

**BEFORE THE WASHINGTON UTILITIES AND TRANSPORTATION
COMMISSION**

IN THE MATTER OF CONTINUED)
COSTING AND PRICING OF) DOCKET NO. UT-003013
UNBUNDLED NETWORK ELEMENTS,) *Part B*
TRANSPORT, TERMINATION, AND)
RESALE)

DIRECT TESTIMONY

OF

PERRY W. HOOKS, JR.

ON BEHALF OF

QWEST CORPORATION
(formerly known as U S WEST Communications, Inc.)

August 4, 2000

DIRECT TESTIMONY OF PERRY W. HOOKS, JR.
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I.IDENTIFICATION OF WITNESS

Q. PLEASE STATE YOUR NAME, BUSINESS ADDRESS AND POSITION WITH QWEST CORPORATION.

A. My name is Perry W. Hooks, Jr. I am employed by Qwest Corporation (“Qwest”), (f/k/a U S WEST Communications, Inc.), as Director, Legal and Regulatory Affairs, Interconnection Operations. My business address is 1801 California Street, Suite 2410, Denver, CO, 80202. My principal business responsibility is to testify in regulatory and legal proceedings concerning Qwest’s wholesale local services and products.

Q. PLEASE BRIEFLY REVIEW YOUR TELECOMMUNICATIONS INDUSTRY WORK EXPERIENCE.

A. I began working for U S WEST in 1984 in various legal and management positions. I worked as an attorney in the U S WEST Law Department, for the first ten years of my career, including seven years as the Chief Counsel to the Technical Operations and Network organizations of the company. Since moving into management for U S WEST, in 1995, I have served in various positions within the Strategy Development, Markets-Regulatory Strategy, Network, Carrier and the Wholesale Markets organizations. While in the Strategy Development organization, my responsibilities included oversight and conduct of competitive analysis. While in

1 the Marketing – Regulatory Strategy organization, my responsibilities included
2 supervision of company and external expert witnesses who testified concerning
3 U S WEST retail products and services, competition, and product costs. While in
4 the Network organization, I served as Director of Program Management for
5 Interconnection Operations and was responsible for the coordination of wholesale
6 local services program and project management for installation and repair processes
7 of resold finished services, interconnection services, and unbundled network
8 elements.

9 **Q. PLEASE GENERALLY DESCRIBE YOUR RESPONSIBILITIES IN YOUR**
10 **CURRENT POSITION.**

11 A. In this position within both the Carrier and the Wholesale Markets organizations of
12 Qwest, I have developed Qwest’s advocacy for service performance-related matters,
13 wholesale processes and wholesale products. In this position, I have testified on
14 behalf of Qwest concerning wholesale products and services before federal and state
15 regulatory bodies in arbitration cases, rulemakings and complaint proceedings, and
16 in courts concerning Qwest’s conformance with state and federal
17 telecommunications laws and regulations. I have been in my current position since
18 January 1997.

1 **Q. PLEASE BRIEFLY REVIEW YOUR FORMAL HIGHER EDUCATION**
2 **BACKGROUND.**

3 A. I hold a Juris Doctorate degree from the University of Michigan Law School in Ann
4 Arbor, Michigan, and two bachelors degrees (Three Majors: Economics;
5 Management; and Political Science) from Washburn University in Topeka, Kansas.

6 **II.PURPOSE OF DIRECT TESTIMONY**

7 **Q. WHAT IS THE PURPOSE OF YOUR DIRECT TESTIMONY?**

8 A. This Direct Testimony describes Qwest's UNEs and related products and services.
9 Qwest seeks to establish recurring and nonrecurring charges for these UNEs and
10 related products and services. UNE costs and the costs of the related products and
11 services are described in the testimony of Qwest witness Teresa K. Million filed in
12 this docket.

13 The products and services that I will address in this testimony include:

- 14 A. High Capacity Loops (DS1 and DS3)
15 B. Unbundled Sub-Loop (DS0 Distribution/Feeder, DS1 Capable Feeder)
16 Field Connection Point (FCP)
17 Unbundled Dedicated Interoffice Transport (UDIT) and Extended Unbundled Dedicated Interoffice

1 **Q. WERE THE FCC'S ORDERS AND REGULATIONS APPEALED TO THE**
2 **COURTS?**

3 A. Yes, they were. Those orders and regulations were the subject of many appeals to the
4 federal courts. Those appeals were consolidated into one appeal heard by the U.S.
5 Court of Appeals for the Eighth Circuit ("Eighth Circuit").

6 **Q. WERE APPEALS MADE SPECIFICALLY CONCERNING THE SUBJECT OF**
7 **"UNBUNDLED NETWORK ELEMENTS"?**

8 A. Yes. Several of those appeals centered on the FCC's definitions of UNEs, the terms
9 and conditions to be applied when ILECs were to provide access to UNEs, and the
10 pricing of the UNEs.

