

THE STATE OF THE TELECOMMUNICATIONS INDUSTRY IN UTAH

Fourth Annual Report to the Governor,
Legislature, the Public Utilities and Technology
Interim Committee, and Information Technology
Commission

November 2001



**Public Service Commission
State of Utah**



PREFACE

This fourth annual report on the state of local telecommunication competition is submitted to the governor, the Legislature, the Public Utilities and Technology Interim Committee, and the Information Technology Commission in accordance with UCA §54-8b-2.5. We document the growth in Utah's telecommunications market for the period from October 2000 to August 2001.

This document quantifies the progress made by competitors in raising capital, building new telecommunication networks, signing up customers, and generating revenues. Much of this growth is the result of federal and state policies which implement the Federal Telecommunications Act of 1996, as well as our efforts as a Commission to implement the competitive provisions of the 1995 Utah Act. On the other hand, this year the telecommunications industry has also encountered bankruptcies, financial setbacks, problems obtaining capital, and uncertainty, which have hindered the market from becoming fully competitive.

The telecommunications industry is changing rapidly. Measuring the magnitude of this change is difficult. In the fast-paced telecommunications industry, data is difficult to obtain and may be obsolete by the time it is gathered and analyzed. Nevertheless, pursuant to UCA §54-8b-2.5, the Commission, with the assistance of the Division of Public Utilities (the Division), has compiled this fourth report in order to document developments in Utah's local telecommunications marketplace. The report examines factors that affect competition and summarizes our efforts as a Commission to further competition throughout the past year.

The report has four sections. The first section introduces the significant events of the past year at the state and federal levels which affect telecommunications competition. The second section reviews our efforts to further competition in Utah in 2001. The third section provides specific data documenting the current state of competition in the telecommunications industry. We also discuss the current obstacles and barriers to fully competitive markets. The fourth section provides our policy recommendations.

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1

INTRODUCTION**The 1995 State and 1996 Federal Acts**

The State Act of 1995 and the Federal Telecommunications Act of 1996 were designed to develop a competitive telecommunications industry so that, ultimately, local prices can be kept in check by competition rather than by rate-of-return regulation. In accordance with the 1995 Act, Qwest's local service prices were frozen from December 4, 1997 until February 7, 2001. As a Commission, we have established a system of price regulation for Qwest's non-competitive tariffed intrastate services, which took effect following the end of the price freeze. This new type of regulation is commonly known as an indexed price cap regime, or price regulation. The intent of price cap regulation is to mimic the "competitive result," i.e., the price levels, efficiency, and innovation that typically arise in a competitive market. Price regulation is based on inflation and productivity measures rather than on Qwest's rate of return and is designed to provide Qwest greater flexibility in an evolving market. Additionally, price regulation is supposed to protect customers from price increases caused by the exercise of market power.

In order to establish this new form of regulation by the beginning of 2001, we established a docket and corresponding schedule to solicit comments from parties for the implementation of price regulation rules that conform to UCA §54-8b-2.4. The Third Annual Report on the State of the Telecommunications in Utah outlined the transition to pricing flexibility for qualified incumbent local exchange carriers (ILECs), such as Qwest. Today, Qwest is able to change the prices of competitive business services in 14 of its central offices on five days notice in order to compete.

Federal and Regional Events Affecting Utah's Markets

Numerous other events have transpired this year on a federal level that have contributed to the changes in the competitive landscape in Utah. We have begun to review Qwest's application (known as a "271 application," after Section 271 of the 1996 Federal Act) to enter the long distance or interstate local access-transport area (interLATA) market. Although as a state commission we do not have jurisdiction of this case, the FCC will rely on our recommendation in determining whether to approve or deny Qwest's Section 271 application. We are developing the cost model required to price interconnection rates for unbundled network elements of the telephone network, a crucial aspect of developing a sustainable, competitive market. It is also necessary in order to meet the fourteen-point checklist set out in Section 271. These issues are addressed in sections to follow.

On April 24, 2000, Qwest entered into a regional interim line-sharing agreement with nine competitive carriers which may facilitate the deployment of broadband data services throughout Utah and the other states in Qwest's 14-state region. Line sharing provides competitive local exchange

carriers (CLECs) with the opportunity to offer advanced data services simultaneously with an end user's analog voice-grade service on the same copper loop, i.e., the existing service line that extends to homes and most businesses.

On April 19, 2001, the FCC adopted rules clarifying intercarrier compensation for telecommunications traffic delivered to Internet service providers (ISPs). Intercarrier compensation refers to payments among telecommunications carriers necessitated by interconnection of their networks. Reciprocal compensation refers to the payments among carriers and has been disputed in the courts and among parties for the past several years. The 1996 Act mandates that reciprocal compensation arrangements be made by contracts between carriers under the oversight of state utility commissions. Telecommunications traffic delivered to an ISP is interstate access traffic, specifically "information access," and is not subject to reciprocal compensation, according to the FCC's latest order. The FCC concluded that Section 251(b)(5) is not limited to local traffic, as it had previously maintained, but instead applies to all telecommunications traffic except the categories specifically outlined in Section 251(g). Since ISP-bound traffic is considered information access, it is exempt from Section 251(b)(5) and is subject to the FCC's general powers under Section 201(b).

In conjunction with the reciprocal compensation order, the FCC established a transitional cost-recovery mechanism for interexchange traffic whereby for the first six months after the effective date of the FCC's Order, ISP-bound traffic is to be capped at a rate of .0015 cents per minute of use. For the next eighteen months, the rate will be capped at .0010 cents and thereafter at .0007 cents per minute of use. The rate caps apply only if an incumbent company offers to exchange all traffic at the same rate. The FCC also adopted a cap for total ISP-bound minutes for which a local exchange carrier may receive compensation equal to the number of ISP-bound minutes for which that carrier was previously entitled to compensation plus a 10 percent growth factor. The FCC adopted the presumption that traffic exchanged between carriers that exceed a 3:1 ratio of terminating to originating traffic is considered ISP-bound traffic. Throughout the year we have scheduled technical conferences with telephone companies to explore options for compensating carriers. Just recently, Qwest opted into the FCC compensation plan.

