

WorldCom

Building Inside Wiring & TDM In Local Loop Transport

Bottlenecks or Opportunities?



"The future belongs to those who
see possibilities before they
become obvious."

Theodore Levitt, *The Marketing Imagination*

Presented by:
F. Scott Yeager
V. P Business Development
National Accounts/WorldCom

InterOffice Memo

To: WorldCom
From: F. Scott Yeager
Date: March 2, 1997
Subject: Riser Distribution Strategy for MFS/WorldCom Buildings

MFS/WorldCom is presently spending a great deal of money on an incremental basis to install the inside wiring in a building to deliver the existing services for the Telecom, Data and Switched Voice services. This cost is presently hidden in the budgets of the individual cities and operating companies and is built into the business plan on an incremental basis so it does not show up on any one budget as a real line item. These costs have therefore never been looked at as a significant number by any one group within MFS/WorldCom.

I have been attempting to work with GNS in the past to jointly develop a strategy that accomplishes cost reduction and sets the stage for increased revenues. The initial focus was to reduce the total installed cable cost that will be incurred over the next 5 to 10 years. This is also significant because without a complete rethinking of the inside wiring issue MFS/WorldCom is already running into a bottleneck in the riser that will severely impede our ability to install the revenues expected in the strategic plan. We presently have significant revenues in jeopardy because of congestion in our existing buildings.

This approach also looked at developing additional incremental revenues for new services inside of the buildings over the new infrastructure that should be installed to reduce this tremendous hidden cost for inside cabling and found that this would not only increase the total revenues from a building it would increase the probability of achieving our revenue numbers for the existing targeted services in the buildings.

The study we have conducted indicates very significant numbers in cost for the cabling ranging from \$800 million to well over \$1.1 billion in cost for cabling all the buildings we will deliver services in over the next 10 years. The riser infrastructure we could install if designed properly would be decreased by \$200 million to over the same time period.

I also created a business model that shows these new service offerings could generate \$3.5 to \$6 billion in net new revenues per year over this same infrastructure. This revenue would generate \$1 billion per year in net new EBIT in just 5 years. All numbers include on net and off net buildings and use the strategic plan numbers as the basis for these projections. The incremental costs per connection and the headcount and other costs of delivering these services is considered and recovered in this plan.

This same infrastructure allows MF/WorldCom to deliver highspeed Internet and Content related services economically in a building at prices that are reduced from today's prices but do not reduce margins for the company. Those revenues are only conservatively estimated in this plan since the reduced market price would explode the demand for the services through price elasticity.

This warrants immediate attention by the company as a major part of the strategic plan for both increasing the likelihood of making our EBITDA numbers and from the perspective of dominating our market in MFS/WorldCom cities and our buildings. The implications of this issue do not include any international numbers in costs or revenues.

Please review the attached spread sheets and documents and feel free to comment on this information. They show the details behind these numbers and allow you to look at the sensitivities. This is a different approach than the Spectrum Infrastructure Study and set the stage for that report.

Strategic vs Adjusted Cost

	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004
BLDG OFF-NET										
Strategic Plan	2397	3918	9220	13950	17827	20421	22984	24440	26858	28555
Adjusted Plan	1658	3157	6569	11585	15888	19124	21702	23712	25649	27560
BLDG ON-NET										
Strategic Plan	2660	4441	4661	5239	5533	6233	7054	8061	9318	10420
Adjusted Plan	1931	3550	4551	4950	5386	5883	6643	7557	8689	9765
COST OFF-NET										
Strategic Plan	11,985,000	19,590,000	92,200,000	139,500,000	267,405,000	306,315,000	459,680,000	488,800,000	537,160,000	571,100,000
Adjusted Plan	8,290,000	15,785,000	65,690,000	115,850,000	238,320,000	286,860,000	434,040,000	474,240,000	512,980,000	551,200,000
COST ON-NET										
Strategic Plan	79,800,000	177,640,000	233,050,000	314,340,000	331,980,000	373,980,000	423,240,000	483,660,000	559,080,000	625,200,000
Adjusted Plan	57,930,000	142,000,000	227,550,000	297,000,000	323,160,000	352,980,000	398,580,000	453,420,000	521,340,000	585,900,000
Strat Total ON&OFF	91,785,000	197,230,000	325,250,000	453,840,000	599,385,000	680,295,000	882,920,000	972,460,000	1,096,240,000	1,196,300,000
Actual Total ON&OFF	66,220,000	157,785,000	293,240,000	412,850,000	561,480,000	639,840,000	832,620,000	927,660,000	1,034,320,000	1,137,100,000
EST. COST @										
10% REVENUE	52,035,700	82,906,700	126,469,500	187,224,900	256,748,300	344,134,200	448,334,700	561,866,200	681,881,100	807,175,100
ASSUMPTIONS										
OFF-NET per Bldg										
cabling cost per year	\$ 5,000.00	\$ 5,000.00	\$ 10,000.00	\$ 10,000.00	\$ 15,000.00	\$ 15,000.00	\$ 20,000.00	\$ 20,000.00	\$ 20,000.00	\$ 20,000.00
ON-NET per Bldg										
cabling cost per year	\$ 30,000.00	\$ 40,000.00	\$ 50,000.00	\$ 60,000.00	\$ 60,000.00	\$ 60,000.00	\$ 60,000.00	\$ 60,000.00	\$ 60,000.00	\$ 60,000.00
Actual cabling cost per building per year based on "sample study" is \$60,000.00										

