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Betsy J. Brady, Esq.
Federal Government Affairs
Vice President

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FEDERAL COMMUNICATIONS COMMISSION
OFFICE OF THE SECRETARY

Suite 1000
1120 20th Street, N.W.
Washington, DC 20036
202 457-3824
FAX 202 457-2545
EMAIL betbrady@lga.att.com

June 5, 1998

Ms. Magalie Roman Salas, Secretary
Federal Communications Commission
Office of the Secretary
1919 M Street, NW, Room 222
Washington, D.C. 20554

DOCKET FILE COPY ORIGINAL

Re: Ex Parte
CC Docket No. 98-24 Application of AT&T Corp. and Teleport Communications
Group, Inc. for Transfer of Control

Dear Ms. Roman Salas:

At the Commission's request, the attached documents are hereby submitted for inclusion in the record of the above-referenced proceeding.

Two copies of this Notice are being submitted to the Secretary of the FCC in accordance with Section 1.1206(a)(1) of the Commission's rules.

Sincerely,

A handwritten signature in cursive script that reads "Betsy J. Brady".



Recycled Paper

**LONG DISTANCE MARKET SHARES
FOURTH QUARTER 1997**

James Zolnierek
Katie Rangos

Industry Analysis Division
Common Carrier Bureau
Federal Communications Commission
March 1998



This report is available for reference in the Common Carrier Bureau's Public Reference Room, 2000 M Street, N.W., Room 575. Copies may be purchased by calling International Transcription Services, Inc. (ITS) at (202) 857-3800. The report can be downloaded [file name: MKSH4Q97.ZIP] from the FCC-State Link internet site at <http://www.fcc.gov/ccb/stats> on the World Wide-Web. The report can also be downloaded from the FCC-State Link computer bulletin board system at (202) 418-0241.

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LONG DISTANCE MARKET SHARES

This report presents information on access minutes, presubscribed lines, and revenues for long distance telephone companies. Company shares of the long distance market are presented for each of these measures. Market shares are also reported according to each measure for the residential portion of the long distance market, and according to revenues for the international portion of the long distance market.

1. INTERSTATE CALLING MINUTES

“Switched access minutes” provide one measure of the volume of traffic carried on the public switched telephone network. Long distance telephone companies ordinarily access the distribution networks of local telephone companies at both ends of long distance calls. Access minutes are a measure of the number of minutes that long distance companies need to access local lines in order to complete long distance calls for their customers.

For each conversation minute of a long distance call there are typically two access minutes, one on the originating end and one on the terminating end. Some calls, however, such as 800, 888, WATS, and international calls generate access minutes on only one end. Access minutes are not measured for calls made on private telecommunications systems and on leased lines.

Column 1 of Table 1.1 shows total interstate, including international, switched access minutes reported for all long distance carriers by the National Exchange Carrier Association (NECA). Interstate calling has grown steadily, with access minutes more than tripling, since this information was first measured in the third quarter of 1984. Overall economic growth, price reductions, and extensive advertising have contributed to this growth.

With few exceptions, terminating access minutes, which do not include dialing and call set up time, equal long distance conversation minutes. Table 1.1 Column 2 shows the number of terminating interstate access minutes reported for all long distance carriers by NECA since 1986, when terminating minutes were first reported separately. Since the third quarter of 1986 terminating access minutes have nearly tripled.

Columns 3 and 4 of Table 1.1 show AT&T's reported total access minutes and terminating access minutes. Columns 5 and 6 show AT&T's market shares of total access minutes and terminating access minutes. Since mid 1984, AT&T's traffic has grown at a rate slower than the industry average. AT&T's minutes have doubled during that period while the minutes for other carriers increased more than ten fold. As a result AT&T's share of long distance access minutes has decreased nearly 40% since the third quarter of 1984.

**TABLE 1.1 - INTERSTATE SWITCHED ACCESS MINUTES
(FIGURES SHOWN IN BILLIONS)**

	TOTAL INDUSTRY		AT&T		AT&T'S SHARE OF	
	ACCESS MINUTES	TERMINATING MINUTES	ACCESS MINUTES	TERMINATING MINUTES	ACCESS MINUTES	TERMINATING MINUTES
1984 THIRD QUARTER	37.5		31.6	18.1	84.2 %	
FOURTH QUARTER	39.6		31.8	18.2	80.2	
1985 FIRST QUARTER	39.6		32.8	19.0	83.0	
SECOND QUARTER	41.5		33.3	19.2	80.3	
THIRD QUARTER	42.8		33.8	19.4	78.9	
FOURTH QUARTER	43.3		33.4	19.2	77.1	
TOTAL 1985	167.1		133.3	77.0	79.8	
1986 FIRST QUARTER	43.0		34.2	19.9	79.5	
SECOND QUARTER	44.8		34.7	20.2	77.5	
THIRD QUARTER	46.7	26.7	35.8	20.7	76.6	77.7 %
FOURTH QUARTER	48.5	27.6	35.9	20.6	74.0	74.7
TOTAL 1986	183.1		140.6	81.5	76.8	
1987 FIRST QUARTER	51.2	28.9	37.4	21.4	72.9	74.2
SECOND QUARTER	52.5	29.7	38.6	22.1	73.7	74.2
THIRD QUARTER	55.0	30.9	39.2	22.3	71.2	72.1
FOURTH QUARTER	57.0	32.3	40.1	22.6	70.4	70.1
TOTAL 1987	215.7	121.8	155.3	88.4	72.0	72.6
1988 FIRST QUARTER	59.0	33.4	41.2	23.3	69.8	69.9
SECOND QUARTER	59.6	33.6	41.1	23.0	69.0	68.5
THIRD QUARTER	62.1	34.9	42.3	23.6	68.2	67.6
FOURTH QUARTER	64.0	35.9	43.0	23.6	67.2	65.8
TOTAL 1988	244.6	137.8	167.6	93.6	68.5	67.9
1989 FIRST QUARTER	66.2	37.3	44.2	24.5	66.8	65.7
SECOND QUARTER	68.5	38.1	44.4	24.5	64.8	64.4
THIRD QUARTER	69.7	38.6	44.9	24.7	64.4	64.1
FOURTH QUARTER	72.6	40.0	46.4	25.3	63.9	63.3
TOTAL 1989	277.1	153.9	179.9	99.0	64.9	64.3
1990 FIRST QUARTER	74.7	41.2	47.1	25.8	63.0	62.5
SECOND QUARTER	75.8	41.9	47.1	25.7	62.1	61.5
THIRD QUARTER	77.9	43.4	48.7	26.4	62.5	60.9
FOURTH QUARTER	79.1	43.1	49.8	27.8	63.0	64.5
TOTAL 1990	307.4	169.6	192.6	105.8	62.6	62.4
1991 FIRST QUARTER	79.2	43.4	49.9	27.1	63.0	62.4
SECOND QUARTER	81.9	44.9	50.5	26.8	61.7	59.6
THIRD QUARTER	82.6	45.1	51.2	27.1	61.9	60.1
FOURTH QUARTER	84.4	46.4	52.4	27.9	62.1	60.0
TOTAL 1991	328.0	179.8	204.0	108.8	62.2	60.5

**TABLE 1.1 - INTERSTATE SWITCHED ACCESS MINUTES
(FIGURES SHOWN IN BILLIONS)**

	TOTAL INDUSTRY		AT&T		AT&T'S SHARE OF	
	ACCESS MINUTES	TERMINATING MINUTES	ACCESS MINUTES	TERMINATING MINUTES	ACCESS MINUTES	TERMINATING MINUTES
1992 FIRST QUARTER	85.6	47.7	53.3	28.6	62.2 %	59.9 %
SECOND QUARTER	86.5	48.2	51.9	27.9	60.0	57.8
THIRD QUARTER	87.9	49.1	53.0	28.4	60.3	57.9
FOURTH QUARTER	89.8	50.4	53.5	28.8	59.7	57.1
TOTAL 1992	349.7	195.4	211.7	113.6	60.5	58.2
1993 FIRST QUARTER	90.6	51.0	55.5	29.7	61.3	58.1
SECOND QUARTER	91.2	51.9	55.0	29.9	60.3	57.6
THIRD QUARTER	93.6	54.8	56.3	31.4	60.2	57.2
FOURTH QUARTER	95.9	56.4	56.8	31.9	59.3	56.6
TOTAL 1993	371.2	214.1	223.6	122.8	60.2	57.4
1994 FIRST QUARTER	98.7	58.2	59.0	31.4	59.8	53.9
SECOND QUARTER	97.9	58.3	57.7	31.1	59.0	53.3
THIRD QUARTER	101.9	60.9	58.5	32.6	57.4	53.5
FOURTH QUARTER	102.9	62.0	59.5	33.3	57.9	53.6
TOTAL 1994	401.4	239.4	234.7	128.3	58.5	53.6
1995 FIRST QUARTER	105.6	63.8	59.9	33.6	56.7	52.7
SECOND QUARTER	106.8	64.7	59.3	33.5	55.5	51.8
THIRD QUARTER	109.0	66.7	59.8	34.4	54.8	51.6
FOURTH QUARTER	110.6	67.5	60.8	34.6	55.0	51.2
TOTAL 1995	431.9	262.7	239.8	136.1	55.5	51.8
1996 FIRST QUARTER	115.7	71.2	62.4	35.9	54.0	50.5
SECOND QUARTER	114.7	71.5	60.2	35.1	52.4	49.0
THIRD QUARTER	117.8	74.1	60.7	35.5	51.5	48.0
FOURTH QUARTER	122.2	77.7	61.7	35.6	50.5	45.8
TOTAL 1996	470.4	294.5	244.9	142.1	52.1	48.3
1997 FIRST QUARTER	122.9	77.1	63.9	37.1	52.0	48.2
SECOND QUARTER	124.8	79.4	63.2	37.1	50.7	46.7
THIRD QUARTER	125.6	79.7	65.3	38.6	52.0	48.5
FOURTH QUARTER	125.9	79.9	64.1	37.4	50.9	46.8
TOTAL 1997	499.1	316.0	256.5	150.2	51.4	47.5

2. PRESUBSCRIBED LINES

A telephone line is said to be presubscribed to the long distance carrier that receives the ordinary long distance calls placed on that line. In areas where equal access is available (areas now covering more than 99% of the nation's lines), customers may choose a long distance carrier. Thereafter, all of the customer's long distance calls are routed to the chosen carrier unless the customer alters normal dialing procedure. For example, the customer might dial a special code to reach an alternate long distance carrier. In areas where equal access is not yet available, all lines are considered presubscribed to AT&T. By the end of 1996, more than 600 companies were providing long distance service to their own presubscribed customers.