The CALLS (Coalition for Affordable Local and Long Distance Services) proposal, adopted on May 31, 2000, was implemented by the FCC to overhaul the interstate, or state-to-state access charge system. Long distance providers such as AT&T must pay ILECs such as Qwest access charges in order to complete a long distance telephone call on an ILEC's network. While it is still relatively uncertain what effects this will have on Utah consumers, it is known that, on a federal level, the plan cuts and restructures access charges substantially over the next five years, beginning with an approximate \$3.2 billion reduction that was effective on July 1, 2000. The order also reduces special access fees by about \$170 million, with more to follow in subsequent years. Reducing access fees should lower customers' long distance bills. Finally, the order sets up a \$650 million fund to support universal service.

Utah Telecommunications Markets At A Glance

• Certificated CLECs to date	97
• CLECs currently in operation	14
• Number of ILECs	16
• Revenues this year	\$708 million
• Collocations to date	259
• Qwest market share today	84%
• Total Interconnect Agreements	80

The extent of competition in Utah varies with products and services. Some are more competitive than others. Customer premise equipment, inside wiring, long distance, private line services, features such as voice mail and speed calling, cellular (which is a growing competitor for land line service), and cable modems (which compete with digital subscriber line service “DSL”) are provided competitively. Metropolitan areas have begun to encounter new competition for residential voice and data service over cable facilities. AT&T has entered some residential markets with a variety of service offerings for residential consumers. Nevertheless, the reality today is that in many areas local phone service for small business and residential customers is available only from the incumbent provider. This is particularly true in areas served by rural ILECs.

Telecommunications is a capital-intensive industry, consequently, CLECs continue to be highly dependent upon capital markets to build their networks in existing areas and to expand to new ones. As a result, the success of the competitive industry depends on the ability to raise capital on favorable terms. CLECs have been going out of business or cutting back on planned expansions because capital has dried up. This may be due to a natural shakeout of the market, as less successful companies are eliminated, or it may be attributable to the inability of the CLECs to make more significant inroads into the incumbents’ markets. Barriers to entry may remain too high. The decline in the growth of the number of CLECs and their inability to expand impacts competition. We will watch this closely in the coming year because if this is a developing trend, the goals of the 1995 State Act and the 1996 Federal Act will not be achieved.

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**COMMISSION EFFORTS TO
FURTHER COMPETITION IN
UTAH****Approve Certifications and Arbitrate Interconnection Agreements**

Since passage of the 1995 State Act the Commission has been working to facilitate a competitive local service market in the state of Utah. To date, we have granted 97 certificates to companies that intend to offer local service here. In addition, we have approved 80 interconnection agreements between Qwest and new entrants. In spite of the troubles in the telecommunications industry over the past year, the interest in doing business in Utah remains relatively high.

Review Qwest's Petition to Enter the InterLATA Long Distance Market

The Commission is reviewing Qwest's preliminary petition to provide long distance service within its own region. This opportunity is provided to incumbent local exchange carriers by Section 271 of the 1996 Federal Act. When Qwest actually files with the FCC we will have just 90 days to make our recommendation and that is why we are doing work beforehand. Section 271 outlines fourteen requirements that Regional Bell Operating Companies, such as Qwest, must meet before the FCC can grant 271 authority to offer interstate long distance service. The FCC relies on the Commission's recommendation, as well as on the opinion of the U. S. Department of Justice in determining whether Qwest meets the fourteen-point checklist requirements. The Commission and the Division of Public Utilities are participating in workshops jointly conducted by Utah, Idaho, Montana, New Mexico, North Dakota, Wyoming, and Iowa to consider whether Qwest is complying with the Section 271 requirements. These multi-state workshops provide a record for our recommendation to the FCC, once Qwest files its application with that agency. The Commission cannot, at this point, recommend that the legal requirements have been met. There are still a number of conditions Qwest must meet. Some of them concern charges for specific services that are currently under consideration in state cost dockets. Thus far, the FCC has approved incumbent companies' applications to sell in-region long distance service in nine states: Arkansas, Connecticut, Kansas, Massachusetts, Missouri, New York, Oklahoma, Pennsylvania, and Texas. They have denied five applications. To date, no state in Qwest's 14-state region has recommended to the FCC that Qwest be permitted to offer interstate long distance service.

Utah is also actively involved in a thirteen-state test of Qwest's Operational Support Systems (OSS), which is one of the key checklist items for Section 271 compliance. OSS are the procedures that support the daily operations of a telephone company in serving its retail and wholesale customers. They include items such as processing orders, assigning lines, repair and maintenance, and billing. Testing is currently being conducted and will conclude when Qwest successfully meets test criteria, which is

expected to be completed by early next year. We must ensure that Qwest's systems are fully functional and that Qwest provides non-discriminatory access to CLECs to key operational support systems.

Another aspect of the 271 approval process in which Utah and other states are jointly participating is the development of a Post Assurance Plan (PAP) that includes standards, systems, and self-executing monetary penalties for maintaining a competitive environment in Utah. This plan is intended to ensure that Qwest's performance under the fourteen-point checklist does not deteriorate once Qwest has gained interstate carrier status through the 271 process. These standards, systems, and penalties will level the playing field between Qwest and the competitive local exchange carriers in Utah by giving Qwest incentive to provide proper service to its competitors.