11 **Q. ARE THE SUBJECTS OF THOSE APPEALS STILL RELEVANT TO THIS**
12 **COST PROCEEDING?**

13 A. Yes. The definitions of UNEs, the terms and conditions to be applied when Qwest
14 provides access to its network elements, and the pricing of the UNEs are relevant to
15 this cost proceeding.

16 **Q. DID THE EIGHTH CIRCUIT RULE ON MATTERS RELEVANT TO THIS**
17 **COST PROCEEDING?**

18 A. Yes, it did. Several subjects contained in the Eighth Circuit's opinion are relevant to

1 this cost proceeding. Those subjects are:

2 The FCC's list of Unbundled Network Elements (47 C.F.R. § 51.319);

3 UNE Pricing (47 C.F.R. § 51.313, § 51.503 and § 51.505).

4 **Q. WAS THE EIGHTH CIRCUIT'S OPINION APPEALED TO THE UNITED**
5 **STATES SUPREME COURT?**

6 A. Yes, it was. The Eighth Circuit's opinion, captioned Iowa Utilities Board v. FCC,
7 120 F. 3d 753 (1997), was appealed to the U.S. Supreme Court. Last year, in AT&T
8 Corp. v. Iowa Utilities Bd., 119 S.Ct. 721 (1999), the Supreme Court reversed in part,
9 affirmed in part and remanded the case to the Eighth Circuit Court for further review.
10 Recently, on July 18, 2000, the Eighth Circuit issued an opinion on remand which is
11 discussed below.¹

12 **Q. DID THE SUPREME COURT RULE ON THE TWO SUBJECTS THAT YOU**
13 **EARLIER LISTED FROM THE EIGHTH CIRCUIT'S OPINION?**

14 A. Yes, it did.

15 **Q. WHAT DID THE TWO COURTS RULE WITH RESPECT TO THE FCC'S**

¹ Iowa Utils. Bd. v. FCC at al., Case No. 96-3321. On petition for review of an Order of the FCC. (8th Cir., July 18, 2000).

1 **LIST OF UNBUNDLED NETWORK ELEMENTS?**

2 A. The Eighth Circuit received a number of ILEC challenges to the effect that the FCC’s
3 list of UNEs was too inclusive. In the ILECs’ view, the FCC did not follow the Act’s
4 definition of “network element”² nor did the FCC properly apply the Act’s “necessary
5 and impair” standard.³ The Eighth Circuit held that the FCC’s interpretations of the
6 Act’s “network elements” definition and the Act’s “necessary and impair” provisions
7 were reasonable and hence lawful.⁴ The Supreme Court, however, reversed the
8 Eighth Circuit Court’s opinion concerning the FCC’s application of the Act’s
9 “necessary” and “impair” standard and invalidated the FCC’s list of unbundled
10 network elements.⁵

11 **Q. WHY IS THAT RELEVANT IN THIS PROCEEDING?**

12 A. It is relevant because following the Supreme Court’s decision to vacate 47 C.F.R. §
13 319, the FCC was forced to issue a new list of unbundled network elements. That
14 new list was published in the FCC’s “UNE Remand Order.”⁶ Cost and pricing for the
15 UNEs on that new list is the topic of this proceeding.

1 ² 47 U.S.C. § 153(r)(45)

1 ³ 47 U.S.C. § 251(d)(2)

1 ⁴ 120 F.3d at 811

1 ⁵ 119 S. Ct. at 736

1 ⁶ In re Implementation of the Local Competition Provisions of the Telecommunications
2 Act of 1996, CC Docket No. 96-98, Third Report And Order And Fourth notice of
3 Proposed Rulemaking, 99-238 (“UNE Remand Order”).

1 **Q. WHAT ARE THE UNES IDENTIFIED BY THE FCC IN ITS UNE REMAND**
2 **ORDER?**

3 A. In its UNE Remand Order,⁷ the FCC identified the following as “network elements”
4 to be unbundled:

5 Loops;⁸

6 Sub Loops;⁹

7 Network Interface Devices (NIDs);¹⁰

8 Local Switching;¹¹

9 Interoffice Transmission Facilities;¹²

10 Signaling Networks and Call-Related Data Bases;¹³ and

11 Operations Support Systems.¹⁴

1 ⁷ Ibid.

1 ⁸ Id. at ¶’s 163-202.

1 ⁹ Id. at ¶’s 203-230.

1 ¹⁰ Id. at ¶’s 231-241.

1 ¹¹ Id. at ¶’s 242-318.

1 ¹² Id. at ¶’s 319-380.

1 ¹³ Id. at ¶’s 381-421.

1 ¹⁴ Id. at ¶’s 422-438.

1 Several of these unbundled network elements will be discussed later in this testimony.

2 **Q. WHEN DID THE NEW LIST OF UNES GO INTO EFFECT?**

3 A. Several rules identifying part of the new list of UNEs went into effect on February 17,
4 2000. The remainder of the UNEs went into effect on May 17, 2000.