Information on the number of lines presubscribed to each long distance carrier was collected by NECA because FCC rules required NECA to recover certain expenses from the larger long distance carriers. A long distance carrier "qualified" for paying these expenses if the number of lines presubscribed to the carrier equaled or exceeded .05% of the nation's presubscribed lines. NECA filed information semi-annually with the Commission. This information is summarized in Table 2.1. Following passage of the Telecommunications Act of 1996, the FCC changed its rules on universal service. At the end of 1996, NECA stopped collecting the presubscribed line data used in this report. As a result, information for December 1996 is the last presubscribed line data collected by NECA.

As of December 1996, NECA reported 158.7 million presubscribed lines in the United States. Special access lines, WATS lines, 800 lines, and other specialized lines are not included in the counts of presubscribed lines. In addition, there are some customers who decide not to choose a long distance carrier and some customers who have toll-restricted lines. Those lines are also not in the count of presubscribed lines.

Table 2.2 lists the market share of presubscribed lines for the top four long distance carriers individually and a composite market share for all other carriers. As of year end 1996, about 63% of the nation's lines were presubscribed to AT&T, 15% to MCI, 7% to Sprint, and 3% to WorldCom. Over six hundred smaller carriers serving about 19.2 million lines accounted for the remaining 12% of the industry.

Table 2.3 computes the annual rates of growth of presubscribed lines for the top four carriers individually, an annual growth rate for the remaining carriers, and an annual growth rate for the total number of industry lines. The annual growth rates are based on twelve month intervals. Because the information was first made available in December 1987, no annual rates of growth could be calculated until December 1988.

TABLE 2.1 - PRESUBSCRIBED TELEPHONE LINES BY CARRIER

	DEC 88	JUNE 88	DEC 85	JUNE 85	DEC 84	JUNE 84
TOTAL NUMBER OF CARRIERS WITH PRESUBSCRIBED LINES	621	582	583	549	511	454
TOTAL NUMBER OF QUALIFYING CARRIERS	45	43	44	36	35	29
TOTAL NUMBER OF NON-QUALIFYING CARRIERS	576	539	539	513	476	425
QUALIFYING COMPANIES 1/						
AT&T COMPANIES:						
AT&T COMMUNICATIONS	100,177,257	99,599,355	101,138,792	102,502,271	103,957,425	102,421,583
AT&T ALASCOM, INC. 2/	224,192	222,144	218,135	232,525	226,974	222,142
MCI TELECOMMUNICATIONS CORP.						
SOUTHERNET	22,938,608	24,338,086	23,911,437	23,459,534	22,040,062	22,286,410
TELECOM*USA						
TELECONNECT						
SPRINT						
LA CONEXION FAMILIAR, INC.	11,788,717	10,905,940	9,784,388	9,589,788	9,467,999	9,244,159
LONG DISTANCEUSA						
WORLDCOM 3/						
ADVANCED TELECOM CORP. (ATC)	4,297,498	4,110,753	4,088,816	3,683,433	1,954,198	1,831,304
AMERICAN NETWORK						
CLAYDESTA DIGITAL						
COM SYSTEMS DBA SUN DIAL						
ITT						
METROMEDIA						
MICROTEL						
MID-AMERICAN						
NATIONAL TELECOMMUNICATIONS						
NTS (NATIONAL TELEPHONE SYSTEMS)						
TELUUS/TELTEC SAVING						
TOUCH-1 LONG DISTANCE						
WALTEL 4/					320,571	161,143
MFS INTELENET, INC.	211,085	177,648	106,489		960,004	677,430
EXCEL TELECOMMUNICATIONS, INC.						
	3,792,171	3,313,287	1,486,953	223,235	75,543	
LCI COMPANIES:						
LCI INTERNATIONAL/LITEL 5/	2,244,192	1,965,532	1,227,925	840,968	638,464	614,937
LCI CORPORATE TELEMANAGEMENT GROUP			85,868			
LCIA/S SIGNAL CORP. 6/			128,305	121,445	114,026	
FRONTIER COMPANIES: 7/						
FRONTIER ALLNET COMM. SVC., INC. 8/	2,050,019	2,097,182	2,348,301			
FRONTIER COMMUNICATIONS INT'L 9/	(1,334,100)	(1,317,313)	(1,548,858)	1,650,296	1,334,360	1,078,577
FRONTIER COMM-NORTH CENTRAL REGION 10/	(488,074)	(441,493)	(436,609)	365,841	283,372	278,542
FRONTIER OF THE GREAT LAKES 11/	(134,721)	(150,861)	(161,242)	154,038	132,946	
FRONTIER OF THE WEST 12/	(93,124)	(97,277)	(95,633)	88,043	84,141	80,573
SNET AMERICA LONG DISTANCE		(90,438)	(106,159)	133,300	137,489	144,240
GTE LONG DISTANCE CO.	783,135	597,251	304,391	223,844	105,855	
CABLE & WIRELESS COMMUNICATIONS	733,558	169,608				
TELEFONICA LARGA DISTANCIA	625,367	584,802	543,617	524,014	524,153	537,919
U.S. LONG DISTANCE/ZERO PLUS	470,267	458,783	452,017	444,205	441,467	446,390
UNITED TELEPHONE LONG DISTANCE	356,932	276,153	212,611	149,308	116,602	
TOUCH 1 COMMUNICATIONS	289,380	471,687	517,379	545,189	572,010	612,991
CITIZENS TELECOM	209,905	149,392	134,779	108,550		
LONG DISTANCE SAVERS	206,698	141,636				
BUSINESS TELECOM, INC. (BTI)	185,247	170,359	158,001	151,473	141,697	128,716
INTER CONTINENTAL TELEPHONE	177,423	171,239	146,118	132,196	121,822	100,808
L.D. SERVICES, INC.	160,084	117,780	134,572	120,932	99,033	84,534
COASTAL TELEPHONE COMPANY	143,601	116,239	99,557	90,774		
NATIONAL TELEPHONE COMMUNICATIONS, INC.	141,358	133,108	97,917			
VARTEC TELECOM, INC.	139,185					
CINCINNATI BELL LONG DISTANCE INC.	137,594	116,898	120,832	136,568	122,991	130,738
GENERAL COMMUNICATIONS, INC.	134,506	120,710	115,398	102,634	102,163	92,302
ALLTEL LONG DISTANCE	130,994	124,969	119,663	102,813	102,528	102,202
SWITCHED SERVICES COMMUNICATIONS 13/	127,563	78,401				
TELAMERICA, INC.	126,721					
ATX TELECOMMUNICATIONS SERVICES	124,628	122,093	115,403	109,463	105,053	100,282
ONE CALL COMMUNICATIONS	122,297	119,843	118,637	113,466	107,979	110,023
AMERIVISION COMMUNICATIONS	120,952	110,352	93,613	78,328		
CENTURY AREA LONG LINES	117,120					
ACCESS LONG DISTANCE	116,708	104,143				
OCI (ONCOR)	107,423	101,914	90,562	81,438		
INTERNATIONAL TELECHARGE	106,742	116,046	128,209	148,918	161,085	163,972
COMMONWEALTH LONG DISTANCE (CLD)						
AMERICAN TELCO, INC.	103,421	109,349	139,414	146,663	147,045	125,682
TWT-HEARTLINE	99,806	89,783	83,402			
ACC LONG DISTANCE CORPORATION	97,531	118,455	117,739			72,803
MATRIX TELECOM	87,687	80,795	79,652		74,482	
TRESCOM INTERNATIONAL, INC.	85,971	89,689	91,031			
DELTACOM L.D.S.	84,766					
WINSTAR GATEWAY NETWORK, INC	83,580					
MIDCOM COMMUNICATIONS		109,991	86,652			
COMMUNIQUE TELECOM		79,472	81,386	102,076		
WORLDXCHANGE 14/					188,295	197,874
CHERRY COMMUNICATIONS			140,610	127,839	156,055	79,270
LINTEL (LINCOLN)			104,367	93,746		
SONIC COMMUNICATIONS 15/			79,281	81,010	85,496	88,136
TELESPHERE NETWORK 15/					114,041	
PUERTO RICO TEL-COM						
NETECH COMM, US WEST						
TOTAL QUALIFYING CARRIERS	154,461,869	152,080,868	149,232,439	146,960,164	145,317,426	142,215,682
NON-QUALIFYING CARRIERS	4,210,374	3,920,356	3,368,738	3,384,888	3,161,902	3,013,060
TOTAL INDUSTRY PRESUBSCRIBED LINES	158,672,243	156,001,224	152,601,177	150,345,052	148,479,328	145,228,742