Establish Unbundled Network Element Costs and Prices

Unbundled network elements (UNEs) are pieces of Qwest's network which can be used by a competitor in conjunction with its own facilities to provide service. Local exchange carriers are required to make those particular elements available to other telecommunications carriers as a means of fostering competition in telecommunications markets. The Division is investigating cost proxy models which are required in order to develop costs and prices for unbundled elements. In June 1999, the Commission ordered permanent deaveraged loop costs, along with other miscellaneous unbundled costs. There are now urban, suburban, and rural loop rates based on different costs rather than just one statewide average rate. A new UNE docket was opened in April 2001 to address the costs of other unbundled network elements since the Commission's previous Order. The Commission held hearings in the UNE docket in October 2001 and we expect to order prices for the new unbundled network elements during the first quarter of next year.

Adopt An Aggregate Price Index

Pursuant to UCA § 54-8b-2.4(5)(c) and (d), we published a proposed price index rule on October 16, 2000, February 14, 2001, and March 14, 2001 and took comments from all parties. The aggregate price index sets new prices for services that remained tariffed following the end of the price freeze at the beginning of this year. After conducting hearings, we issued Rule R746-352. We finalized the March 14 version of the index rule and issued an order outlining the implementation of the index for 2001. Based on this new rule, the first price index adjustment was ordered on June 15, 2001 requiring Qwest to lower all tariffed rates by four percent.

Determine Wholesale Discounts For Retail Services

The 1996 Federal Act and the FCC rules implementing that Act require state commissions to establish wholesale prices for the retail services that ILECs such as Qwest provide. We established wholesale prices in 1996 and continue to update them periodically. The most recent update occurred in February 2000. By removing retail costs, such as marketing, sales, billing, collections, and other general support expenses, services can be purchased at wholesale by competitors for resale to end users. Resale of services is one of the vehicles for competitive entry into local markets.

As noted above, this past year we also opened Docket 00-049-106 for the purpose of developing prices for additional unbundled network elements that telecommunication competitors purchase from Qwest to provide competitive services to their subscribers. Moreover, this docket will allow examination of many of the state-specific cost issues that have been deferred from the multi-state 271 process.

Establish Terms and Conditions of Collocation

Collocation is the term used when an ILEC provides space for a competing company's telecommunications equipment in the ILEC's central office. Collocation has been implemented in Utah since the 1995 State Act. That Act and the 1996 Federal Act ordered ILECs such as Qwest to allow competitive providers to place equipment that would allow interconnection in order to give CLECs access to the ILEC's customer access lines. Due to new FCC rules, the Commission initiated a joint industry study to determine the cost of collocation. To date collocation prices have been set by arbitrated interconnection agreements which include a clause for "true up" based on Commission ordered rates. We expect to order new permanent prices at the conclusion of Docket No. 00-049-106 that will supersede the current interconnection agreements.

As of the end of April, approximately 88 percent of Qwest's lines can be accessed through existing collocation sites in Utah. Collocation continues to be mainly limited to the Wasatch Front, however, rather than geographically dispersed throughout the state.

Preserve and Advance Universal Service

The Utah State Universal Service Fund (USF) and Utah Telephone Assistance Program (Lifeline) were combined on March 1, 2001. Non-Lifeline customers in Utah are no longer required to a separate charge as they had since 1988. The State USF has grown primarily due to the emergence of wireless companies and more stringent monitoring by the Division, so that more companies are contributing to the fund. To reduce the size of the fund, the Commission reduced the surcharge from 0.67 percent of billed retail rates to 0.34 percent.

We also granted a one-time distribution from the State USF and two increases in monthly distributions in 2001. All West Communications received a one-time distribution of \$186,099. Gunnison Telephone began receiving \$18,736.83 monthly and Citizens Telecommunications received a monthly increase of \$45,068.17. Utah currently provides State USF to ten rural telephone companies and to 22,150 Lifeline customers. The amount of distributions from State USF and Lifeline in the last twelve months totals \$5,703,024 and \$739,251 respectively.

On the federal level the FCC developed the Hybrid Cost Proxy Model (HCPM) to determine Federal Universal Service Fund contributions to non-rural companies. The model is complex and in a continual state of development. The Division is investigating and reviewing the model to determine if the same approach can be used statewide. Results and recommendations will be reported to the Commission. Recently, Utah's rural companies negotiated continued state and federal universal service

fund support under the old methodology with an indexed cap and annual growth factor until 2006, when cost models are expected to be implemented.

Enforce and Report on Service Quality Rules

Pursuant to UCA § 54-8b-3.3(6)(c), which became effective May 1, 2000, the Commission reports annually to the legislature regarding ILECs' "quality-of-service to end users of tariffed public telecommunications services." The Commission issued retail service quality rules in September 2000 and updated and refined those rules again in October 2000. On October 2, 2000, we put in place 120-day emergency service quality rules, which were followed with permanent service quality rules on March 27, 2001.

Carrier-to-carrier service quality rules have been in place since June 1, 1999. Service quality standards deal with installation of service, repair, answer time, transmission requirements, appointments, safety, and 911 access. In enforcing these rules, Utah regulators review periodic ILEC reports, evaluate complaints, examine held orders, and perform field evaluations and audits.

Complaints about Qwest's retail service quality have increased generally, but the number of installation and repair complaints has decreased. Service failures factor in the price index for the next year. For the current year the company has not had one instance where it failed to meet installation and repair standards for four consecutive months as required by the rules. However, Qwest's billing, customer service, and shut off services continue to be problems, resulting in a high level of customer complaints. Certain aspects of billing and shut-off performance are subject to penalties. Unlike the potential rate decreases for poor installation and repair performance, however, penalties for poor billing, customer service, and shut-off services are possible only after audits and hearings. During June 2001, total complaints increased 41 percent from the average of the previous twelve months. The Division is currently investigating these issues.