5 **Q. PLEASE BRIEFLY REVIEW THE RELEVANT HISTORY OF FCC AND**
6 **COURT DECISIONS REGARDING UNE COMBINATIONS.**

7 A. In its Iowa Utilities Board decision, the United States Court of Appeals for the Eighth
8 Circuit vacated, among other rules at 47 C.F.R. § 51.315, the rules articulated at § 51.315
9 (c) and (d).¹⁵ Indeed, in the FCC's Third Report and Order and Fourth Notice of
10 Proposed Rulemaking, released November 5, 1999,¹⁶ the FCC itself did not reinstate
11 rules 315(c)-(f). In its July 18, 2000 ruling, the Eighth Circuit affirmed its decision to
12 vacate rules 315(c)-(f).¹⁷

13 **Q. WHAT ARE THE RULES AT SECTION 315 (c) AND (d) THAT WERE**
14 **VACATED BY THE EIGHTH CIRCUIT COURT?**

1 ¹⁵ *Iowa Utils. Bd. v. FCC*, 120 F.3d 753, 813 & n. 39 (8th Cir. 1997), *aff'd in part, rev'd in*
2 *part sub nom, AT&T Corp. v. Iowa Utils. Bd.*, 525 U.S. 366 (1999) ("*Iowa Utilities*
3 *Board*").

1 ¹⁶ *In the Matter of Implementation of the Local Competition Provisions of the*
2 *Telecommunications Act of 1996*, CC Docket No 96-98, Third Report and Order and
3 Fourth Further Notice of Proposed Rulemaking (Rel. Nov. 5, 1999).

1 ¹⁷ *Iowa Utils. Bd. v. FCC et al.*, Case No. 96-3321 (8th Cir., 2000.)

1 A. The rule at 47 C.F.R. Section 51.315 (c) that was vacated stated, in relevant part:

2 Upon request, an incumbent LEC shall perform the functions
3 necessary to combine unbundled network elements in any
4 manner, even if those elements are not ordinarily combined in
5 the incumbent LEC's network
6

7 The vacated rule in 47 C.F.R. Section 51.315 (d) stated, in relevant part:

8 Upon request, an incumbent LEC shall perform the functions
9 necessary to combine unbundled network elements with
10 elements possessed by the requesting telecommunications
11 carrier in any technical feasible
12 manner
13

14 **Q. HAS THE NINTH CIRCUIT COURT OF APPEALS ADDRESSED THESE**
15 **RULES?**

16 A. Yes. The Ninth Circuit addressed the issue of the requirement to combine unbundled
17 elements on appeal in U S WEST v. MFS¹⁸. The Court affirmed the district court's
18 decision to sustain a contract provision requiring U S WEST to combine unbundled
19 network elements at the request of MFS. In reaching this decision the Court further
20 determined that, because FCC regulation prohibits incumbent carriers from separating
21 already-combined network elements, it "necessarily follows . . .that requiring U S
22 WEST to combine unbundled network elements is not inconsistent with the Act."¹⁹

1 ¹⁸ U.S. West Communications v. MFS Intelenet, Inc., 193 F.3d 1112 (9th Cir. 1999).

1 ¹⁹ Id.

1 **Q. WHAT IS QWEST'S POSITION IN LIGHT OF THESE CONFLICTING**
2 **HOLDINGS?**

3 **A. Qwest strongly believes that the 9th Circuit ruling is incorrect, and that the Act does**
4 **not require Qwest to combine elements for CLECs. The 9th Circuit decision was**
5 **premised on an incorrect interpretation of the Supreme Court decision and the 8th**
6 **Circuit's prior ruling on the "additional combinations" rule. The 8th Circuit, in its**
7 **July 18, 2000 decision, stated:**

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35 Nevertheless, Qwest recognizes that the 9th Circuit decision is the law in
36 Washington, and Qwest will make available both pre-existing and new UNE
37 combinations when requested by CLECs in Washington, as required by that decision.

1 **IV.DESCRPTION OF UNBUNDLED NETWORK ELEMENT (UNE) PRODUCTS**
2 **AND OTHER SERVICES**

3 **A.High Capacity Loops (DS1 and DS3)**

4 **Q. PLEASE DESCRIBE QWEST'S DS1 AND DS3 UNBUNDLED LOOPS.**

5 A. Qwest's Unbundled DS1 and DS3 Loops are transmission paths capable of carrying
6 specifically formatted and line coded digital signals. These digital signals may be
7 ISDN, DS1, DS3, ADSL or xDSL-I types. DS1 and DS3 unbundled loops may be
8 provided using a variety of transmission technologies including but not limited to
9 metallic wire, metallic wire based digital loop carrier and fiber optic fed digital carrier
10 systems.

11 **Q. PLEASE DESCRIBE THE RECURRING CHARGES APPLICABLE TO**
12 **QWEST'S DS1 AND DS3 UNBUNDLED LOOP OFFERINGS?**

13 A. A recurring charge applies for the first DS1 and DS3 unbundled loop ordered by the
14 CLEC. A separate recurring charge applies for each additional DS1 or DS3
15 unbundled loop ordered by the CLEC. The proposed recurring charges for DS1 and
16 DS3 Unbundled Loops are included in Exhibit PWH-2 of this testimony.