TABLE 2.1 - PRESUBSCRIBED TELEPHONE LINES BY CARRIER

	DEC 93	JUNE 93	DEC 92	JUNE 92	DEC 91	JUNE 91
TOTAL NUMBER OF CARRIERS WITH PRESUBSCRIBED LINES	436	412	414	425	388	355
TOTAL NUMBER OF QUALIFYING CARRIERS	27	28	28	24	22	24
TOTAL NUMBER OF NON-QUALIFYING CARRIERS	409	384	386	401	366	331
QUALIFYING COMPANIES 1/						
AT&T COMPANIES:						
AT&T COMMUNICATIONS	101,711,178	101,770,741	101,203,888	101,384,413	101,498,260	101,013,529
AT&T ALASCOM, INC. 2/	216,964	218,225	209,850	203,832	203,105	196,244
MCI TELECOMMUNICATIONS CORP.	21,818,212	21,170,832	20,167,298	19,189,649	18,329,870	17,603,453
SOUTHERNET						
TELECOM*USA						
TELECONNECT						
SPRINT						
LA CONEXION FAMILIAR, INC.	9,212,993	8,621,177	8,856,004	8,424,303	8,353,583	8,702,085
LONG DISTANCEUSA			71,327	72,555		
WORLDCOM 3/						
ADVANCED TELECOM CORP. (ATC)	1,752,616	931,553	482,043	338,820	332,244	134,043
AMERICAN NETWORK			440,961	331,136	333,152	334,157
CLAYDESTA DIGITAL						
COM SYSTEMS DBA SUN DIAL		134,950	126,190	117,571	116,326	119,034
ITT						
METROMEDIA		538,362	494,864	468,698	476,128	497,187
MICROTEL						
MID-AMERICAN						
NATIONAL TELECOMMUNICATIONS						
NTS (NATIONAL TELEPHONE SYSTEMS)						91,417
TELU/TELTEC SAVING						
TOUCH-1 LONG DISTANCE	98,044	105,244	110,929			
WLTTEL 4/	432,844	339,960	191,076	116,501	87,758	
MFS INTELENET, INC.						
EXCEL TELECOMMUNICATIONS, INC.						
LCI COMPANIES:						
LCI INTERNATIONAL/LITEL 5/	405,644	359,575	338,496	226,350	186,884	163,089
LCI CORPORATE TELEMANAGEMENT GROUP						
LCI/US SIGNAL CORP. 6/	109,071	93,155	77,096			
FRONTIER COMPANIES: 7/						
FRONTIER dba ALLNET COMM. SVC., INC. 8/	891,577	846,961	859,499	830,548	813,748	775,847
FRONTIER COMMUNICATIONS INT'L 9/	279,304	260,760	252,495	240,670	190,382	180,321
FRONTIER COMM-NORTH CENTRAL REGION 10/						
FRONTIER OF THE GREAT LAKES 11/	77,699	76,521	71,059			
FRONTIER OF THE WEST 12/	96,539					
SNET AMERICA LONG DISTANCE						
GTE LONG DISTANCE CO.						
CABLE & WIRELESS COMMUNICATIONS	529,398	522,112	513,419	490,228	466,935	448,951
TELEFONICA LARGA DISTANCIA	442,922	436,695	432,701	425,334	419,293	393,034
U.S. LONG DISTANCE/ZERO PLUS						
UNITED TELEPHONE LONG DISTANCE	648,131	625,831	639,341	626,850	596,114	590,187
TOUCH 1 COMMUNICATIONS						
CITIZENS TELECOM						
LONG DISTANCE SAVERS	112,905	98,514	87,687	80,839	77,568	73,696
BUSINESS TELECOM, INC. (BTI)	79,396					
INTER CONTINENTAL TELEPHONE						
L.D. SERVICES, INC.						
COASTAL TELEPHONE COMPANY						
NATIONAL TELEPHONE COMMUNICATIONS, INC.						
VARTEC TELECOM, INC.	117,692	77,258				
CINCINNATI BELL LONG DISTANCE INC.	93,659	93,014	90,841	85,974	79,182	74,387
GENERAL COMMUNICATIONS, INC.	99,911	91,812	87,798	94,229	93,233	90,252
ALLTEL LONG DISTANCE						
SWITCHED SERVICES COMMUNICATIONS 13/						
TELAMERICA, INC.	94,114	92,719	92,860	91,460	85,801	90,887
ATX TELECOMMUNICATIONS SERVICES	104,971	86,186	82,303	70,246		
ONE CALL COMMUNICATIONS						
AMERVISION COMMUNICATIONS						
CENTURY AREA LONG LINES						
ACCESS LONG DISTANCE						
OCI (ONCOR)						
INTERNATIONAL TELECHARGE	144,511	106,625	87,593			
COMMONWEALTH LONG DISTANCE (CLD)	113,072	103,407	103,684	93,241	72,813	82,085
AMERICAN TELCO, INC.						
TWT-HEARTLINE						
ACC LONG DISTANCE CORPORATION						
MATRIX TELECOM						
TRESKOM INTERNATIONAL, INC.						
DELTACOM L.D.S.						
WINSTAR GATEWAY NETWORK, INC						
MIDCOM COMMUNICATIONS						
COMMUNIQUE TELECOM	189,781	161,398	148,865	133,090	106,892	93,809
WORLDXCHANGE 14/						
CHERRY COMMUNICATIONS						
LINTEL (LINCOLN)	90,146	91,420	93,427	93,562	94,183	96,415
SONIC COMMUNICATIONS 15/						
TELESPHERE NETWORK 15/						
PUERTO RICO TEL-COM						94,666
NETECH COMM, US WEST		107,063				79,146
TOTAL QUALIFYING CARRIERS	139,963,294	138,162,070	136,423,594	134,230,099	133,013,454	132,017,921
NON-QUALIFYING CARRIERS	2,845,986	2,452,609	2,301,446	2,473,551	2,273,128	1,878,542
TOTAL INDUSTRY PRESUBSCRIBED LINES	142,809,280	140,614,679	138,725,040	136,703,650	135,286,582	133,896,463

TABLE 2.1 - PRESUBSCRIBED TELEPHONE LINES BY CARRIER

	DEC 90	JUNE 90	DEC 89	JUNE 89	DEC 88	JUNE 88	DEC 87
TOTAL NUMBER OF CARRIERS WITH PRESUBSCRIBED LINES	325	314	302	276	253	242	223
TOTAL NUMBER OF QUALIFYING CARRIERS	21	20	20	21	21	20	19
TOTAL NUMBER OF NON-QUALIFYING CARRIERS	304	294	282	255	232	222	204
QUALIFYING COMPANIES 1/							
AT&T COMPANIES:							
AT&T COMMUNICATIONS	100,061,611	99,612,725	99,396,609	100,006,827	100,205,677	100,832,869	101,652,678
AT&T ALASCOM, INC. 2/	182,341	179,175	168,095	165,332	161,572	157,250	152,040
MCI TELECOMMUNICATIONS CORP.	17,434,898	16,664,001	15,055,643	13,671,625	12,149,921	10,941,207	9,990,561
SOUTHERNET					215,384	199,093	183,769
TELECOM*USA		712,263	646,084	533,516			
TELECONNECT					247,042	211,949	156,614
SPRINT	8,743,988	8,148,013	8,167,638	7,674,605	7,197,136	6,382,372	5,836,179
LA CONEXION FAMILIAR, INC.							
LONG DISTANCE/USA						81,692	85,680
WORLD/COM 3/	116,864	70,781	66,576				
ADVANCED TELECOM CORP. (ATC)	355,518	372,260	396,319	262,542			
AMERICAN NETWORK							95,926
CLAYDESTA DIGITAL						78,804	71,794
COM SYSTEMS DBA SUN DIAL					96,914		
ITT	118,963	118,225	89,081	87,520	62,773		
METROMEDIA			412,197	425,109	420,793	394,707	279,549
MICROTEL	515,711	198,374	207,599	209,036	215,181	211,210	215,485
MID-AMERICAN					70,273	63,587	
NATIONAL TELECOMMUNICATIONS				89,367	97,526	100,113	96,364
NTS (NATIONAL TELEPHONE SYSTEMS)		67,129	77,667	65,692			
TELUS/TELTEC SAVING				134,150			
TOUCH-1 LONG DISTANCE					125,339	117,191	105,243
WILTEL 4/							
MFS INTELENET, INC.							
EXCEL TELECOMMUNICATIONS, INC.							
LCI COMPANIES:							
LCI INTERNATIONAL/LITEL 5/	144,926	137,164	123,748	107,302	92,014		
LCI CORPORATE TELEMANAGEMENT GROUP							
LCI/US SIGNAL CORP. 6/							
FRONTIER COMPANIES: 7/							
FRONTIER dba ALLNET COMM. SVC., INC. 8/	744,452	709,876	677,531	687,097	763,680	818,080	726,974
FRONTIER COMMUNICATIONS INT'L 9/	171,198	150,069	113,329	98,334	83,383	63,574	
FRONTIER COMM-NORTH CENTRAL REGION 10/							
FRONTIER OF THE GREAT LAKES 11/							
FRONTIER OF THE WEST 12/							
SNET AMERICA LONG DISTANCE							
GTE LONG DISTANCE CO.							
CABLE & WIRELESS COMMUNICATIONS	422,534	407,906	394,020	358,290	304,976	256,786	236,000
TELEFONICA LARGA DISTANCIA	375,694						
U.S. LONG DISTANCE/ZERO PLUS							
UNITED TELEPHONE LONG DISTANCE	548,303	524,477	513,033	430,550	285,385	167,025	82,602
TOUCH 1 COMMUNICATIONS							
CITIZENS TELECOM							
LONG DISTANCE SAVERS							
BUSINESS TELECOM, INC. (BTI)							
INTER CONTINENTAL TELEPHONE							
L.D. SERVICES, INC.							
COASTAL TELEPHONE COMPANY							
NATIONAL TELEPHONE COMMUNICATIONS, INC.							
VARTEC TELECOM, INC.							
CINCINNATI BELL LONG DISTANCE INC.	67,689						
GENERAL COMMUNICATIONS, INC.	88,360	82,386	86,089	85,773	83,468	84,807	89,338
ALLTEL LONG DISTANCE							
SWITCHED SERVICES COMMUNICATIONS 13/							
TELAMERICA, INC.	101,968	102,530	100,213	99,038	90,570	94,654	94,292
ATX TELECOMMUNICATIONS SERVICES							
ONE CALL COMMUNICATIONS							
AMERIVISION COMMUNICATIONS							
CENTURY AREA LONG LINES							
ACCESS LONG DISTANCE							
OCI (ONCOR)							
INTERNATIONAL TELECHARGE	83,725	87,751	95,252	71,346			
COMMONWEALTH LONG DISTANCE (CLD)							
AMERICAN TELCO, INC.							
TWT-HEARTLINE							
ACC LONG DISTANCE CORPORATION							
MATRIX TELECOM							
TRES/COM INTERNATIONAL, INC.							
DELTACOM L.D.S.							
WINSTAR GATEWAY NETWORK, INC							
MIDCOM COMMUNICATIONS							
COMMUNIQUE TELECOM							
WORLDXCHANGE 14/							
CHERRY COMMUNICATIONS							
LINTEL (LINCOLN)	99,594	95,126	96,966	93,353	94,031	92,636	93,352
SONIC COMMUNICATIONS 15/							
TELESPHERE NETWORK 15/	111,386						
PUERTO RICO TEL-COM	99,821						
NETECH COMM, US WEST							
TOTAL QUALIFYING CARRIERS	130,589,544	129,000,782	126,883,689	125,356,404	123,063,038	121,349,606	120,244,460
NON-QUALIFYING CARRIERS	1,819,064	1,776,233	1,598,790	1,390,131	1,297,791	1,315,809	1,222,040
TOTAL INDUSTRY PRESUBSCRIBED LINES	132,408,608	130,777,015	128,482,479	126,746,535	124,360,829	122,665,415	121,466,500

Notes for Table 2.1 - Presubscribed Telephone Lines by Carrier

- 1/ Information for each qualifying company is only shown for years in which the carrier had at least 0.05% of overall presubscribed lines.
- 2/ Purchased by AT&T in 1995.
- 3/ LDDS/WorldCom changed its name to WorldCom, Inc. in May 1995.
- 4/ WorldCom and Wiltel merged on January 5, 1995.
- 5/ Name changed from Litel, December 1994.
- 6/ Name changed from Teledial America, December 1994.
- 7/ The total number of presubscribed lines reported by Frontier in 1995 and 1996 are only for those subsidiaries which meet the qualifying companies' threshold noted in footnote 1 above.
- 8/ Purchased by Frontier in 1995.
- 9/ Name changed to RCI, December 1994.
- 10/ Formerly American Sharecom; purchased by Frontier in 1995.
- 11/ Formerly Schneider Communications; purchased by Frontier in 1995.
- 12/ Formerly West Coast Telecommunications; purchased by Frontier in 1995.
- 13/ Subsidiary of IXC Communications.
- 14/ Name changed from Communications Telesystems International (CTI) in 1995.
- 15/ Company went bankrupt.