We also initiated an audit of AT&T's end-user cable telecommunications services, after finding a dramatic increase in installation and repair complaints. Customers continued to complain about AT&T's billing services, but after the company installed new systems, the complaints began to decrease in mid-July 2001. The Division is still monitoring those complaints to avoid recurrence of the problem.

As of June 30, 2001, the Division has received only twenty-one complaints during the year from customers of the fifteen rural incumbent telecommunications providers. Rural telephone customer complaints were directed toward billing problems, deposits, and terminations due to delinquent bill payments.

Performance Indicator Definitions were developed as part of the Section 271 evaluation process to test the performance of Qwest's operational support systems. Prior to 271 approval, Qwest must provide competitors with the same quality of service the company provides itself. Once testing has been completed, we will open a rule making process to determine what performance indicator definitions should be included in service quality rules in Utah.

Promote Technology and Advanced Telecommunications Services

Section 706 of the 1996 Federal Act directs both the FCC and state public utility commissions to encourage deployment of advanced telecommunications capabilities. The Commission and the Division of Public Utilities participate with federal commissioners in joint conferences to implement the provision of the Federal Act.

Facilitate Pricing Flexibility

After assessing the level of competition, the Commission accepted a stipulation between Qwest, the Division, and other CLECs that allowed Qwest to flexibly price specific business services in fourteen of its wire centers in Salt Lake, Provo, and Orem. As a condition of the stipulation with its competitors, Qwest agreed not to file for additional pricing flexibility for business services for at least one year.

Number Pooling

On March 1, 2001, number pooling began in Utah in the 801 area code in response to the North American Numbering Plan Administration's (NANPA) declaration that the 801 area code was in jeopardy and was reaching its capacity level. Number pooling allows 1,000 number blocks to be distributed to carriers instead of the standard 10,000 number blocks, thus furthering number conservation efforts. The 10,000 number blocks and newly available 1,000 number blocks previously distributed to carriers but not placed into service are being returned to the number pool to be redistributed in 1,000 number blocks. This should extend the life of the 801 area code until September 2003. Thereafter, the area code will be split and Weber, Morgan, Davis, and Utah counties will be served by the new 385 area code. No local service will change with the new area code.

Implement Three Digit Local Dialing

Three digit dialing (N11) allows the public to contact local support services with an easy-to-remember quick dial similar to 911. 211 dialing is a three-digit local dialing arrangement which, when implemented, will deliver general information for social service referrals and community information. The 211 service directs callers to the agency that can supply the help that is needed. The 511 code is assigned specifically for access to travel information services and will be made available to public transportation agencies, as designated by House Bill 202 passed in the 2001 legislative session. Utah is one of five states implementing this service. The Department of Transportation expects to have the system available along the Wasatch Front by the end of 2001 and to the rest of the state as soon thereafter as possible.

The 711 code is a three-digit dialing arrangement for telephone voice transmission access to the speech and hearing-impaired and all relay service entities as a toll free call. In 2001, telecommunications companies upgraded facilities to allow for the quick implementation and provision of 711 dialing. The system became operational October 1, 2001, as ordered by the FCC in CC Docket 92-105.

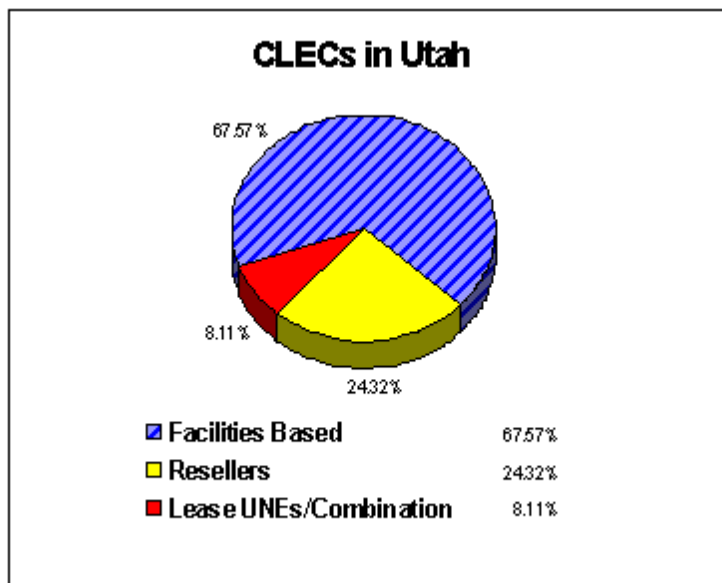
3 LOCAL COMPETITION IN UTAH

Measuring Competition

The preceding chapter identifies the Commission's efforts to promote competition within the state. This chapter presents evidence by which to evaluate the degree of local competition. To assess the state of local competition we ask two key questions:

- Has competition occurred (and if so, how much)?
- Can competition occur (and if not, why not)?

The market share of new entrants is significant evidence of the extent of competition. Companies that offer local telecommunications services in competition with ILECs rely on one or a combination of three modes of serving customers. They may own and operate their own facilities, resell Qwest's retail offerings, or purchase and rebundle Qwest's unbundled network elements. We also examine local service revenues, access lines, and the number of ported lines of CLECs. These and other indicators of competitive local carriers' presence in the market are presented in this section.



Types of Competition

The term "competitive local exchange carrier," or CLEC is a broad designation that covers several types of companies that have entered the local exchange market. Almost without exception, the business strategies of these new entrants have been to focus upon specific market segments (e.g.,

large businesses) and specific geographic locations such as downtown core, suburban business parks, and high-density, multi-family dwelling units. Competitors in Utah's telecommunications markets include:

- Integrated communications providers
- Cable television companies
- High capacity telecommunications providers
- Wireless service companies (mobile and fixed)
- Interexchange carriers (IXCs)
- ILECs operating out of territory
- Energy companies
- Municipalities

The competitors use one or more technologies, usually in multiple geographic areas, to penetrate specific market segments. Furthermore, some CLECs combine or are consolidated into a larger competitor against incumbent companies. There have also been some new configurations of old territories, with the sales of several Qwest central offices.