17 **Q. PLEASE DESCRIBE QWEST'S NONRECURRING CHARGES.**

1 A. The following types of Installation Charges apply to Qwest's DS1 and DS3 loops.
2 The charges are based upon the nature of the installation that the CLEC requests, i.e.
3 Basic Installation (existing service); Basic Installation with Performance Testing (new
4 service); Coordinated Installation With Cooperative Testing; and Coordinated
5 Installation Without Testing (existing service).

6 **Q. PLEASE DESCRIBE BASIC INSTALLATION.**

7 A. Basic Installation may be ordered for existing DS1 and DS3 service only. With the
8 Basic Installation, Qwest disconnects the loop from its current termination and
9 delivers it via the Interconnection Tie Pairs (ITP) to the point of demarcation. Qwest
10 will notify the CLEC when the work activity is complete. A Basic Installation charge
11 applies for the first loop and each additional loop that the CLEC wishes to order.
12 Nonrecurring charges are included in Exhibit PWH-2 of this testimony.

13 **PLEASE DESCRIBE BASIC INSTALLATION WITH PERFORMANCE TESTING.**

14 A. Basic Installation with Performance Testing is the minimum level of installation
15 required for new DS1 and DS3 service. QWEST will complete the circuit wiring and
16 perform the required performance tests as described in Qwest's Technical Publication
17 77384 to ensure that the new circuit meets the required parameter limits. The test
18 results will be forwarded to the CLEC by Qwest. Basic Installation with Performance
19 Testing charges apply to the first and each additional loop so installed. The

1 nonrecurring charges are included in Exhibit PWH-2 of this testimony.

2 **Q. PLEASE DESCRIBE COORDINATED INSTALLATION WITH**
3 **COOPERATIVE TESTING.**

4 A. Coordinated Installation with Cooperative Testing may be ordered for new or existing
5 DS1 and DS3 service. Coordinated Installation includes cooperative testing and
6 applies when an existing Qwest end user or a CLEC end user changes to another
7 CLEC. At the appointed time, Qwest will disconnect the loop from its current
8 termination and deliver it to the point of demarcation in coordination with the CLEC.
9 Qwest will complete the required performance tests and any other testing requested
10 by the CLEC. If the CLEC requests testing that exceeds the testing requirements
11 contained in Qwest's Technical Publication 77384, additional nonrecurring charges to
12 cover such testing will be billed to the CLEC. Coordinated Installation with
13 Cooperative Testing charges apply to the first loop and each additional loop so
14 installed. The nonrecurring charges are contained in Exhibit PWH-2 of this testimony.

15

16 **Q. PLEASE DESCRIBE COORDINATED INSTALLATION WITHOUT**
17 **TESTING.**

18 A. Coordinated Installation Without Testing may be ordered for 2-wire analog loop start
19 or ground start Unbundled Loops. When an existing Qwest end user or a CLEC end

1 user changes to another CLEC, Qwest will disconnect the loop and deliver it to the
2 requesting CLEC via an ITP to the demarcation point. This option offers the CLEC
3 the ability to coordinate the conversion activity, thus allowing the CLEC's end user
4 the ability to limit any service interruption. At the appointed time, Qwest will
5 disconnect the loop from its current termination and delivers it via an ITP to the point
6 of demarcation. Coordinated Installation Without Cooperative Testing charges apply
7 to the first and each additional loop so installed. Nonrecurring charges are included
8 in Exhibit PWH-2 of this testimony.

9 **B.Unbundled Sub-Loop (DS0 Distribution Feeder, DS1 Capable Feeder)**

10 **Q. WHAT IS A SUB-LOOP?**

11 **A. A Sub-Loop is any portion of a loop at which it is technically feasible to access**
12 **Qwest's terminals in outside plant, i.e. an accessible terminal, pole, pedestal, Feeder**
13 **Distribution Interface (FDI) or Minimum Point Of Entry (MPOE) including inside**
14 **wire. An accessible terminal is any point on the loop where technicians can access**
15 **the wire or fiber within the cable without removing a splice case and/or digging up or**
16 **trenching underground to reach the wire within.**

17 **Q. PLEASE DESCRIBE QWEST'S DS0 DISTRIBUTION AND FEEDER SUB-**
18 **LOOP OFFERINGS?**

1 A. Qwest's proposed rates for DS0 feeder and distribution sub-loops are based on the
2 relationships of unbundled loop distribution and feeder investment to total
3 investment. Because Qwest has deaveraged the sub-loops in the same manner as
4 unbundled loops, these percentage relationships are established for each deaveraging
5 zone to arrive at deaveraged DS0 distribution and feeder sub-loop recurring rates.
6 Both recurring and nonrecurring averages are included in Exhibit PWH-2 of this
7 testimony.

8 **Q. PLEASE DESCRIBE QWEST'S DS1 CAPABLE FEEDER SUB-LOOP**
9 **OFFERING.**

10 A. The DS1 Capable Feeder Loop is a digital transmission path that is provisioned from
11 a Qwest central office network interface to a Field Connection Point (FCP). The DS1
12 Capable Feeder Loop transports bi-directional DS1 signals with a transmission rate of
13 1.544 Mbps.