TABLE 2.2 - MARKET SHARE OF PRESUBSCRIBED LINES

		AT&T	MCI	SPRINT	WORLDCOM	OTHER CARRIERS
1987	DEC	83.7 %	8.2 %	4.8 %		3.3 %
1988	JUNE	82.2	8.9	5.2		3.7
	DEC	80.6	9.8	5.8		3.9
1989	JUNE	78.9	10.8	6.1	0.0 %	4.3
	DEC	77.4	11.7	6.4	0.1	4.5
1990	JUNE	76.2	12.9	6.2	0.1	4.7
	DEC	75.6	13.2	6.6	0.1	4.6
1991	JUNE	75.4	13.1	6.5	0.1	4.8
	DEC	75.0	13.5	6.2	0.2	5.0
1992	JUNE	74.2	14.0	6.2	0.2	5.4
	DEC	73.0	14.5	6.4	0.3	5.8
1993	JUNE	72.4	15.1	6.1	0.7	5.8
	DEC	71.2	15.3	6.5	1.2	5.8
1994	JUNE	70.5	15.3	6.4	1.3	6.5
	DEC	70.0	14.8	6.4	1.3	7.4
1995	JUNE	68.2	15.6	6.4	2.4	7.4
	DEC	66.4	15.7	6.4	2.7	8.8
1996	JUNE	64.0	15.6	7.0	2.6	10.8
	DEC	63.3	14.5	7.4	2.7	12.1

TABLE 2.3 - ANNUAL RATES OF GROWTH OF PRESUBSCRIBED LINES

		AT&T	MCI	SPRINT	WORLDCOM	OTHER CARRIERS	TOTAL INDUSTRY LINES
1987	DEC						
1988	JUNE						
	DEC	-1.4 %	21.6 %	23.3 %		22.1 %	2.4 %
1989	JUNE	-0.8	25.0	20.2		21.1	3.3
	DEC	-0.8	23.9	13.5		18.7	3.3
1990	JUNE	-0.4	23.4	6.2		10.6	3.2
	DEC	0.7	15.8	7.1	75.5 %	17.3	3.1
1991	JUNE	1.4	4.4	6.8	89.4	19.7	2.4
	DEC	1.4	5.1	-4.5	184.3	11.8	2.2
1992	JUNE	0.4	9.0	-3.2	152.8	13.2	2.1
	DEC	-0.3	10.0	6.0	45.1	17.2	2.5
1993	JUNE	0.4	10.3	2.3	174.9	11.3	2.9
	DEC	0.5	8.2	4.0	263.6	4.7	2.9
1994	JUNE	0.6	5.3	7.2	96.6	16.1	3.3
	DEC	2.2	1.0	2.8	11.5	32.7	4.0
1995	JUNE	0.1	5.3	3.7	101.1	17.6	3.5
	DEC	-2.5	8.5	3.3	109.2	21.8	2.8
1996	JUNE	-2.6	3.7	13.7	11.6	51.6	3.8
	DEC	-0.9	-4.1	20.5	5.1	43.0	4.0

3. TOLL REVENUES

The larger long distance telephone companies (those with over \$109 million in annual operating revenues for calendar year 1996) are required to report their annual revenues to the FCC. Unlike the data on switched access minutes, which exclude intrastate toll calls, the revenues reported include intrastate calls, along with other domestic and interstate calls. For most carriers, no information is publicly available that separates their revenues into interstate versus intrastate service. In 1996, services provided by long distance carriers generated over \$82 billion in revenue. These revenues are shown in Table 3.1. The larger local telephone companies also provide a substantial amount of intrastate toll service. Revenues from the toll traffic handled by local telephone companies remained constant at approximately \$11 billion in 1996. The total toll market is \$93 billion, which is also shown in Table 3.1.

In 1996, AT&T's revenues were \$39 billion, having grown slightly from \$35 billion in 1984. MCI's revenues grew from almost \$2 billion in 1984 to over \$16 billion in 1996. Sprint's revenues grew from about \$1 billion in 1984 to about \$8 billion in 1996. WorldCom's revenues, which were first reported to the FCC in 1989, have grown from \$110 million to over \$4 billion. In 1996, three other companies, Frontier, Excel Telecommunications and LCI, also had long distance revenues exceeding \$1 billion.

Table 3.2 shows market share information based on revenues for long distance carriers and for the total toll market, which includes toll revenues collected by local exchange carriers. AT&T's 1984 toll revenues accounted for about 90% of the revenues received by all long distance carriers and about 68% of all toll calling. In 1996, AT&T's revenues accounted for less than half (48%) of all long distance carrier revenues, and only 42% of all toll calling. MCI's long distance carrier market share has increased from 5% in 1984 to 20% in 1996. Sprint's long distance carrier market share has increased from 3% in 1984 to 10% in 1996. WorldCom's long distance carrier market share has increased from slightly more than 0% in 1989 to 6% in 1996. Smaller long distance carriers increased their share of the market six-fold, growing from less than 3% in 1984 to 17% in 1996.

An annual Hirschman-Herfindahl Index (HHI) also is shown in Table 3.2. The HHI is the sum of squares of the market shares of the companies in a particular industry and is used by the Department of Justice as an initial measure of further concentration in a particular industry resulting from a horizontal merger or acquisition. Since 1984, the HHI has fallen dramatically from 8,155 to 2,823 when calculated based on long distance carrier revenue. The HHI for the total toll market, which includes toll revenues for both long distance carriers and local exchange companies, has fallen from 4,734 to 2,197 over the same period of time.

Table 3.3 shows annual toll revenues divided into three toll categories: intrastate, domestic interstate, and international. Though the total toll revenue figures are composed mostly of telephone service revenues, they also include revenues generated from telegraph, telex, and private line services. The intrastate toll figure includes both intraLATA and interLATA toll revenues. Of considerable interest is the enormous growth (almost 400%) in the international toll market from 1984 to 1996.

Quarterly reports to stockholders (the source for SEC 10Q filings) represent an alternative source of data on revenues. There are, however, usually differences between revenues reported to the FCC and the revenues reported to stockholders. These differences are related to the treatment of access charges, international settlements, and miscellaneous communications revenues that carriers include in the financial reports to stockholders but exclude in reports to the FCC. Quarterly market share

estimates based on financial reports to shareholders are shown in Table 3.4 and are similar to the results produced from annual data.

TABLE 3.1 - TOTAL OPERATING REVENUES OF LONG DISTANCE SERVICE PROVIDERS
(DOLLAR AMOUNTS SHOWN IN MILLIONS)

COMPANY	1996	1995	1994	1993	1992	1991
T&T COMPANIES: 1/						
AT&T COMMUNICATIONS, INC.	\$39,264	\$38,069	\$37,166	\$35,731	\$35,495	\$34,384
ALASCOM, INC.		325	329	320	333	338
MCI TELECOMMUNICATIONS CORP. 2/	16,372	14,617	11,715	10,947	9,719	8,266
TELECOM*USA						
SPRINT COMMUNICATIONS CO. 3/	7,944	7,277	6,805	6,139	5,658	5,378
GTE SPRINT						
US TELECOM						
WORLDCOM, INC. 4/	4,485	3,640	2,221	1,145	801	263
ADVANCED TELECOMMUNICATIONS CORP.						356
METROMEDIA COMMUNICATIONS CORP. 5/				297	369	369
ITT COMMUNICATION SERVICES, INC.						
COMSYSTEMS NETWORK SERVICES				116	135	131
WILTEL, INC.			917	664	494	405
MFS INTELENET, INC.	122	118				
FRONTIER COMPANIES: 6/						
ALLNET COMM. SVCS. dba FRONTIER COMM. SVCS. 7/	1,119	827	568	436	376	347
LEXITEL						
FRONTIER COMMUNICATIONS INT'L, INC. 8/	323	309	306	213	168	155
FRONTIER COMM. OF THE NORTH CENTRAL REGION	121	133	123			
FRONTIER COMMUNICATIONS OF THE WEST, INC.		127	144			
LCI INTERNATIONAL TELECOM CORP.	1,103	671	453	317	243	208
EXCEL TELECOMMUNICATIONS, INC. 9/ 10/	1,091	363	156			
CABLE & WIRELESS COMMUNICATIONS, INC.	919	700	654	557	495	406
VARTEC TELECOM, INC.	470	125	107			
TELCO COMMUNICATIONS GROUP, INC.	429	215				
CHERRY COMMUNICATIONS, INC.	354					
USA GLOBAL LINK	242					
TEL-SAVE, INC. 9/	232	180				
TELEGROUP, INC. 9/	213	129				
TAR TELECOMMUNICATIONS, INC.	208					
TC COMMUNICATIONS, INC.	204					
COMMUNICATION TELESYSTEMS INT'L. 9/	196	115				
USLD COMMUNICATIONS CORP. 11/	188	155	136	100		
PACIFIC GATEWAY EXCHANGE, INC.	162					
BUSINESS TELECOM, INC. 12/	149	115				
MIDCOM COMMUNICATIONS, INC.	149	204	109			
GENERAL COMMUNICATION, INC. 13/	143	120	106	92		
TRESCOM INTERNATIONAL, INC.	140					
ACC LONG DISTANCE CORP.	118					
PHONETIME, INC. (PTI)	117					
ONE CALL COMMUNICATIONS, INC.	114					
GE CAPITAL COMMUNICATIONS SERVICES CORP. 9/		120				
ONCOR COMMUNICATIONS, INC. 9/		111	172	140	159	181
THE FURST GROUP, INC. 9/		109				
AMERICAN NETWORK EXCHANGE, INC.		101	109			
TELESPHERE NETWORK, INC. 14/						308
(NATIONAL TELEPHONE SERVICES, INC.)						
OTHERS 15/	5,342	5,168	5,055	4,319	3,923	2,948
TOTAL LONG DISTANCE CARRIERS	82,093	74,149	67,351	61,539	56,369	54,243
TOLL SERVICE REVENUES:						
BELL OPERATING COMPANIES	7,950	8,189	9,527	9,849	9,718	10,066
OTHER LOCAL TELEPHONE COMPANIES 15/	3,298	3,143	3,848	3,908	3,897	4,049
TOTAL LOCAL EXCHANGE COMPANIES	11,248	11,332	13,375	13,757	13,615	14,115
TOTAL REVENUES OF LONG DISTANCE SERVICE PROVIDERS	\$93,281	\$85,475	\$80,726	\$75,296	\$70,984	\$68,358