Competition in the Local Service Market

Tables 3.1 through 3.4 present the state of competition according to a set of essential statistics. As the data show, the number of CLECs has increased significantly since the passage of the 1995 State Act and the 1996 Federal Act. The average state in the United States has twenty-one to thirty competitive local exchange carriers in operation. In Utah, 97 competitive local exchange carriers have certificates and 14 of them are currently operating here.¹ CLECs own or control and operate some of their own facilities, and many are investing in new, state-of-the-art infrastructures. This investment can yield broader economic benefits to the communities they serve, just as investments in new "traditional" infrastructure--roads, bridges, airports--yield broad economic development in the communities where they are built.

¹The 14 are AT&T-Broadband, AT&T-Mountain States, AT&T-TCG, Brooks WorldCom, Comm South, DSL (data services), Electric Lightwave, Eschelon, Integra, McLeod, New Edge (data services), Now Comm, Reconnex, and XO.

Table 3.1. Utah's Local Service Market

County	Companies Providing Service		Competitors Present	
	Incumbent Wireline Providers	Competitive Providers	Business	Residential
Beaver	Qwest, South Central Utah		No	No
Box Elder	Albion, Beehive, Citizens, Qwest	Reconex, AT&T, McLeodUSA	Yes	Yes
Cache	Qwest, Bear Lake	Reconex, AT&T, ELI, Eschelon, Comm South, McLeodUSA	Yes	Yes
Carbon	Central Utah	AT&T	Yes	No
Daggett	Union		No	No
Davis	Qwest	ELI, XO, NOW, AT&T, Eschelon, Comm South, McLeodUSA, Citizens, Reconex, TCG	Yes	Yes
Duchesne	UBTA,UBET		No	No
Emery	Emery	AT&T	Yes	No
Garfield	Beehive, South Central Utah, Citizens		No	No
Grand	Citizens, Emery		No	No
Iron	Beehive, South Central Utah, Qwest	Reconex, Comm South, AT&T, McLeodUSA	Yes	Yes
Juab	Beehive, Citizens, Qwest		No	No
Kane	South Central Utah, Beehive		No	No
Millard	Beehive, Citizens		No	No
Morgan	Qwest	Reconex	No	Yes
Piute	South Central Utah		No	No

Companies Providing Service			Competitors Present	
County	Incumbent Wireline Providers	Competitive Providers	Business	Residential
Rich	All West Comm., Bear Lake		No	No
Salt Lake	Qwest	ELI, Brooks Fiber, XO, NOW, Integra, AT&T, Eschelon, Level 3, McLeodUSA, DSLnet, Reconex, TCG, Comm South	Yes	Yes
San Juan	Navajo, Citizens, CenturyTel, Farmers		No	No
San Pete	Central Utah, Skyline, Manti, Gunnison	AT&T	Yes	No
Sevier	South Central Utah, Qwest	Reconex, Comm South	No	Yes
Summit	All West Comm, Union, Qwest	ELI, AT&T, Eschelon, XO, Comm South, TCG, McLeodUSA	Yes	Yes
Tooele	Beehive, Qwest	ELI, Reconex, Eschelon, Comm South, McLeodUSA	Yes	Yes
Uintah	UBTA, UBET	AT&T	Yes	No
Utah	Skyline, Qwest, Central Utah	Comm South, ELI, XO, Integra, AT&T, Eschelon, McLeodUSA, DSLnet, Reconex, Switchpoint, TCG	Yes	Yes
Wasatch	Central Utah, Qwest, UBTA	Reconex, AT&T, Comm South, McLeodUSA	Yes	Yes
Washington	South Central Utah, Qwest, Beehive	Reconex, AT&T, ELI, McLeodUSA	Yes	Yes
Wayne	Beehive, South Central Utah, Hanksville		No	No
Weber	Qwest	ELI, XO, Integra, AT&T, Eschelon, McLeodUSA, Ionex, Reconex, TCG, Comm South	Yes	Yes

Table 3.2. Summary Data for 2001

Data	Qwest	CLECs	Other ILECs
Number of Local Access Lines Served (as of June 30, 2001)	1,027,897	190,625	95,633
Residential	722,144	45,305	70,136
Business	305,753	145,320	25,497

Table 3.3. CLEC Growth Data

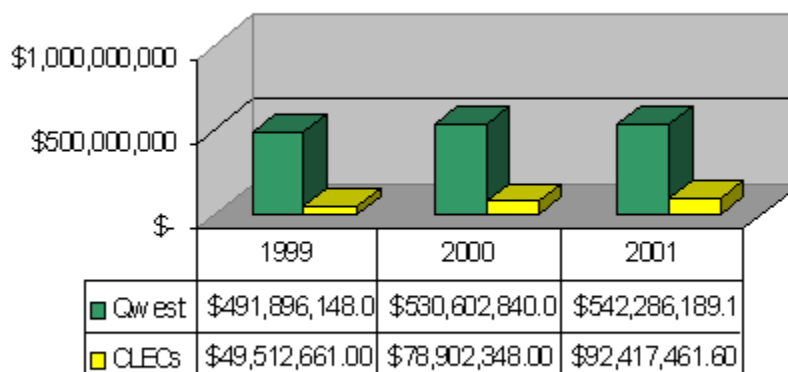
Data	1998	1999		2000		2001	
	%Growth		%Growth		%Growth		%Growth
Number of Local Access Lines Served	18,000	47,859	166%	101,899	113%	190,625	87%
Residential	0-200	826	313%	6,094	638%	45,305	643%
Business	17,800	46,975	164%	95,805	104%	145,320	52%

Of the 145,320 business access lines CLECs serve, 17,678 are provided using unbundled network elements. The remainder are served through the CLECs' own facilities. Of the 45,305 CLEC residential access lines 155 are served by unbundled loops.

