout.

34. *Qwest’s NRCs Recover Costs That Should Be Recovered Through Recurring Charges.* Public utility accounting has traditionally required that costs which generate future benefits over a period of one year or more be capitalized on utilities’ books of accounts. Public utility pricing has generally recognized that such capitalized costs be recovered in recurring rates. Telecommunications utilities are no different than other utilities in that regard and, in fact, the FCC system of accounts (FCC Rules, Part 32) requires just such accounting for long-lived

assets.<sup>8</sup> Accordingly, Qwest also should recover these assets as recurring charges, not as non-recurring charges.

35. Many of the activities that are associated with the installation of services do, in fact, have an expected life of more than one year and, thus, must be reflected on the books of account as capitalized costs and recovered in recurring rates over the life of the associated assets (*e.g.*, loops provided in either retail or UNE markets). Qwest's NRC cost study incorrectly allocates many of these costs to NRCs, rather than to the recurring cost category. Those activities include Qwest's design, installation and "turn-up" testing<sup>9</sup> work that is undertaken to develop a new loop leased to a CLEC between an end-user and the CLEC's interface with Qwest. *See* Exhibit 3.

36. Qwest's NRCs also include cost loading that should not be attributed to nonrecurring functions. In particular, Qwest's NRCs include network operations costs that should be attributed to recurring activities. These loading factors include, product management expense, sales expenses, network operations expenses, uncollectible revenues; intangible expenses, expenses associated with network support assets, general support assets, and general purpose computers TELRIC.<sup>10</sup> Costs in these categories are designed to be recovered in monthly recurring charges. The FCC's Rules require that costs associated with corporate overheads (*e.g.*, the 67XX series of accounts) are properly allocated to charges for non-recurring costs. *See* 47 C.F.R. § 51.505(a)(2); *Local Competition Order* ¶ 694.

---

<sup>8</sup> 47 C.F.R. § 32.2000(a)(3)

<sup>9</sup> "Turn-up" testing is work associated with bringing a new loop on line to provide service between an end-user and a CLEC's facilities; turn-up testing does not include testing performed to ensure that existing loops are functioning as required.

<sup>10</sup> For example, see Exhibit 3, pages 7 and 8 (the exhibit shows that I have removed these allocations).

**IV. THE CLEAR TELRIC ERRORS IN QWEST'S NON-RECURRING COST MODEL VASTLY OVERSTATE RECURRING RATES FOR CRITICAL RATE ELEMENTS.**

37. The serious TELRIC-errors in Qwest's ENRC cost study substantially inflates several critical NRCs, creating barriers to CLEC local entry. There are two methods of providing *facilities-based* local telephone services in Colorado. First, CLECs can install a redundant network that provide lines (or radio signals) to premises in Colorado. This entry method has been adopted by Cox, which already owns cable television lines that connect to homes in Colorado. Second, CLECs can install their own switching and transmission equipment (and also obtain collocation space in Qwest central offices), and lease only unbundled loops ("UNE-L") from Qwest. Qwest's NRCs foreclose this second method of facilities-based entry in Colorado.

38. *Hot Cut NRCs*. Every time that a CLEC that provides facilities-based local telephone service via UNE-L in Colorado wins a Qwest residential or business customer, the loop serving that customer must be physically disconnected from Qwest's switching equipment and re-connected to the CLEC's switching equipment that is collocated in Qwest's central office. That process is called a "hot cut" (Qwest's cost studies refer to hot cuts as "Loop Coordinated Installs With Testing").

39. Qwest charges AT&T and other CLECs a fixed up-front NRC for performing hot cuts. Qwest's hot cut charges have always been too high, Qwest's previous NRC for a hot cut loop with testing was \$142. Qwest's newly adopted Colorado hot cut NRCs are now even higher. For every residential or business customer that a CLEC wins from Qwest, AT&T must now pay Qwest \$171.88 to have that customer's line physically transferred, in coordination with Qwest, to AT&T's facilities. Those charges are way out of line when compared to those of other ILECs that have obtained Section 271 approval. For example, Verizon charges hot cut

NRCs of \$4.07,<sup>11</sup> in Pennsylvania, and \$35 in New Jersey and New York.<sup>12</sup> There is no question that Qwest's Colorado hot cut NRC of \$171.88 is not even remotely close to being TELRIC-compliant. As discussed above, Qwest's hot cut NRCs are inflated by numerous TELRIC errors. In the recent Colorado UNE rate proceeding, AT&T's TELRIC-compliant non-recurring cost study showed that a forward-looking hot cut costs for Colorado would not exceed \$2.08.<sup>13</sup>

40. Furthermore, although Qwest's NRC cost study is so fundamentally flawed that it is not feasible to correct all of the TELRIC errors so that it produces TELRIC-compliant NRCs, I have attempted to fix the TELRIC errors discussed above. As shown in Exhibit 1, by removing disconnect costs, and adjusting costs to reflect appropriate use of automated processing, Qwest's NRC model produces hot cut NRCs of only \$13.20. Thus, according to Qwest's cost study (after correcting for the TELRIC errors in that study), its hot cut NRCs are inflated by at least 1200%.