TABLE 3.1 - TOTAL OPERATING REVENUES OF LONG DISTANCE SERVICE PROVIDERS (CONT'D)
(DOLLAR AMOUNTS SHOWN IN MILLIONS)

COMPANY	1990	1989	1988	1987	1986	1985	1984
AT&T COMPANIES: 1/ AT&T COMMUNICATIONS, INC.	\$33,880	\$34,549	\$35,407	\$35,219	\$36,514	\$36,770	\$34,935
ALASCOM, INC.	259	278	272	262	267	271	255
MCI TELECOMMUNICATIONS CORP. 2/ TELECOM*USA	7,392	6,171	4,886	3,938	3,372	2,331	1,761
SPRINT COMMUNICATIONS CO. 3/ GTE SPRINT US TELECOM	5,041	4,320	3,405	2,592	1,141	779	1,052
WORLD COM, INC. 4/ ADVANCED TELECOMMUNICATIONS CORP. METROMEDIA COMMUNICATIONS CORP. 5/ ITT COMMUNICATION SERVICES, INC. COMSYSTEMS NETWORK SERVICES	154	110			212	387	
WILTEL, INC. MFS INTELENET, INC.	342	326	178	162	124	86	72
FRONTIER COMPANIES: 6/ ALLNET COMM. SVCS. dba FRONTIER COMM. SVCS. 7/ LEXITEL	381	127					
FRONTIER COMMUNICATIONS INT'L, INC. 8/ FRONTIER COMM. OF THE NORTH CENTRAL REGION FRONTIER COMMUNICATIONS OF THE WEST, INC.	130	404	379	287	282	241	161
LCI INTERNATIONAL TELECOM CORP. EXCEL TELECOMMUNICATIONS, INC. 9/ 10/ CABLE & WIRELESS COMMUNICATIONS, INC. VARTEC TELECOM, INC.	130	376					
TELCO COMMUNICATIONS GROUP, INC. CHERRY COMMUNICATIONS, INC. USA GLOBAL LINK TEL-SAVE, INC. 9/ TELEGROUP, INC. 9/ STAR TELECOMMUNICATIONS, INC. IXC COMMUNICATIONS, INC. COMMUNICATION TELESYSTEMS INT'L. 9/ ISLD COMMUNICATIONS CORP. 11/ PACIFIC GATEWAY EXCHANGE, INC. BUSINESS TELECOM, INC. 12/ MIDCOM COMMUNICATIONS, INC. GENERAL COMMUNICATION, INC. 13/ TRESKOM INTERNATIONAL, INC. ACC LONG DISTANCE CORP. PHONETIME, INC. (PTI) ONE CALL COMMUNICATIONS, INC. GE CAPITAL COMMUNICATIONS SERVICES CORP. 9/ ONCOR COMMUNICATIONS, INC. 9/ THE FURST GROUP, INC. 9/ AMERICAN NETWORK EXCHANGE, INC. TELESPHERE NETWORK, INC. 14/ (NATIONAL TELEPHONE SERVICES, INC.)	215	197					
OTHERS 15/	359	275	218	180	171	146	
	2,582	2,359	1,823	1,352	992	639	414
TOTAL LONG DISTANCE CARRIERS	52,182	51,184	47,467	44,763	44,286	42,810	39,755
TOLL SERVICE REVENUES:							
BELL OPERATING COMPANIES OTHER LOCAL TELEPHONE COMPANIES 15/	10,578	10,549	10,668	10,268	9,599	9,026	9,037
	4,112	4,291	4,445	3,468	3,274	3,159	3,364
TOTAL LOCAL EXCHANGE COMPANIES	14,690	14,840	15,113	13,736	12,873	12,185	12,401
TOTAL REVENUES OF LONG DISTANCE SERVICE PROVIDERS	66,872	66,024	62,580	58,510	57,159	54,995	52,156

Notes for Table 3.1 - Total Toll Service Revenues

- 1/ AT&T acquired Alascom August 7, 1995. Each filed separate revenues for 1994 and 1995. In 1996, AT&T and Alascom began filing as a consolidated entity.
- 2/ MCI Telecommunications and Telecom*USA merged in 1989. With the 1996 filing, MCI revised its 1995 revenues. MCI previously reported total operating revenues by SIC code. In its 1995 Annual Report to shareholders, MCI separated its core telecommunications services business from its business ventures and developing markets businesses. Its revenues for 1995 and 1996 now reflect core business information only.
- 3/ In July 1986, GTE Sprint and US Telecom merged into US Sprint. The information shown for GTE Sprint and US Telecom for 1986 is for January 1 - June 30. The information shown for US Sprint for 1986 is for July 1 - December 31. Effective February 26, 1992, the company's name became Sprint Communications Company.
- 4/ LDDS Communications Inc. (which changed its name to WorldCom, Inc. in May 1995) and Advanced Telecommunications Corp. merged in 1992. In 1993, LDDS merged with Metromedia Communications Corp. and Comsystems Network Services. For 1993, only the revenues that were received after the merger are included in LDDS's revenues. Those revenues up to the merger are listed individually for 1993. LDDS and Witel merged January 5, 1995. WorldCom acquired MFS Intelenet on December 31, 1996.
- 5/ Metromedia Communications Corp. and ITT Communications Corp. merged during 1988. Information for 1989 was reported separately.
- 6/ Frontier Corporation, the parent company of Frontier Communications International, Inc., acquired ALC Communications, the parent company of AllNet, on August 16, 1995. On May 18, 1995, Frontier Corporation acquired WCT Communications, the parent company of West Coast Telecommunications, which is now known as Frontier Communications of the West, Inc. In addition, on March 17, 1995, Frontier Corporation acquired American Sharecom, which is now known as Frontier Communications of the North Central Region.
- 7/ Allnet and Lexitel merged at the end of 1985.
- 8/ Name changed to RCI Long Distance Inc. in 1994.
- 9/ Company indicated it is strictly a reseller.
- 10/ Excludes \$261 million from marketing services in 1996 and \$143 million in 1995.
- 11/ Name changed from U.S. Long Distance, Inc. in September 1997.
- 12/ Data from the Annual Report to the Colorado Public Utilities Commission for the year ended 1996 for telecommunications carriers regulated pursuant to §40-15-301 C.R.S.
- 13/ Does not include \$10 million from non-communications operations in 1993, \$11 million in 1994, \$9 million in 1995, and \$13 million in 1996.
- 14/ Telesphere Network, Inc. and National Telephone Services, Inc. merged during 1989. In 1991 Telesphere Network, Inc. went into bankruptcy.
- 15/ Estimated by FCC staff.

TABLE 3.2 - REVENUES: MARKET SHARE

BASED ON OPERATING REVENUES OF LONG DISTANCE CARRIERS ONLY								
YEAR	AT&T	MCI	SPRINT	WORLDCOM	ALL OTHER LONG DISTANCE CARRIERS			HERFINDAHL-HIRSCHMAN INDEX (HHI) *
1984	90.1 %	4.5 %	2.7 %		2.6 %			8,155
1985	86.3	5.5	2.6		5.6			7,479
1986	81.9	7.6	4.3		6.3			6,783
1987	78.6	8.8	5.8		6.8			6,298
1988	74.6	10.3	7.2		8.0			5,720
1989	67.5	12.1	8.4	0.2 %	11.8			4,778
1990	65.0	14.2	9.7	0.3	10.8			4,527
1991	63.2	15.2	9.9	0.5	11.3			4,321
1992	60.8	16.7	9.7	1.4	11.5			4,074
1993	58.1	17.8	10.0	1.9	12.3			3,795
1994	55.2	17.4	10.1	3.3	14.0			3,466
1995	51.8	19.7	9.8	4.9	13.8			3,197
1996	47.9	20.0	9.7	5.5	17.0			2,823
BASED ON TOTAL OPERATING REVENUES OF LONG DISTANCE CARRIERS AND TOTAL TOLL REVENUES FOR LOCAL EXCHANGE CARRIERS								
YEAR	AT&T	MCI	SPRINT	WORLDCOM	ALL OTHER LONG DISTANCE CARRIERS	BELL OPERATING COMPANIES	OTHER LOCAL TELEPHONE COMPANIES	HERFINDAHL-HIRSCHMAN INDEX (HHI) *
1984	68.3 %	3.4 %	2.1 %		2.0 %	17.7 %	6.6 %	4,734
1985	67.1	4.3	2.0		4.4	16.5	5.8	4,571
1986	63.5	5.9	3.3		4.9	16.7	5.7	4,129
1987	60.2	6.7	4.4		5.2	17.5	5.9	3,742
1988	56.6	7.8	5.4		6.1	17.0	7.1	3,344
1989	52.3	9.3	6.5	0.2 %	9.1	16.0	6.5	2,920
1990	50.7	11.1	7.5	0.2	8.4	15.8	6.2	2,801
1991	50.2	12.1	7.8	0.4	9.0	14.7	5.9	2,768
1992	49.3	13.5	7.9	1.1	9.3	13.5	5.4	2,715
1993	47.5	14.5	8.2	1.5	10.1	13.1	5.2	2,568
1994	46.0	14.5	8.4	2.8	11.7	11.8	4.8	2,440
1995	44.9	17.1	8.5	4.3	12.0	9.6	3.7	2,390
1996	42.1	17.6	8.5	4.8	15.0	8.5	3.5	2,197

* FCC estimate.