Table 3.4. Utah 2001 Fiscal Year Telecommunications Operating Revenue
(Estimated based on YTD figures as of June 30, 2001)

Category of Revenue	Qwest	CLECs	Other ILECs
Residential Local Exchange	145,404,417	12,598,737	7,935,209
Business Local Exchange	144,287,883	27,659,472	5,471,891
Vertical Services	123,924,157	2,489,824	1,769,500
Private Line and Special Access- Local and Interexchange	19,718,440	11,122,052	3,617,255
Network Interexchange			
Switched Access	19,645,748	7,030,036	50,331,758
Toll	33,794,696	25,512,218	1,803,187
Other	55,510,848	6,005,122	2,484,654
Total	542,286,189	92,417,462	73,413,453

Comparison of Total Revenue Between Qwest and CLECs

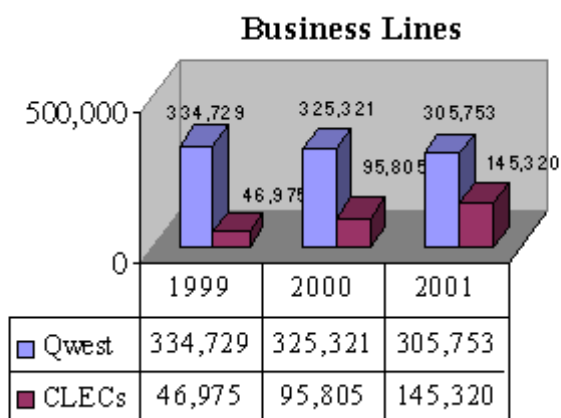


The charts and graphs show impressive growth on the part of the CLECs, but as in previous years, most of the competitive activity has occurred in the Wasatch Front counties for business services. Though residential lines served by CLECs increased by 643% from last year's report, Qwest retains 94% of the residential market. The residential competition reported in Table 3.1 in 14 of Utah's 29 counties essentially reflects the presence of one company offering the service over a cable system in the more populated counties and one company reselling service to select customers.

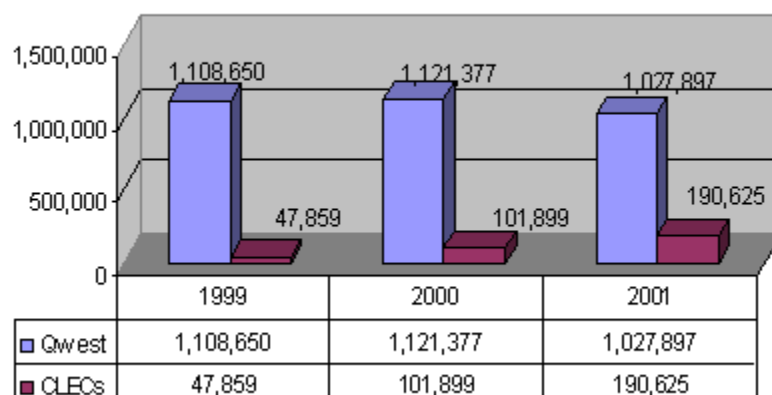
The local market is very capital intensive, and there are high financial barriers to entry. In the long-distance industry, by contrast, the barriers to entry are much lower and so the number of competing companies is much higher. Those realities have not discouraged new companies from entering the local communications business, but reality has forced competitors to focus, and the focus generally has not been on residential customers. When companies began to build local fiber optic networks in the 1990s, they increased their chances of financial success by aiming almost entirely at downtown areas and business customers. One business might spend thousands of dollars a month on communications, while many households do not spend even \$100.

XO, MCIMetro, ELI, McLeod USA, and Brooks Fiber all have high-capacity networks in Utah. The growth in alternative fiber networks is reflected in market share data. Because the Utah market has become increasingly competitive over the last two years, Qwest has experienced erosion of its market share in high-capacity services. However, due to substantial growth in the market, the total number of business lines which Qwest has actually lost to competitors over that period has been only 8.7%. Currently Qwest accounts for the majority of the wholesale circuits sold to resellers and circuits used for transport. Competitors have chipped away at Qwest's market share through facilities build-outs and alliances with interexchange carriers. Qwest's facilities-based competitors have targeted its most valuable accounts--bandwidth-intensive large businesses. Because of this, competitors have captured a greater percentage of the DS3 (equivalent to 672 customer lines) market than the DS1 (equivalent to 24 customer lines) market.

During the initial deployment, CLECs overbuilt their networks to meet the anticipated bandwidth demands so today there is significantly more capacity than is currently being used. The summary figure below illustrates the changes over the past three years in access lines acquired by competitors and by Qwest.



Total Number of Lines Served²



Cell phone use has increased (100 million nationwide), and prices have decreased. However, cell phones are not yet a viable substitute for wireline service. They are not as reliable as wireline services and do not have the same capability to transmit data. One of the challenges regulators face is the bypass of the public switched network by wireless, satellite, cable, and electric grid telephony. Another concern is that increased traffic volumes on the switched network may cause network blockages, inhibiting access to emergency services.

Prepaid phone card usage has also increased over the past year. Customers often use the prepaid cards on payphones. In spite of payphone deregulation under which many payphones have been purchased by independent payphone providers, Qwest maintains 7,000 pay stations in Utah. This number is basically holding steady in recent years.

Measuring the Effect of Competitors

Each year the Commission has attempted to measure and assess the effect of the growing competition for local telecommunications service in Utah. As in our previous reports, we offer the Hirschman-Herfindahl Index (HHI) as an economic measure of industry concentration or market power. The HHI has a value of one when a single firm serves the entire industry and approaches zero as competition increases. An index value of .50 is the necessary threshold value for the market to be considered competitive. The table below reflects the HHI values for the past three years in

² Qwest sold approximately 35,000 access lines to the independent ILECs between 2000 and 2001 which contributed to the decline in the number of lines Qwest serves.