41. *Loop Basic Install.* A CLEC that obtains a new customer that is not already served by the ILEC will require a "Basic Install" of a loop (these include new customers and customers

---

<sup>11</sup> See *Supplemental Application of Verizon New Jersey, Inc., BellAtlantic Communications, Inc. (d/b/a Verizon Long Distance), NYNEX Long Distance Company (d/b/a/ Verizon Enterprise Solutions), Verizon Global Networks, Inc., and Verizon Select Services, Inc., for Authorization to Provide In-Region InterLata Services in New Jersey*, Comments of AT&T, CC Docket No. 02-67, at 8 (filed April 8, 2002).

<sup>12</sup> See *id.* That clearly represent apples-to-apples comparisons. Qwest suggests that the appropriate hot cut rate for making comparisons is its hot cut rate without testing. See Thompson CO Decl. ¶ 75. However, Verizon carefully explained that its hot cut rates reflect numerous coordination and testing functions. See *Application of Verizon New Jersey, Inc., BellAtlantic Communications, Inc. (d/b/a Verizon Long Distance), NYNEX Long Distance Company (d/b/a/ Verizon Enterprise Solutions), Verizon Global Networks, Inc., and Verizon Select Services, Inc., for Authorization to Provide In-Region InterLata Services in New Jersey*, Lacouture & Ruesterholz Decl., CC Docket No. 01-347, ¶ 16 (filed Feb. 1, 2002) (noting that, as part of the hot cut process, Verizon has agreed to "test for the CLEC's dial tone").

<sup>13</sup> See AT&T/WorldCom Exhibit RL-2 to the testimony of Roy Lathrop, Colorado PUC Docket No. 99A-577T.

that request additional lines). Just as Qwest's inflated hot cut NRCs create a barrier to a CLEC entering and serving customers that currently obtain service from Qwest, Qwest's inflated Basic Install NRCs create a barrier to entry that can make it economically infeasible for a CLEC to obtain and serve new Colorado local telephone customers.

42. Qwest's Basic Install NRC is \$55.27. That is far higher than in other 271-approved states. In New York, New Jersey, Pennsylvania, and Georgia, Verizon's and BellSouth's corresponding Basic Install NRCs are only \$0.13, \$23.15,<sup>14</sup> \$3.01, and \$34.22 respectively. And as AT&T demonstrated in the Colorado state UNE rate proceeding, a fully TELRIC-compliant Basic Install NRC would not exceed \$0.29.

43. The reason that Qwest's Basic Install NRC is so high is that it reflects all of the serious TELRIC errors discussed above. To the extent possible, I have corrected Qwest's NRC cost model. After implementing those corrections, Qwest's NRC produces Basic Install NRCs of \$7.96, which is more in line with the rates in other 271-approved states. Thus, according to the corrected version of Qwest's NRC cost study, Qwest's Basic Install rate in Colorado is inflated by nearly 600%.

## **V. CONCLUSION**

44. For the foregoing reasons, Qwest's Colorado NRCs are substantially inflated by numerous clear TELRIC errors.

---

<sup>14</sup> For the first loop, each additional drops to \$ 20.82.

**VERIFICATION PAGE**

I declare under penalty of perjury that the foregoing Declaration is true and correct.

/s/ Thomas Weiss

---

Thomas Weiss

Executed on: July 2, 2002

# **EXHIBIT 1**

**QWEST COMMUNICATIONS INTERNATIONAL**  
**Federal Communications Commission, WC Docket No. 02-148**

**Summary Comparison, Colorado Nonrecurring Charges**

Line No.	Nonrecurring Charge Description	NRC Amount		Net Adjustment	Corrected ENRC Run		
		per Qwest	As Corrected		Summary Pages	Detail Pages	
(a)	(b)	(c)	(d)	(e)	(f)	(g)	
1	Loop Basic Install	Initial	\$55.27	7.96	(\$47.31)	1, 2	1 - 8
2		Each Additional	\$48.77	7.69	(\$41.08)	3, 4	9 - 15
3	Loop Basic Install, with Performance Testing	Initial	\$142.11	13.13	(\$128.98)	5, 6	16 - 25
4		Each Additional	\$94.09	12.84	(\$81.25)	7, 8	26 - 33
5	Loop Coordinated Install, Cooperative Testing (a/k/a "Hot Cut" Loop)	Initial	\$171.88	13.20	(\$158.68)	9, 10	34 - 43
6		Each Additional	\$94.09	12.85	(\$81.24)	11, 12	44 - 51
7	Loop Coordinated Install, w/o Testing	Initial	\$59.81	9.63	(\$50.18)	13, 14	52 - 59
8		Each Additional	\$53.31	9.37	(\$43.94)	15, 16	60 - 66

Sources:

Column (c) -- Qwest Colorado Section 271 Application, Colorado SGAT Exhibit "A"

Column (d) -- Pages 2 through 83, herein

Column (e) -- Column (d) minus Column (c)

NOTE: The figures that appear in column (d) reflect the findings reported on the Corrected ENRC Summary, adjusted for the 4% productivity adjustment ordered for NRCs by the Colorado PUC in its Decision No. C01-1302, page 71.

**EXHIBIT 2**

**REDACTED FOR PUBLIC  
INSPECTION**

**EXHIBIT 3**

**REDACTED FOR PUBLIC  
INSPECTION**