Income Statement

Ramp UP 1Bld

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	Year 1 Total	Year 2 Total	Year 3 Total	Year 4 Total	Year 5 Total
<u>Account Description</u>					
(1) Headcount	10	10	10	10	10
<u>Incremental Revenue</u>					
(2) Recurring Revenue	136,919	810,509	1,520,805	2,302,164	3,151,349
(3) Installation and Other Revenue	48,000	119,340	87,394	152,814	142,881
Total Revenue	184,919	929,849	1,608,199	2,454,978	3,294,230
<u>Network Expenses:</u>					
(4) Installation Costs-External Sites	31,550	82,824	62,424	111,745	109,109
(5) Service Costs-External Sites	74,832	259,028	312,439	499,783	725,597
(6) Backbone Facilities Leased	6,000	6,000	6,000	6,000	6,000
(7) C.O. Collocation Charges	14,400	14,400	14,400	14,400	14,400
(8) Telco Circuit Charges	0	0	0	0	0
Total Network Expenses	126,782	362,252	395,263	631,928	855,106
(9) Payroll & Benefits	748,833	783,211	818,995	897,506	939,953
(10) Overtime	0	0	0	0	0
(11) Commissions	15,350	34,100	22,800	36,900	30,000
(12) Rent	0	0	0	0	0
(13) Utilities	0	0	0	0	0
(14) Legal/Regulatory	0	0	0	0	0
(15) Consultants	0	0	0	0	0
(16) Professional Services	0	0	0	0	0
(17) Temporary Staff	0	0	0	0	0
(18) Data Processing	95,000	0	0	0	0
(19) Recruiting	0	0	0	0	0
(20) Training	15,000	0	0	0	0
(21) Dues & Subscriptions	0	0	0	0	0
(22) Equipment Rental	0	0	0	0	0
(23) Repairs & Maintenance	21,350	21,350	21,350	21,350	21,350
(24) Tools & Small Parts	15,000	0	0	0	0
(25) Telephone	7,200	7,200	7,200	7,200	7,200
(26) Travel & Entertainment	0	0	0	0	0
(27) Office Supplies	0	0	0	0	0
(28) Business Insurance	0	0	0	0	0
(29) Public Relations	0	0	0	0	0
(30) Marketing	6,000	0	0	0	0
(31) Franchise Fees and Memberships	0	0	0	0	0
(32) Bad Debts	925	4,649	8,041	12,275	16,471
(33) Property Taxes	503	1,164	447	1,587	1,500
(34) Misc (Taxes - Use & Inv Cap Tax, Lic.)	0	0	0	0	0
Total Other Expenses	925,161	851,674	878,833	976,818	1,016,474
Total Operating Expenses	1,051,942	1,213,926	1,274,097	1,608,747	1,871,580
(35) Interest Expense	0	0	0	0	0
EBITDA	(867,023)	(284,077)	334,102	846,231	1,422,650
(36) Depreciation & Amortization	41,852	98,968	161,989	239,037	330,572
EBIT	(908,876)	(383,045)	172,113	607,194	1,092,078
Income Taxes (@ 40%)	0	38	69,142	242,878	436,831