14 **Q. DOES QWEST SEEK TO APPLY RECURRING AND NONRECURRING**
15 **CHARGES TO THE DS1 CAPABLE FEEDER LOOP?**

16 A. Yes. A recurring and nonrecurring charge applies for the first and each additional
17 DS1 capable feeder loop ordered by the CLEC. Recurring rates and nonrecurring
18 charges are included in Exhibit PWH-2 of this testimony.

1 **C.Field Connection Point (FCP)**

2 **Q. PLEASE DESCRIBE QWEST'S FIELD CONNECTION POINT (FCP)**

3 **OFFERING.**

4 **A. Qwest's FCP offering allows a CLEC to interconnect with Qwest outside of the**
5 **central office location where technically feasible. FCP allows a CLEC to access**
6 **Unbundled Sub-Loops. The FCP must be in place before Sub-Loop orders are**
7 **processed. The only use of the FCP is to provide access to U S WEST Sub-Loops.**

8 **Q. WHICH NONRECURRING CHARGE ASSOCIATED WITH THE FCP DOES**
9 **QWEST WISH TO INTRODUCE?**

10 **A. Qwest wishes to introduce the Field Connection Point Quotation Preparation Fee**
11 **which applies to the FCP. Qwest will develop a quote for the work to be performed**
12 **based on the information provided by the CLEC. The Field Connection Point**
13 **Quotation Preparation Fee is included in Exhibit PWH-2 of this testimony.**

14 **D.Unbundled Dedicated Interoffice Transport (UDIT) and Extended Unbundled**

15 **Dedicated Interoffice Transport (EUDIT)**

16 **Q. PLEASE DESCRIBE QWEST'S UDIT PRODUCT.**

17 **A. Qwest's Unbundled Dedicated Interoffice Transport (UDIT) product provides the**

1 CLEC with a single transmission path between two Qwest wire centers in the same
2 LATA and state. A UDIT can also provide the CLEC with a path between one CLEC
3 collocated in one Qwest wire center and another CLEC collocated in a different
4 Qwest wire center. UDITS are available in a variety of bandwidths where facilities
5 are available. The CLEC can assign channels within the UDIT facilities and transport
6 voice or data over those facilities.

7 **Q. WHICH UDITS ARE INCLUDED IN THIS COST PROCEEDING?**

8 A. UDITS which are included in this cost proceeding are those available in OC-3
9 (Optical Carrier, level 3) and OC-12 bandwidths.

10 **Q. WHAT RECURRING CHARGES DOES QWEST PROPOSE FOR THE OC-3**
11 **AND OC-12 UDIT?**

12 A. Qwest proposes recurring charges that are based on both the distance-sensitive and
13 flat-rated bandwidth-specific interoffice transmission path designed to a frame or
14 equivalent in each connecting Qwest Wire Center. There is both a recurring fixed rate
15 and a mileage sensitive element based on the V&H coordinates of the UDIT. The
16 mileage is calculated between the originating and terminating central offices.
17 Following are descriptions of the rate elements included in Exhibit PWH-2 of this
18 testimony.

1 **Q. PLEASE DESCRIBE THE E-UDIT.**

2 **A. Extended Unbundled Dedicated Interoffice Transport (EUDIT) provides the CLEC**
3 **with a bandwidth specific transmission path between the Qwest serving wire center**
4 **and the CLEC's wire center or an IXC's point of presence located within the same**
5 **Qwest serving wire center area. EUDIT is made available in a variety of bandwidths**
6 **where facilities are available. The CLEC can assign channels and transport its choice**
7 **of voice or data.**

8 **Q. WHAT RECURRING CHARGES DOES QWEST PROPOSE FOR THE E-**
9 **UDIT?**

10 **EUDIT is a flat-rated, bandwidth-specific interoffice transmission path. Therefore, there**
11 **are no proposed distance sensitive charges as there are with UDITs. The proposed**
12 **OC-3 E-UDIT and OC-12 E-UDIT rates are included in Exhibit PWH-2 of this**
13 **testimony.**

14 **Poles, Ducts and Right of Way**

15 **WHICH ELEMENTS WITHIN THE CATEGORY OF POLES, DUCTS AND**
16 **RIGHT OF WAY DOES QWEST SEEK TO INTRODUCE CHARGES FOR**
17 **IN THIS COST DOCKET?**

18 **Qwest seeks to introduce the following nonrecurring charge elements. Pole Inquiry**

1 Fee- Per Mile, Innerduct Inquiry Fee – Per Mile, Field Verification Fee –Poles Per
2 Pole, and Field Verification Fee – Manhole Per Manhole.

3 **PLEASE DESCRIBE THE ACTIVITIES ASSOCIATED WITH THE POLE AND**
4 **INNERDUCT INQUIRY FEES.**

5 The Inquiry Fee is a non-refundable pre-paid charge used to recover the costs associated
6 with performing an internal record review to determine if a requested route and/or
7 facility is available for lease. Separate Inquiry Fees apply for poles and for
8 innerduct. These Fees are included in Exhibit PWH-2 of this testimony.