Qwest's Utah service territory and indicates the slow, but gradual move toward competition as the index declines, most notably in the business services market.

Hirschman-Herfindahl Index for Qwest's Utah Operations			
Year	Total Market	Residential Market	Business Market
1999	.919	.998	.775
2000	.844	.985	.614
2001	.716	.888	.480

The Effective Firm Index is another objective economic measurement, which reveals the degree of competition in a market by estimating the number of effective firms within an industry. The Effective Firm Index for Qwest's Utah service territory is 1.40, slightly higher than the previous year's 1.18. What is significant to note is that the index, which is the inverse of the HHI, will not exceed 2 unless Qwest's overall market share declines to approximately 60 percent. In the business sector this year the Effective Firm Index reached 2.08, indicating that the 14 active CLECs jointly have the effect of about one competitor for business services in Qwest's service territory. In the residential market the Effective Firm Index stands at 1.13 which means that Qwest is facing the equivalent of 1/8 of a competitor.

New Technologies Affecting Competition

Changes in deployed technology will affect local exchange competition through entry by new competitors and/or increased penetration by existing competitive local exchange carriers. Examples include the use of fiber in urban areas by competitive access providers, the rollout of digital cable TV networks allowing two-way voice and data services, high-capacity fixed wireless, and satellite systems. New CLECs have begun providing a broad range of services to business customers. Because of the current economics of these systems, services are now provided only to businesses located in larger buildings in which tenants can share the cost of on-premise high capacity equipment. Although fixed wireless is limited in Utah, it is expected that its economics will improve. As they do, smaller businesses and multiple dwelling unit buildings may be able to be served on a cost-effective basis.

Digital Subscriber Line (DSL) is a technology for bringing high-bandwidth service to homes and small businesses over ordinary copper telephone wires. With the addition of certain electronics at the local exchange company's central office, a subscriber's twisted pair of copper wires used for voice service will also provide high-speed data service. xDSL refers to the family of DSL technologies and includes ADSL (Asymmetric DSL) where speeds in the downstream direction are greater than speeds in the upstream direction. ADSL is dedicated (the Internet connection is not shared with other end-users in one's neighborhood) and does not tie-up a subscriber's telephone line

(as is the case with analog modems) because the data signal is carried on a higher frequency. This means the customer's Internet connection may be left on continuously without interrupting voice service.

Qwest has deployed digital subscriber line service capability along most of the Wasatch Front and plans to add more communities to its high-speed Internet access service. The company hopes to have DSL service in every central office by the end of next year. It has committed, as part of its merger stipulation with the Division, to spend \$15 million to deploy DSL in all Utah central offices by the end of 2002. Qwest is using Lucent Technologies' Stinger devices (remote terminals) to double the range of high-speed DSL Internet connection service from a central office to about six miles. Originally DSL service was limited to a three-mile radius out of each Qwest central office. The technology will enable the company to reach about 60 percent more potential DSL subscribers in the state by the end of the year.

Cable companies like AT&T may upgrade their networks to provide high-speed Internet access. Unlike xDSL, cable modems are a shared access technology which causes the speed to any given user to slow down as the number of simultaneous active users increases and which also creates security concerns requiring operators to install network security systems. Cable modem is currently the most popular form of high-speed service, particularly to residential and small business customers. AT&T Broadband is one of the top providers of high-speed Internet access in Utah. The FCC noted that cable modems serve 51 percent of high-speed service and 78 percent of the residential and small-business market. Cable modem technology has an "always-on" Internet connection and offers higher speeds than xDSL service. Cable networks also have an advantage in serving residential and small business customers because once the network is upgraded, service is available to all homes passed by the upgraded infrastructure. xDSL services are limited by customer line quality and distance, and wireless technologies often have "line of sight" requirements.

Other high-speed technologies, which may soon affect the competitive landscape, include satellite systems, fiber-to-home and businesses, and T-carriers systems. The increased reliance on the Internet for computer-to-computer communications will decrease the use of other dedicated data services. The 2000 Census shows that Utah was the fourth-fastest growing state in the country between 1990 and 2000. The Salt Lake/Ogden area is ranked number three in the nation out of the top ten high-tech cities and second out of the top twenty-five fastest-growing Metropolitan Statistical Areas in the nation. As such, Utah has become home to many communication-intensive businesses that require high-capacity DS1 and DS3 services, and demand for these high capacity services is expected to escalate. In the past year, Utah's overall job growth increased 2 percent. Of that, technology jobs increased 16 percent, more than twice the national average for the same period. This growth in population will demand an expansion of the telecommunications infrastructure for high-capacity services.

Challenges to the 1995 and 1996 Acts Remain

The following issues continue to act as barriers to entry and require improvement in order for irreversible competition to penetrate the state.

- *Section 271 checklist items have not been met.* Debate concerning Qwest's achievement of all fourteen of the "checklist" items continues, but each item is essential to facilitate the development of local competition.
- *Further consumer protection and education are needed.* We are still receiving complaints of slamming, cramming, and other consumer issues which should be reduced in a fully-competitive market.
- *Prices have increased for other services.* Prices for directory assistance, Caller ID, and payphone calls have continued to rise.
- *Advanced telecommunications services are not widespread and available to all rural and low-income customers.* Broadband has primarily been deployed along the Wasatch front and urban areas.
- *Final performance and incentive measures must be set.* Effective final performance measures are being established to provide an incentive for Qwest to refrain from "backsliding" away from any pro-competitive steps it has taken.

Qwest has not yet met the fourteen checklist items of Section 271. Part of that is attributable to the fact that a number of issues relating to the charges for services are under consideration in specific cost dockets.