Ramp up to 1100 Bldgs in 5 Yrs

Yr. 1 Yr. 2 Yr. 3 Yr. 4 Yr. 5

In

Bldgs

367 549 732 915 1,098

<u>Account Description</u>					
(1) Headcount	3,670	5,490	7,320	9,150	10,980
<u>Incremental Revenue</u>					
(2) Recurring Revenue	50,249,310	444,969,414	1,113,229,260	2,106,479,786	3,460,181,641
(3) Installation and Other Revenue	17,616,000	65,517,660	63,972,115	139,824,766	156,883,388
Total Revenue	67,865,310	510,487,074	1,177,201,375	2,246,304,552	3,617,065,029
<u>Network Expenses:</u>					
(4) Installation Costs-External Sites	11,578,850	45,470,376	45,694,368	102,246,860	119,801,860
(5) Service Costs-External Sites	27,463,252	142,206,235	228,705,617	457,301,416	796,705,450
(6) Backbone Facilities Leased	2,202,000	3,294,000	4,392,000	5,490,000	6,588,000
(7) C.O. Collocation Charges	5,284,800	7,905,600	10,540,800	13,176,000	15,811,200
(8) Telco Circuit Charges	0	0	0	0	0
Total Network Expenses	46,528,902	198,876,211	289,332,785	578,214,276	938,906,510
(9) Payroll & Benefits	274,821,858	429,982,812	599,504,265	821,218,018	1,032,068,758
(10) Overtime	0	0	0	0	0
(11) Commissions	5,633,450	18,720,900	16,689,600	33,763,500	32,940,000
(12) Rent	0	0	0	0	0
(13) Utilities	0	0	0	0	0
(14) Legal/Regulatory	0	0	0	0	0
(15) Consultants	0	0	0	0	0
(16) Professional Services	0	0	0	0	0
(17) Temporary Staff	0	0	0	0	0
(18) Data Processing	34,865,000	0	0	0	0
(19) Recruiting	0	0	0	0	0
(20) Training	5,505,000	0	0	0	0
(21) Dues & Subscriptions	0	0	0	0	0
(22) Equipment Rental	0	0	0	0	0
(23) Repairs & Maintenance	7,835,450	11,721,150	15,628,200	19,535,250	23,442,300
(24) Tools & Small Parts	5,505,000	0	0	0	0
(25) Telephone	2,642,400	3,952,800	5,270,400	6,588,000	7,905,600
(26) Travel & Entertainment	0	0	0	0	0
(27) Office Supplies	0	0	0	0	0
(28) Business Insurance	0	0	0	0	0
(29) Public Relations	0	0	0	0	0
(30) Marketing	2,202,000	0	0	0	0
(31) Franchise Fees and Memberships	0	0	0	0	0
(32) Bad Debts	339,327	2,552,435	5,886,007	11,231,523	18,085,325
(33) Property Taxes	184,448	639,203	327,441	1,452,499	1,646,479
(34) Misc (Taxes - Use & Inv Cap Tax, Lic.)	0	0	0	0	0
Total Other Expenses	339,533,932	467,569,300	643,305,912	893,788,789	1,116,088,463
Total Operating Expenses	386,062,834	666,445,511	932,638,698	1,472,003,065	2,054,994,972
(35) Interest Expense	0	0	0	0	0
EBITDA	(318,197,525)	(155,958,438)	244,562,677	774,301,486	1,562,070,056
(36) Depreciation & Amortization	15,359,807	54,333,471	118,576,137	218,718,788	362,968,555
EBIT	(333,557,332)	(210,291,908)	125,986,540	555,582,698	1,199,101,502
Income Taxes (@ 40%)	0	20,946	50,612,230	222,233,079	479,640,601

Income Statement

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(1) Headcount	10	10	10	10	10
Incremental Revenue					
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(3) Installation and Other Revenue	48,090	119,340	87,394	152,814	142,881
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(22) Equipment Rental	0	0	0	0	0
(23) Repairs & Maintenance	21,350	21,350	21,350	21,350	21,350
(24) Tools & Small Parts	15,000	0	0	0	0
(25) Telephone	7,200	7,200	7,200	7,200	7,200
(26) Travel & Entertainment	0	0	0	0	0
(27) Office Supplies	0	0	0	0	0
(28) Business Insurance	0	0	0	0	0
(29) Public Relations	0	0	0	0	0
(30) Marketing	6,000	0	0	0	0
(31) Franchise Fees and Memberships	0	0	0	0	0
(32) Bad Debt	925	4,649	8,041	12,275	16,471
(33) Property Taxes	503	1,164	447	1,587	1,500
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(35) Interest Expense	0	0	0	0	0
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(36) Depreciation & Amortization	41,852	98,968	161,989	239,037	330,572
EBIT	(908,875)	(383,045)	172,113	607,194	1,092,078
Income Taxes (@ 40%)	0	38	69,142	242,878	436,831