9 **Q. PLEASE DESCRIBE THE ACTIVITIES ASSOCIATED WITH THE FIELD**
10 **VERIFICATION FEES.**

11 A. Field Verification Fee is a non-refundable pre-paid charge which recovers the
12 estimated actual costs for a field survey verification required for a route and to
13 determine scope of any required Make-Ready work. The estimated pre-paid fees
14 are billed in advance. Separate Field Verification Fees apply for poles and for
15 manholes. These Fees are included in Exhibit PWH-2 of this testimony.

16 **F.Unbundled Dark Fiber (UDF)**

17 **Q. WHAT IS UNBUNDLED DARK FIBER (UDF).**

1 A. Unbundled Dark Fiber (UDF) is a deployed, unlit pair of fiber optic cable or strands
2 that connects two points within Qwest's network.

3 UDF exists in two distinct forms:

4 UDF Interoffice Facility (UDF-IOF), which constitutes an existing route between two
5 Qwest wire centers; and

6 (II) UDF-Loop, which constitutes an existing loop between a Qwest wire center and
7 either a fiber distribution panel located at an appropriate outside plant structure
8 or an end-user customer premises.

9 **Q. WHAT RECURRING CHARGES APPLY TO UDF?**

10 A. The following describes the recurring charges that apply to UDF:

11 **Unbundled Dark Fiber - IOF Recurring Rate Elements**

12 a) UDF-IOF Fiber Interoffice, (Per Route Mile) Rate Element. This recurring rate
13 element applies to the transmission path between the two Qwest wire centers.

14 This is a mileage sensitive element based on the route miles of the UDF. S

15 included in Exhibit PWH- The applicable recurring rate is included in Exhibit

16 PWH-2 of this testimony.

1 UDF-IOF Fiber Pair Termination Rate Element. This rate element has both a
2 recurring and non-recurring component and provides a termination at the
3 interoffice Fiber Distribution Panel within the Qwest Wire Center. Because the
4 UDF-IOF terminates in at least two Qwest central offices, at least two UDF-IOF
5 terminations would be applied. The applicable recurring rates are included in
6 Exhibit PWH-2 of this testimony.

7 c) UDF-IOF Two Fiber Cross-Connection Rate Element. This rate element has
8 both a recurring and nonrecurring component and is used to extend the optical
9 connection from the Interoffice Fiber Distribution Panel to the CLEC's optical
10 demarcation point located at the Interconnection Distribution Frame being used
11 by the CLEC. Because there are two ends of the fiber requiring two cross-
12 connections, at least two UDF-IOF fiber cross-connection charges would be
13 applied. The applicable recurring rates are included in Exhibit PWH-2 of this
14 testimony.

15 **Unbundled Dark Fiber – Loop Recurring Rate Elements.**

16 a) UDF-Loop Fiber Transport (Per Route) Rate Element: This rate element applies
17 to the transmission path between the Qwest wire center and the end-user premise
18 or structure. The applicable recurring rate is included in Exhibit PWH-2 of this
19 testimony.

1 recovering rate for high side and low side multiplexing.

2 **H. Enhanced Extended Link (EEL)**

3 **GENERALLY DESCRIBE ENHANCED EXTENDED LINKS (EELS)**

4 Enhanced Extended Links (EELs) provide the CLEC with the ability to serve an end user
5 by “extending” the end user’s loop from the end office which serves that end user to a
6 different end office in which the CLEC is located. EELs allow the CLEC to aggregate
7 loops at fewer of its locations, and thereby increase its efficiency by allowing the
8 CLEC to transport the aggregated loops over high capacity facilities to the CLEC’s
9 central switching location.

10 **WHICH ASPECT OF EELS DOES QWEST SEEK TO INTRODUCE IN THIS COST**
11 **PROCEEDING?**

12 Qwest seeks to introduce nonrecurring charges that will recover the costs associated with
13 the specific activities related to establishing an EEL link. Nonrecurring charges for
14 EELS that utilize DSO, DS1 and DS3 bandwidths and DS1 and DS3 EELs Transport
15 Multiplexing are addressed.

16 **Q. WHY ISN’T QWEST FILING RECURRING RATES FOR EELS IN THIS**
17 **DOCKET?**

1 A. As described in Ms. Million's testimony, the recurring rates for EELs come from the
2 combination of the recurring rates for UNEs that comprise the service. The EEL is a
3 combination of loops, multiplexing equipment and dedicated interoffice transport for
4 which Qwest has either previously filed costs and rates or is doing so in this
5 proceeding. Because CLECs have a variety of bandwidth options from which to
6 choose to construct EELs, the ultimate recurring rates will depend on the particular
7 combination of elements selected for each specific EEL configuration.

8 **PLEASE DESCRIBE DSO, DS1 AND DS3 EELS.**

9 A. EEL consists of a combination of loop and interoffice facilities and may also include
10 multiplexing or concentration capabilities. EEL transport and loop facilities may
11 utilize DS0, DS1 or DS3 equivalent bandwidths.