TABLE 3.3 - THE TOLL MARKET
(DOLLAR AMOUNTS SHOWN IN MILLIONS)

	REVENUES			TOTAL TOLL REVENUES	AS PERCENTAGE OF TOTAL TOLL REVENUES		
	INTRASTATE	DOMESTIC INTERSTATE	INTERNATIONAL		INTRASTATE	DOMESTIC INTERSTATE	INTERNATIONAL
1984	\$20,872	\$26,490	\$3,794	\$51,156	40.8 %	51.8 %	7.4 %
1985	22,310	28,387	4,119	54,815	40.7	51.8	7.5
1986	23,734	29,123	4,611	57,468	41.3	50.7	8.0
1987	25,339	27,844	5,336	58,519	43.3	47.6	9.1
1988	26,542	29,724	6,334	62,600	42.4	47.5	10.1
1989	28,060	30,585	7,379	66,024	42.5	46.3	11.2
1990	27,652	30,676	8,464	66,792	41.4	45.9	12.7
1991	27,149	31,331	10,078	68,558	39.6	45.7	14.7
1992	27,066	33,719	11,199	71,983	37.6	46.8	15.6
1993	28,158	34,661	12,470	75,290	37.4	46.0	16.6
1994	28,496	38,262	13,968	80,726	35.3	47.4	17.3
1995	29,147	39,903	16,425	85,475	34.1	46.7	19.2
1996	31,995	42,771	18,515	93,281	34.3	45.9	19.8

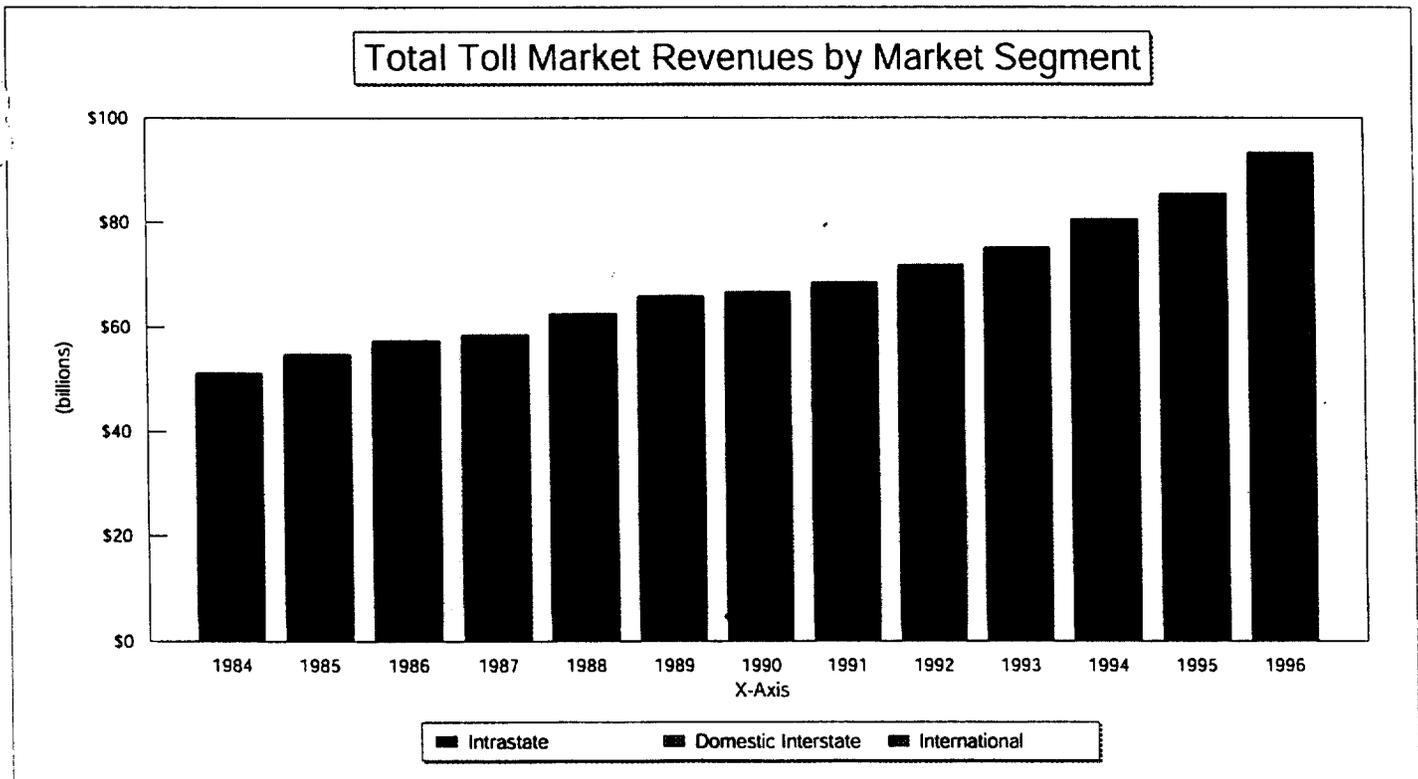


TABLE 3.4 - QUARTERLY TOLL REVENUES REPORTED TO SHAREHOLDERS
(DOLLAR AMOUNTS SHOWN IN MILLIONS)

	AT&T	MCI	SPRINT	WORLDCOM	Others	Total	MARKET SHARE				
							AT&T	MCI	SPRINT	WORLDCOM	Others
1Q84	\$8,684	\$475	\$302		\$404	\$9,865	88.0 %	4.8 %	3.1 %		4.1 %
2Q84	9,169	485	317		423	10,394	88.2	4.7	3.0		4.1
3Q84	9,097	478	307		441	10,323	88.1	4.6	3.0		4.3
4Q84	9,272	521	320		461	10,574	87.7	4.9	3.0		4.4
1Q85	9,369	571	320		482	10,742	87.2	5.3	3.0		4.5
2Q85	9,840	601	322		503	11,266	87.3	5.3	2.9		4.5
3Q85	9,742	649	335		526	11,252	86.6	5.8	3.0		4.7
4Q85	9,838	721	368		549	11,477	85.7	6.3	3.2		4.8
1Q86	9,865	819	395		574	11,652	84.7	7.0	3.4		4.9
2Q86	9,705	943	432		599	11,679	83.1	8.1	3.7		5.1
3Q86	9,642	910	552		626	11,730	82.2	7.8	4.7		5.3
4Q86	9,502	920	589		654	11,665	81.5	7.9	5.1		5.6
1Q87	9,085	1,005	615		683	11,388	79.8	8.8	5.4		6.0
2Q87	9,298	1,002	546		713	11,558	80.4	8.7	4.7		6.2
3Q87	9,474	1,044	685		745	11,948	79.3	8.7	5.7		6.2
4Q87	9,413	1,088	746		779	12,025	78.3	9.0	6.2		6.5
1Q88	9,229	1,212	760	\$9	813	12,023	76.8	10.1	6.3	0.1 %	6.8
2Q88	9,272	1,300	799	11	850	12,232	75.8	10.6	6.5	0.1	6.9
3Q88	9,378	1,437	916	14	887	12,633	74.2	11.4	7.3	0.1	7.0
4Q88	9,578	1,512	930	18	927	12,965	73.9	11.7	7.2	0.1	7.1
1Q89	9,326	1,625	984	21	968	12,923	72.2	12.6	7.6	0.2	7.5
2Q89	9,251	1,719	1,038	26	1,012	13,046	70.9	13.2	8.0	0.2	7.8
3Q89	9,175	1,792	1,111	31	1,057	13,165	69.7	13.6	8.4	0.2	8.0
4Q89	9,239	1,835	1,191	32	1,104	13,400	68.9	13.7	8.9	0.2	8.2
1Q90	9,511	2,001	1,215	34	1,153	13,914	68.4	14.4	8.7	0.2	8.3
2Q90	9,553	2,061	1,239	37	1,205	14,095	67.8	14.6	8.8	0.3	8.5
3Q90	9,626	2,197	1,279	43	1,258	14,402	66.8	15.3	8.9	0.3	8.7
4Q90	9,693	2,197	1,331	41	1,315	14,577	66.5	15.1	9.1	0.3	9.0
1Q91	9,594	2,283	1,339	134	1,373	14,723	65.2	15.5	9.1	0.9	9.3
2Q91	9,637	2,354	1,358	142	1,434	14,925	64.6	15.8	9.1	1.0	9.6
3Q91	9,820	2,412	1,348	164	1,498	15,242	64.4	15.8	8.8	1.1	9.8
4Q91	9,792	2,442	1,343	177	1,565	15,319	63.9	15.9	8.8	1.2	10.2
1Q92	9,873	2,513	1,357	184	1,635	15,562	63.4	16.1	8.7	1.2	10.5
2Q92	9,851	2,606	1,378	198	1,708	15,741	62.6	16.6	8.8	1.3	10.9
3Q92	10,132	2,682	1,432	206	1,784	16,236	62.4	16.5	8.8	1.3	11.0
4Q92	9,724	2,761	1,490	213	1,864	16,052	60.6	17.2	9.3	1.3	11.6
1Q93	9,967	2,810	1,491	219	1,947	16,434	60.6	17.1	9.1	1.3	11.8
2Q93	9,833	2,929	1,510	252	2,034	16,558	59.4	17.7	9.1	1.5	12.3
3Q93	10,142	3,054	1,541	282	2,125	17,144	59.2	17.8	9.0	1.6	12.4
4Q93	9,921	3,128	1,598	392	2,220	17,259	57.5	18.1	9.3	2.3	12.9
1Q94	10,224	3,221	1,660	524	2,319	17,948	57.0	17.9	9.2	2.9	12.9
2Q94	10,335	3,309	1,696	555	2,422	18,317	56.4	18.1	9.3	3.0	13.2
3Q94	10,378	3,407	1,740	569	2,530	18,624	55.7	18.3	9.3	3.1	13.6
4Q94	10,331	3,400	1,709	573	2,643	18,656	55.4	18.2	9.2	3.1	14.2
1Q95	10,736	3,561	1,753	839	2,761	19,650	54.6	18.1	8.9	4.3	14.1
2Q95	11,035	3,706	1,772	869	2,884	20,266	54.5	18.3	8.7	4.3	14.2
3Q95	11,330	3,862	1,827	908	3,013	20,940	54.1	18.4	8.7	4.3	14.4
4Q95	11,250	3,912	1,926	924	3,147	21,159	53.2	18.5	9.1	4.4	14.9
1Q96	11,313	4,050	2,002	1,006	3,288	21,659	52.2	18.7	9.2	4.6	15.2
2Q96	11,223	4,158	2,053	1,038	3,434	21,906	51.2	19.0	9.4	4.7	15.7
3Q96	11,552	4,274	2,084	1,111	3,588	22,609	51.1	18.9	9.2	4.9	15.9
4Q96	11,541	4,302	2,164	1,215	3,748	22,970	50.2	18.7	9.4	5.3	16.3
1Q97	11,509	4,384	2,172	1,305	3,915	23,285	49.4	18.8	9.3	5.6	16.8
2Q97	11,582	4,353	2,219	1,339	4,089	23,582	49.1	18.5	9.4	5.7	17.3
3Q97	11,695	4,343	2,252	1,416	4,272	23,978	48.8	18.1	9.4	5.9	17.8
4Q97	11,388	4,539	2,312	1,508	4,463	24,210	47.0	18.7	9.5	6.2	18.4