COST Detail per Building

Income Statement

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SALARY MODEL

NAME:	Pay Status:	Bonus	Inflation:	Year 1	Year 2	Year 3	Year 4	Year 5
	Exempt	Eligibility:	5%					
	Non-Exempt	Yes/No						
				Total	Total	Total	Total	Total
Program Manager	Exempt	Yes	1	\$80,000	\$84,000	\$88,200	\$92,610	\$97,241
Tech 1	Nonexempt	No	0	\$60,000	\$63,000	\$66,150	\$69,458	\$72,930
Tech 2	Nonexempt	No	0	\$40,000	\$42,000	\$44,100	\$46,305	\$48,620
Bld NOCC Tech 1	Nonexempt	No	0	\$60,000	\$63,000	\$66,150	\$69,458	\$72,930
Bld NOCC Tech 2	Nonexempt	No	0	\$50,000	\$52,500	\$55,125	\$58,622	\$61,163
Provisioning/Order Entry	Nonexempt	No	0	\$40,000	\$42,000	\$44,100	\$46,305	\$48,620
Administrative Asst	Nonexempt	No	0	\$36,000	\$37,800	\$39,690	\$41,675	\$43,758
Customer Services Rep	Nonexempt	No	0	\$40,000	\$42,000	\$44,100	\$46,305	\$48,620
Project Engineer	Exempt	Yes	1	\$60,000	\$63,000	\$66,150	\$69,458	\$72,930
Project Manager	Exempt	Yes	1	\$60,000	\$63,000	\$66,150	\$69,458	\$72,930
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Employee	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Building Tech	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Building Tech	Exempt	No	0	\$0	\$0	\$0	\$0	\$0
Customer Service Rep.	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Nonexempt	No	0	\$0	\$0	\$0	\$0	\$0
Employee	Exempt	Yes	1	\$0	\$0	\$0	\$0	\$0
Totals				\$526,000	\$552,300	\$579,915	\$637,851	\$669,744
Total Headcount				10.0	10.0	10.0	10.0	10.0

Per Building

Income S

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LINE 18

<u>Account Detail</u>	<u>Year 1 Total</u>
1 <u>Consulting on Net Mgmt</u>	25,000
2 <u>Set up Sales/Order Entry Automation</u>	25,000
3 <u>Billing/Relational Database</u>	25,000
4 <u>Cable Management Software</u>	20,000
	<u>95,000</u>

LINE 19

Income S

Blank Sheet

Capital LINE 2

<u>Account Detail</u>		<u>Year 1</u> <u>Total</u>
1	New Employee Furniture/Telephone	30,000
2	Other Furniture	0
3		0
4		0
		<u>30,000</u>

Capital LINE 3

<u>Account Detail</u>		<u>Year 1</u> <u>Total</u>
1		0
2		0
		<u>0</u>

Capital LINE 4

<u>Account Detail</u>		<u>Year 1</u> <u>Total</u>
1		0
2		0
		<u>0</u>

Capital LINE 5

<u>Account Detail</u>		<u>Year 1</u> <u>Total</u>
1	Test Equipment (ISDN/LAN Prtcl Anlzrs)	50,000
2		0
3		0
		<u>50,000</u>

Income S

Blank Sheet

Capital LINE 6

<u>Account Detail</u>		<u>Year 1</u>
		<u>Total</u>
1	Software for New Employees	20,000
2		0
3	DB + Workgroup Software	0
		<u>20,000</u>

Capital LINE 7

<u>Account Detail</u>		<u>Year 1</u>
		<u>Total</u>
1	Computer for New Employees	60,000
2	Home Systems for Engineers	14,000
3		0
		<u>74,000</u>

Capital LINE 8

<u>Account Detail</u>		<u>Year 1</u>
		<u>Total</u>
1		0
		<u>0</u>

Capital LINE 9

<u>Account Detail</u>		<u>Year 1</u>
		<u>Total</u>
1		0
2		0
		<u>0</u>

Capital LINE 10

<u>Account Detail</u>		<u>Year 1</u>
		<u>Total</u>
1	Fiber Riser Cable Backbone	0
2	Copper Voice Cable Backbone	100,000
		<u>100,000</u>

Capital LINE 11

<u>Account Detail</u>		<u>Year 1</u>
		<u>Total</u>
1	Capital Costs for Connections	301,550
2		0
3		0
		<u>301,550</u>

Income S

Blank Sheet

Capital LINE 12

<u>Account Detail</u>	<u>Year 1 Total</u>
1 _____	0
2 _____	0
	<u>0</u>

Capital LINE 13

<u>Account Detail</u>	<u>Year 1 Total</u>
1 _____	0
2 _____	0
	<u>0</u>

Capital LINE 14

<u>Account Detail</u>	<u>Year 1 Total</u>
1 <u>Other Building POP & Riser Infrastruct</u>	0
2 <u>NMS Workstations & Servers</u>	30,000
3 <u>NMS Software</u>	15,000
4 <u>Miscellaneous Telecom</u>	10,000
5 _____	0
	<u>55,000</u>

Capital LINE 15