12 **PLEASE GENERALLY DESCRIBE DS1 AND DS3 EELS TRANSPORT**

13 **MULTIPLEXING.**

14 The Multiplexed DS1 EEL is a Qwest facility that provides a transmission path from a
15 CLEC's demarcation point in a Qwest wire center to the DS1 Multiplexer in the
16 Qwest serving wire center within the same LATA. The Multiplexed DS1 EEL
17 includes the interoffice facility and multiplexing equipment. It transports bi-
18 directional DS1 signals with a nominal transmission rate of 1.544Mbps and will meet
19 the design requirements specified in Technical Publication 77403.

1 The Multiplexed DS3 EEL is a Qwest facility that provides a transmission path from a
2 CLEC's demarcation point in a Qwest wire center to the DS3 Multiplexer or
3 equivalent in the Qwest serving wire center within the same LATA. The Multiplexed
4 DS3 EEL includes the interoffice facilities and multiplexing equipment. It transports
5 bi-directional DS3 signals with a nominal transmission rate of 44.736 Mbit/s and will
6 meet the design requirements specified in Technical Publication 77403.

7 **WHAT DSO, DS1 AND DS3 EEL CHARGES DOES QWEST SEEK APPROVAL**
8 **FOR IN THIS COST PROCEEDING?**

9 A. Qwest seeks approval for nonrecurring charges applicable to the first and each
10 additional DSO, DS1 and DS3 EEL. The nonrecurring charges are included in
11 Exhibit PWH-2 of this testimony.

12 **Q. WHAT OTHER EELS CHARGES DOES QWEST SEEK APPROVAL FOR IN**
13 **THIS COST PROCEEDING?**

14
15 A. Qwest seeks approval for DS1 and DS3 EEL Transport Multiplexing. The applicable
16 nonrecurring charges are included in Exhibit PWH-2 of this testimony.

1 **I.UNE Platform Combinations**

2 **Q. WHICH UNE PLATFORM COMBINATIONS DOES QWEST OFFER?**

3 A. Qwest offers five standard UNE Combinations that consist of pre-existing UNEs
4 which are combined to serve existing customers. Qwest will also offer combinations
5 of UNEs not previously combined to serve new customers.

6 **Q. PLEASE IDENTIFY THE FIVE STANDARD UNE COMBINATIONS THAT**
7 **QWEST OFFERS.**

8 A. The five standard UNE Combinations include: (i) 1FR/1FB Plain Old Telephone
9 Service (POTS), (ii) Local Exchange Private Line (subject to the limitations set forth
10 below) (iii) ISDN – either Basic Rate or Primary Rate, (iv) Digital Switched Service
11 (DSS) and (v) PBX Trunks.

12 **Q. PLEASE DESCRIBE QWEST’S UNE COMBINATION FOR 1FR/1FB LINES.**

13 A. Qwest offers 1FR/1FB UNE Combinations in a pre-existing combined state to CLECs
14 that request such service. The UNE Combination of 1FR/1FB lines consists of the
15 following UNEs: Analog - 2 wire voice grade loop, Analog Line Side Port, Shared
16 Transport and, if desired, Vertical Features. The price for the 1 FR/1FB UNE
17 Combination is located in Exhibit PWH-2 of this testimony.

1 **Q. PLEASE DESCRIBE QWEST'S LOCAL EXCHANGE PRIVATE LINE UNE**
2 **COMBINATION AND THE LIMITATION FOR THE PROVISION OF THIS**
3 **SERVICE.**

4 A. Qwest offers Local Exchange Private line circuits in their pre-existing combined state
5 to a CLEC as UNE Combinations only when the CLEC establishes that such circuits
6 will carry a significant amount of local exchange traffic to a particular end user
7 customer.

8 **Q. WHAT IS THE BASIS FOR THE LIMITATION OF USE OF THE PRIVATE**
9 **LINE UNE COMBINATION BY THE CLEC?**

10 A. Qwest will not permit the use of local exchange private lines to create a UNE
11 Combination unless the CLEC establishes that it is using the UNE Combination to
12 provide a "significant amount of local exchange traffic to a particular end-user" as
13 recognized by the FCC in its November 24, 1999 Supplemental Order²⁰ and later on
14 June 2, 2000 in the FCC's Supplemental Order Clarification²¹.

15 The phrase "significant amount of local exchange traffic" was used in the FCC's

1 ²⁰ *In the Matter of Implementation of the Local Competition Provisions of the*
2 *Telecommunications Act of 1996*, CC Docket No. 96-98. (November 24, 1999)
3 ("Supplemental Order").

1 ²¹ *In the Matter of Implementation of the Local Competition Provisions of the*
2 *Telecommunications Act of 1996*, FCC Docket No.: CC-96-98, Supplemental Order
3 Clarification, Adopted: May 19, 2000, Released; June 2, 2000.