4. RESIDENTIAL LONG DISTANCE MARKET SHARES

Bill Harvesting data collected by PNR and Associates (PNR) provides information on market shares in the long distance residential market, as opposed to the overall market for toll service. The Bill Harvesting data also provide information on the market shares of long distance carriers by state.

PNR is an economic research and consulting firm located in Jenkinstown, Pennsylvania. PNR conducts nationwide surveys of residential telephone usage and household expenditures on telephone service. These surveys, in which households are asked to mail copies of their phone bills for one month to PNR, are called Bill Harvesting studies.¹

PNR has donated databases containing information from their 1995 and 1996 Bill Harvesting studies to the Commission.² PNR has granted the Commission permission to use these databases for research purposes and to publish the results. Tables 4.1, 4.2, and 4.3, which are based on this information, present market shares for the residential long distance market based on lines, revenues and direct dial minutes. These tables include long distance market shares for AT&T, MCI, Sprint and other long distance carriers.³

Results of the Bill Harvesting surveys are interesting in several respects. For instance, AT&T's share of the residential long distance market is larger than its share of the total toll market. This result is consistent regardless of whether market shares are measured in lines, revenues or minutes. AT&T's share of the residential long distance market, by all three measures, dropped sharply from 1995 to 1996. As was the case in the overall toll market for long distance services, most of the growth occurred among smaller competitors. The Bill Harvesting data suggest that AT&T had 70% of presubscribed residential lines in 1996. We can estimate that AT&T's share of business access lines was about 51% by combining Bill Harvesting residential access line data with total access line data for June 1996.

The Bill Harvesting data also indicate that competition is present in all parts of the country. Indeed, smaller competitors appear to be as successful in rural states as in more urban states. Although the Bill Harvesting surveys include several thousand households, sample sizes for individual states can be quite small and therefore subject to large margins of error. Thus, these small sample sizes may limit the usefulness of these data in analyzing differences among states and differences over time.

¹ PNR and Associates can be contacted by phone at (215)886-9200, and by e-mail at info@pnr.com. Their address is 101 Greenwood Avenue, Suite 502, Jenkinstown, PA 19046.

² PNR first conducted a Bill Harvesting study in 1994 but the 1994 survey apparently is not fully comparable with later surveys. The 1995 survey is known as "Bill Harvesting II" and the 1996 survey, "Bill Harvesting III."

³ Market share for WorldCom is not separated from other long distance carriers in the residential market share data since the 1995 Bill Harvesting study included WorldCom in the category of other long distance carriers.

TABLE 4.1 - MARKET SHARE OF RESIDENTIAL ACCESS LINES BY STATE

	1996					1995				
	AT&T	MCI	SPRINT	OTHERS	SAMPLE SIZE	AT&T	MCI	SPRINT	OTHERS	SAMPLE SIZE
Alabama	69.5 %	14.7 %	2.1 %	13.7 %	95	73.6 %	12.0 %	3.2 %	11.2 %	125
Arizona	73.2	8.7	11.6	6.5	138	78.2	12.1	5.8	3.9	206
Arkansas	72.5	13.0	1.4	13.0	69	75.3	12.3	4.9	7.4	81
California	75.6	12.8	6.3	5.3	742	75.9	15.3	4.8	4.0	793
Colorado	72.6	11.9	9.6	5.9	135	62.3	19.4	6.9	11.4	175
Connecticut	44.6	9.2	6.2	40.0	65	83.1	8.4	2.4	6.0	83
Delaware	64.7	23.5	11.8	0.0	17	87.5	8.3	0.0	4.2	24
Dist. of Columbia	69.2	15.4	0.0	15.4	13	90.9	9.1	0.0	0.0	11
Florida	71.4	10.2	6.4	12.0	451	75.6	12.5	4.3	7.6	536
Georgia	79.5	8.9	4.1	7.5	146	73.3	16.8	3.8	6.1	131
Idaho	72.5	10.0	7.5	10.0	40	78.7	14.8	3.3	3.3	61
Illinois	73.8	15.2	3.8	7.2	290	77.4	13.1	3.3	6.1	359
Indiana	77.0	12.1	3.0	7.9	165	75.3	10.5	4.7	9.5	190
Iowa	72.8	13.2	1.8	12.3	114	78.7	11.6	4.9	4.9	164
Kansas	60.7	14.8	8.2	16.4	61	72.1	13.5	3.6	10.8	111
Kentucky	71.6	14.7	2.0	11.8	102	74.7	11.6	2.1	11.6	146
Louisiana	70.5	12.5	4.5	12.5	88	70.0	18.5	4.6	6.9	130
Maine	81.5	18.5	0.0	0.0	27	74.6	14.3	1.6	9.5	63
Maryland	59.8	23.6	3.9	12.6	127	71.2	17.8	3.1	8.0	163
Massachusetts	74.6	9.8	4.1	11.5	122	82.8	8.9	2.2	6.1	180
Michigan	59.7	18.1	5.0	17.2	221	73.0	12.8	2.8	11.4	359
Minnesota	64.7	17.3	4.0	13.9	173	70.4	15.6	3.2	10.8	250
Mississippi	76.6	4.3	8.5	10.6	47	80.3	13.1	3.3	3.3	61
Missouri	59.1	17.4	3.8	19.7	132	73.8	11.6	6.7	7.9	164
Montana	67.7	16.1	0.0	16.1	31	80.8	11.5	1.9	5.8	52
Nebraska	71.2	17.3	1.9	9.6	52	73.6	13.9	1.4	11.1	72
Nevada	66.0	16.0	16.0	2.0	50	67.5	15.0	10.0	7.5	40
New Hampshire	77.5	10.0	10.0	2.5	40	80.5	7.3	7.3	4.9	41
New Jersey	77.5	11.9	5.6	5.0	160	84.2	10.4	1.0	4.5	202
New Mexico	64.9	10.5	7.0	17.5	57	78.7	11.5	4.9	4.9	61
New York	69.4	15.4	3.7	11.5	461	78.3	11.9	4.1	5.7	663
North Carolina	63.6	14.9	6.7	14.9	195	78.3	11.1	4.4	6.2	226
North Dakota	50.0	18.8	6.3	25.0	16	69.2	7.7	5.1	17.9	39
Ohio	68.3	14.4	4.8	12.5	271	71.5	10.9	5.2	12.4	386
Oklahoma	64.1	12.5	4.7	18.8	64	75.8	12.5	3.3	8.3	120
Oregon	64.1	11.7	6.8	17.5	103	79.6	7.3	4.4	8.8	137
Pennsylvania	66.2	18.0	1.6	14.1	305	70.5	12.4	4.1	13.1	590
Rhode Island	74.1	11.1	3.7	11.1	27	95.7	4.3	0.0	0.0	23
South Carolina	70.4	7.0	5.6	16.9	71	76.9	8.3	2.8	12.0	108
South Dakota	73.9	13.0	0.0	13.0	23	61.7	25.5	2.1	10.6	47
Tennessee	71.5	9.3	4.0	15.2	151	77.0	9.1	3.9	10.0	230
Texas	71.4	14.3	4.0	10.2	420	66.2	15.6	5.4	12.8	461
Utah	59.6	14.0	14.0	12.3	57	68.2	10.6	10.6	10.6	85
Vermont	94.1	0.0	5.9	0.0	17	64.7	17.6	11.8	5.9	17
Virginia	66.9	18.9	4.0	10.3	175	76.5	12.4	5.3	5.8	226
Washington	67.3	10.1	6.9	15.7	159	65.9	15.3	7.6	11.2	170
West Virginia	74.4	18.6	0.0	7.0	43	69.6	17.7	1.3	11.4	79
Wisconsin	67.9	13.9	4.2	13.9	165	75.5	14.9	2.5	7.1	322
Wyoming	80.0	6.7	0.0	13.3	15	94.1	0.0	0.0	5.9	17
Total	69.9	13.7	5.0	11.4	6,708	74.6	13.0	4.2	8.3	8,980