Notwithstanding the progress made by CLECs this past year, movement toward a competitive industry faces challenges. It is not as easy as it should be for a competitor to interconnect with the incumbent telephone company's network despite federal and state orders requiring ILECs to open their networks to competition. In addition, building owners often resist competitors' requests to provide broadband services to commercial tenants and apartment-dwelling families. Despite the significant growth in this past year, competitors remain far behind the incumbent company in revenues and customers. Qwest still serves approximately 84 percent of the local telephone market in its service territory in Utah, down from last year's 92 percent. Qwest's share of the local residential market in Utah is currently 94 percent, while business share totals roughly 68 percent.

Investment

As mentioned, the Commission approved a stipulation in which Qwest agreed to invest up to \$15 million to make broadband available in rural areas. Verizon announced earlier this year that it will spend more than \$18 million in its Wasatch Front network to expand its wireless digital network and increase capacity for services. The company also plans to expand digital service to areas such as Cedar City and St. George, which currently do not have many digital services. While most CLECs have seen their capital sources disappear, STSN made one of the top venture capital investments in the CLEC industry with an investment of \$65 million in Salt Lake City for hotel in-building broadband. The total investment in Utah reported by all telecommunications firms amounts to approximately \$536 million through June 30, 2001.

Bankruptcies

The CLEC industry has struggled financially in the past year and the stock prices of many telecommunications companies have plunged. Many companies have been unable to raise capital, and several have declared bankruptcy. Companies such as NorthPoint Communications, Rhythms Links, Teligent, Pathnet, JATO Communications, Convergent Communications, BroadBand Office Communications, ICG, essential.com., WinStar Communications, 360 Networks, and GST are examples of Utah CLECs forced to fold; more are expected to follow. Some companies have merged with others rather than declare bankruptcy. An example is Intermedia, which merged with WorldCom.

Possible reasons for this sudden collapse that experts in the industry have given include poor business plans, FCC decisions favoring ILECs, the scarcity of capable telecommunications personnel, lack of ILEC cooperation in opening up their markets to competitors, the parallel collapse of dot-com companies and setbacks following the September 11, 2001 terrorist attack. None of the reasons are unique to Utah.

Many experts believe that the shakeout will continue until only a few of the strongest competitors remain. That is a cause of concern because sustained failure and greater consolidation in the industry could defeat the competitive policies the legislature established in 1995.

Consumer Protection

Consumers continue to rely on the Division and the Commission as the first point of contact for most consumer complaints, including slamming and cramming. Slamming—the practice of changing a subscriber’s long-distance or local telephone company without their permission—often

occurs as the result of a contest or sweepstakes entry that authorizes a service change in very small print or when telemarketers use deceptive or confusing language to get consumers to change their service. The problem of cramming is the practice of placing unauthorized charges on a consumer's local telephone bill for services that they did not order, authorize, receive, or use. Cramming and slamming are problems which have a negative impact on consumers' perceptions of the effectiveness of competition. To date, our office has received a total of sixty complaints of this nature in Utah.

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**POLICY
RECOMMENDATIONS**

While we have made strides in serving the needs of consumers, we have not yet achieved our goal to make the marketplace fully and irreversibly open to competition. The Commission has targeted the following strategies to further competition in the state and to remove the remaining barriers to competitive entry:

- Continue to press for self-executing enforcement penalties for nonperformance and pursue complaint proceedings and other legal actions
- Enforce performance measurements and standards and update network performance standards to support high-end data
- Set UNE rates and wholesale prices
- Continue to target rural areas for high-capacity services based on demand
- Improve the level of cooperation from Qwest, cities, and building owners
- Help ensure that consumers get the telecommunication services they want

As we move forward, it is important that the Commission continue to work to create an environment in which customers are able to easily and readily move from one provider to another to get the service offerings they desire. That will help to keep service prices in check and sustain the viability of the market over the long term.

As noted above, in spite of this year's advancement by CLECs, we are concerned about the long-term effects the shakeout we reported could have on competition. If economic recovery is slow, more CLECs will fail and there will be more consolidation in the industry leaving fewer competitors to serve Utah customers.

We continue to scrutinize the industry, but we are not proposing legislation for the 2002 legislative session. Should the legislature face legislation in the coming session, we suggest the following criteria by which to judge it:

1. Does the proposal promote competition or consolidation in the industry?

2. Will the proposed changes expedite the progress CLECs have made to date or will they stall it?
 - Will the legislation negate the success already accomplished?
 - Will there be resulting litigation and what effect will that have?
3. If the changes are made, will investors be more or less willing to invest capital in the telecommunications industry in Utah?
4. Does the legislation create any unfair advantages?

Conclusion

This year CLECs have again made progress in the Utah telecommunications market. Table 3.3 above shows they serve a total of 190,625 access lines, an 87% increase over the number they served last year. Together the CLECs have a 32% share of the business market and are having the effect of one competitor as measured by the Effective Firm Index.

In the residential market CLECs progressed from serving 6,094 access lines in our last report to 45,305 lines this year, a 643% increase. That is a significant increase, but competition in both the residential and business markets continues to focus primarily on the densely populated urban areas of the state. The CLECs combined serve 6% of the residential market in Qwest's territory and constitute about 1/8 of a competitor.

In the market for business services we are concerned that, while the number of business lines CLECs serve increased 52% over 2000, that growth is half the increase achieved between 1999 and 2000. This year has been the most financially difficult year in the telecommunications industry since passage of the 1995 State Act. There have been bankruptcies and few if any competitive providers are posting profits. Given that the state and national economies are lagging generally, it is not clear yet if a negative trend is developing and, therefore, we are proposing no legislative changes this year. Instead, in the event legislation is proposed, the Commission has established a set of criteria by which to judge the proposal.