1 November 24, 1999 Supplemental Order in CC Docket 96-98. The FCC recognized
2 the need to address the impact of unbundling rules on incumbent LECs' special
3 access revenues. In a Fourth Further Notice of Proposed Rulemaking contained in the
4 November 24, 1999 Supplemental Order, the FCC concluded that "[IXCs] may not
5 convert special access services to combinations of unbundled loops and transport
6 network elements . . ." The FCC allowed, however, that the "constraint does not
7 apply if an IXC uses combinations of unbundled network elements to provide a
8 significant amount of local exchange traffic, in addition to exchange access service, to
9 a particular customer."

10 **Q. WHAT MUST A CLEC DEMONSTRATE IN ORDER TO CONVERT**
11 **FACILITIES USED IN THE PROVISION OF SPECIAL ACCESS SERVICES**
12 **TO A UNE COMBINATION?**

13 In order to be consistent with the FCC's Supplemental Order, a CLEC must demonstrate that
14 it is using the UNE combination to provide "a significant amount of local exchange
15 traffic . . . to a particular customer." Special access service may be converted to an
16 unbundled loop/transport combination used to provide local exchange service when:

17 For the conversion of services to combinations of unbundled network elements, at least
18 50% of the activated channels are used to provide originating and terminating local
19 dial tone service and at least 50 % of the traffic on each of these local dial tone
20 channels is local voice traffic (measured based on the incumbent's local exchange
21 area); and
22

1 the entire loop facility has at least 33% local voice traffic; and
2
3 if a loop/transport combination includes multiplexing, each of the multiplexed facilities
4 must meet the above criteria for this option. For example, if DS1 loops are
5 multiplexed on to DS3 transport, each of the individual DS1 facilities must meet
6 the criteria for this option in order for the DS1/DS3 loop/transport combination to
7 qualify for UNE treatment; and
8
9 this option does not allow loop/transport combinations to be connected to ILEC
10 services.
11
12

13 **Q. PLEASE DESCRIBE QWEST'S UNE COMBINATION FOR PBX TRUNK**
14 **SERVICE.**

15 A. PBX Trunks that are already in their pre-existing combined state are available to a
16 requesting CLEC as a UNE Combination. UNE-P-PBX includes the following pre-
17 existing combination of UNEs: DS1 capable loop, DS-1 PRI ISDN Trunk Port and
18 Shared Transport.

19 **Q. PLEASE DESCRIBE QWEST'S PROPOSAL FOR OFFERING THE UNE**
20 **COMBINATION FOR DIGITAL SWITCHED SERVICE (DSS)**

21 A. DSS UNE Combinations that are already in their pre-existing combined state are
22 available to the CLEC as a UNE Combination.

23 **Q. PLEASE DESCRIBE QWEST'S PROPOSAL FOR OFFERING THE**
24 **INTEGRATED SWITCHED DIGITAL NETWORK (ISDN) UNE**
25 **COMBINATION.**

1 A. ISDN lines that are already in their pre-existing combined state are available to CLEC
2 as a UNE Combination. There are two types of UNE-P-ISDN: basic rate (UNE-P-
3 ISDN-BRI) and primary rate (UNE-P-ISDN-PRI). UNE-P-ISDN-BRI is comprised
4 of the following unbundled network elements: Basic ISDN Capable Loop, Digital
5 Line Side Port and Shared Transport.

6 **Q. WHAT CHARGES DOES QWEST PROPOSE FOR UNE PLATFORM**
7 **COMBINATIONS?**

8 A. Qwest proposes that nonrecurring charges apply for the one-time activities associated
9 with the conversion of an existing UNE Platform and the connection of a new UNE
10 Platform requested by the CLEC. UNE Platform nonrecurring charges are included in
11 Exhibit PWH-2 of this testimony.

12 **Q. WILL QWEST OFFER LINE SHARING AS PART OF THE UNE**
13 **COMBINATIONS TO CLECS WHO MAY WISH TO ORDER SUCH**
14 **SERVICE?**

15 A. No, it will not. Qwest does not believe that it is obligated to offer line sharing as part
16 of the pre-existing UNE Combinations that it makes available to requesting CLECs.

17 **Q. ON WHAT AUTHORITY DOES QWEST BASE ITS DECISION TO NOT**
18 **OFFER LINE SHARING AS PART OF THE UNE-P COMBINATIONS?**

1 A. Qwest bases its decision on the FCC's opinion articulated in the Deployment of
2 Wireline Services Offering order issued in December, 1999.²² In this Order, the FCC
3 stated that "incumbent carriers are not required to provide line sharing to requesting
4 carriers that are purchasing a combination of network elements known as the
5 platform."²³

6 **VI.CONCLUSION**

7 **Q. DOES THIS CONCLUDE YOUR DIRECT TESTIMONY?**

8 A. Yes it does. Thank you.

1 ²² *In the Matter of Deployment of Wireline Services Offering Advanced*
2 *Telecommunications Capability and Implementation of the Local Competition Provisions*
3 *of the Telecommunications Act of 1996*, CC Docket No. 98-147 and CC Docket No. 96-
4 98. (December 9, 1999).

1 ²³ Id. at 36, para. 72.