Source: PNR and Associates, Bill Harvesting II and III,

TABLE 4.1 - MARKET SHARE OF RESIDENTIAL ACCESS LINES BY STATE

	1996					1995				
	AT&T	MCI	SPRINT	OTHERS	SAMPLE SIZE	AT&T	MCI	SPRINT	OTHERS	SAMPLE SIZE
Alabama	69.5 %	14.7 %	2.1 %	13.7 %	95	73.6 %	12.0 %	3.2 %	11.2 %	125
Arizona	73.2	8.7	11.6	6.5	138	78.2	12.1	5.8	3.9	206
Arkansas	72.5	13.0	1.4	13.0	69	75.3	12.3	4.9	7.4	81
California	75.6	12.8	6.3	5.3	742	75.9	15.3	4.8	4.0	793
Colorado	72.6	11.9	9.6	5.9	135	62.3	19.4	6.9	11.4	175
Connecticut	44.6	9.2	6.2	40.0	65	83.1	8.4	2.4	6.0	83
Delaware	64.7	23.5	11.8	0.0	17	87.5	8.3	0.0	4.2	24
Dist. of Columbia	69.2	15.4	0.0	15.4	13	90.9	9.1	0.0	0.0	11
Florida	71.4	10.2	6.4	12.0	451	75.6	12.5	4.3	7.6	536
Georgia	79.5	8.9	4.1	7.5	146	73.3	16.8	3.8	6.1	131
Idaho	72.5	10.0	7.5	10.0	40	78.7	14.8	3.3	3.3	61
Illinois	73.8	15.2	3.8	7.2	290	77.4	13.1	3.3	6.1	359
Indiana	77.0	12.1	3.0	7.9	165	75.3	10.5	4.7	9.5	190
Iowa	72.8	13.2	1.8	12.3	114	78.7	11.6	4.9	4.9	164
Kansas	60.7	14.8	8.2	16.4	61	72.1	13.5	3.6	10.8	111
Kentucky	71.6	14.7	2.0	11.8	102	74.7	11.6	2.1	11.6	146
Louisiana	70.5	12.5	4.5	12.5	88	70.0	18.5	4.6	6.9	130
Maine	81.5	18.5	0.0	0.0	27	74.6	14.3	1.6	9.5	63
Maryland	59.8	23.6	3.9	12.6	127	71.2	17.8	3.1	8.0	163
Massachusetts	74.6	9.8	4.1	11.5	122	82.8	8.9	2.2	6.1	180
Michigan	59.7	18.1	5.0	17.2	221	73.0	12.8	2.8	11.4	359
Minnesota	64.7	17.3	4.0	13.9	173	70.4	15.6	3.2	10.8	250
Mississippi	76.6	4.3	8.5	10.6	47	80.3	13.1	3.3	3.3	61
Missouri	59.1	17.4	3.8	19.7	132	73.8	11.6	6.7	7.9	164
Montana	67.7	16.1	0.0	16.1	31	80.8	11.5	1.9	5.8	52
Nebraska	71.2	17.3	1.9	9.6	52	73.6	13.9	1.4	11.1	72
Nevada	66.0	16.0	16.0	2.0	50	67.5	15.0	10.0	7.5	40
New Hampshire	77.5	10.0	10.0	2.5	40	80.5	7.3	7.3	4.9	41
New Jersey	77.5	11.9	5.6	5.0	160	84.2	10.4	1.0	4.5	202
New Mexico	64.9	10.5	7.0	17.5	57	78.7	11.5	4.9	4.9	61
New York	69.4	15.4	3.7	11.5	461	78.3	11.9	4.1	5.7	663
North Carolina	63.6	14.9	6.7	14.9	195	78.3	11.1	4.4	6.2	226
North Dakota	50.0	18.8	6.3	25.0	16	69.2	7.7	5.1	17.9	39
Ohio	68.3	14.4	4.8	12.5	271	71.5	10.9	5.2	12.4	386
Oklahoma	64.1	12.5	4.7	18.8	64	75.8	12.5	3.3	8.3	120
Oregon	64.1	11.7	6.8	17.5	103	79.6	7.3	4.4	8.8	137
Pennsylvania	66.2	18.0	1.6	14.1	305	70.5	12.4	4.1	13.1	590
Rhode Island	74.1	11.1	3.7	11.1	27	95.7	4.3	0.0	0.0	23
South Carolina	70.4	7.0	5.6	16.9	71	76.9	8.3	2.8	12.0	108
South Dakota	73.9	13.0	0.0	13.0	23	61.7	25.5	2.1	10.6	47
Tennessee	71.5	9.3	4.0	15.2	151	77.0	9.1	3.9	10.0	230
Texas	71.4	14.3	4.0	10.2	420	66.2	15.6	5.4	12.8	461
Utah	59.6	14.0	14.0	12.3	57	68.2	10.6	10.6	10.6	85
Vermont	94.1	0.0	5.9	0.0	17	64.7	17.6	11.8	5.9	17
Virginia	66.9	18.9	4.0	10.3	175	76.5	12.4	5.3	5.8	226
Washington	67.3	10.1	6.9	15.7	159	65.9	15.3	7.6	11.2	170
West Virginia	74.4	18.6	0.0	7.0	43	69.6	17.7	1.3	11.4	79
Wisconsin	67.9	13.9	4.2	13.9	165	75.5	14.9	2.5	7.1	322
Wyoming	80.0	6.7	0.0	13.3	15	94.1	0.0	0.0	5.9	17
Total	69.9	13.7	5.0	11.4	6,708	74.6	13.0	4.2	8.3	8,980

Source: PNR and Associates, Bill Harvesting II and III.

**TABLE 4.2 - MARKET SHARE OF TOTAL LONG DISTANCE CARRIER
RESIDENTIAL REVENUE BY STATE**

	1996					1995				
	AT&T	MCI	SPRINT	OTHERS	SAMPLE SIZE	AT&T	MCI	SPRINT	OTHERS	SAMPLE SIZE
Alabama	60.5 %	17.4 %	5.2 %	16.9 %	99	59.9 %	19.4 %	4.2 %	16.5 %	121
Arizona	56.9	10.4	19.6	13.2	107	74.8	14.1	3.9	7.1	192
Arkansas	70.5	12.3	2.6	14.6	76	65.9	11.5	4.7	17.9	73
California	68.4	15.3	7.1	9.2	752	70.4	16.2	6.9	6.5	741
Colorado	65.5	13.2	5.9	15.5	115	61.5	17.5	6.5	14.4	154
Connecticut	39.0	28.7	6.0	26.3	63	71.2	18.6	1.3	9.0	87
Delaware	55.9	19.5	10.7	13.9	18	79.4	10.9	0.0	9.7	23
Dist. of Columbia	74.6	20.5	1.8	3.1	15	83.6	9.0	0.0	7.4	11
Florida	65.0	12.7	9.2	13.0	438	67.6	12.7	8.8	10.9	503
Georgia	75.7	9.7	3.2	11.4	169	73.6	11.7	6.5	8.2	127
Idaho	75.3	8.3	5.5	11.0	31	71.2	16.5	4.1	8.2	60
Illinois	63.5	14.4	11.5	10.6	289	69.0	19.7	2.6	8.7	342
Indiana	64.0	15.4	4.9	15.7	161	73.0	11.2	4.3	11.5	183
Iowa	65.1	11.7	2.5	20.8	104	70.6	12.6	10.0	6.7	146
Kansas	48.1	17.2	11.4	23.4	73	73.4	11.6	4.2	10.9	108
Kentucky	66.9	18.6	1.6	12.9	109	68.6	16.4	1.1	14.0	143
Louisiana	72.4	8.3	2.9	16.4	106	62.5	12.6	5.4	19.5	128
Maine	55.6	18.5	0.0	25.9	25	63.1	17.3	0.3	19.4	58
Maryland	52.0	26.6	8.0	13.3	135	73.8	13.2	5.5	7.5	154
Massachusetts	75.4	10.6	1.6	12.4	117	75.6	10.6	5.4	8.4	169
Michigan	57.0	20.7	3.5	18.9	217	63.3	16.2	5.0	15.5	341
Minnesota	51.9	27.6	6.7	13.9	138	60.2	22.5	4.0	13.3	230
Mississippi	62.4	8.9	2.9	25.9	49	89.7	6.0	0.9	3.3	60
Missouri	55.3	19.9	4.0	20.8	135	68.0	14.2	3.3	14.6	151
Montana	62.4	16.1	0.0	21.5	25	78.0	18.7	1.7	1.6	50
Nebraska	63.5	20.2	1.6	14.7	46	60.4	17.5	4.3	17.8	69
Nevada	57.8	17.4	18.6	6.2	47	67.9	11.7	6.4	14.0	33
New Hampshire	67.5	10.0	15.5	7.0	39	68.1	16.3	5.4	10.2	40
New Jersey	71.7	14.2	5.1	9.0	166	77.6	15.1	1.4	5.9	195
New Mexico	61.2	8.9	7.8	22.1	48	71.4	7.3	9.0	12.3	56
New York	63.8	18.8	7.4	10.0	449	71.1	15.0	5.6	8.2	603
North Carolina	60.6	16.2	7.2	16.1	189	78.4	9.4	6.0	6.1	216
North Dakota	36.7	24.4	7.5	31.4	13	68.7	5.0	5.5	20.8	34
Ohio	66.1	15.5	4.3	14.1	275	69.1	10.8	5.3	14.8	358
Oklahoma	58.4	16.6	8.2	16.8	77	65.6	23.5	3.5	7.4	109
Oregon	66.0	15.4	3.2	15.5	105	69.8	7.8	6.0	16.4	132
Pennsylvania	62.0	19.1	2.3	16.6	322	62.4	14.8	4.2	18.5	574
Rhode Island	68.6	21.0	2.9	7.5	26	89.6	8.1	0.0	2.2	23
South Carolina	52.9	22.3	9.7	15.1	76	72.2	7.7	10.3	9.8	108
South Dakota	70.2	19.2	0.0	10.6	22	56.8	25.1	3.5	14.5	45
Tennessee	67.3	16.4	4.3	12.0	171	71.1	12.0	6.4	10.5	219
Texas	58.2	17.5	8.8	15.5	471	58.2	20.6	6.7	14.4	418
Utah	65.7	9.3	12.6	12.4	39	76.9	10.2	10.5	2.3	73
Vermont	89.6	0.0	10.4	0.0	14	58.1	13.1	0.5	28.3	15
Virginia	65.5	18.5	3.7	12.3	177	69.4	13.2	9.1	8.3	211
Washington	57.4	8.5	11.1	23.0	156	59.7	13.2	11.8	15.2	153
West Virginia	74.4	7.3	0.8	17.5	40	67.4	15.1	0.5	17.1	74
Wisconsin	64.3	17.1	3.4	15.2	157	68.3	15.4	4.0	12.3	321
Wyoming	88.8	4.3	0.0	6.8	10	78.2	2.8	17.1	1.9	16
Total	63.3	16.0	6.6	14.1	6,701	68.5	14.6	5.6	11.3	8,450

Source: PNR and Associates, Bill Harvesting II and III.
Taxes are not included in total revenue.