DETAIL OF UC2B PROJECT COSTS

PLEASE COMPLETE THE TABLE BELOW FOR THE DIFFERENT CATEGORIES OF EQUIPMENT THAT WILL BE REQUIRED FOR COMPLETING THE PROJECT. EACH CATEGORY SHOULD BE BROKEN DOWN TO THE APPROPRIATE LEVEL FOR IDENTIFYING UNIT COST

	SERVICE AREA or COMMON NETWORK FACILITES:		Unit Cost	No. of Units	Total Cost	Support of Reasonableness
NETWORK & ACC	ESS EQUIPMENT				\$2,684,555	
	Metro Aggregation Switches	Yes	35089	4	\$140,356	Aggregates OLTs and Service Providers
Switching	"Circuit" & Mgmt Aggregation	Yes	8300	4		Aggregates transport circuits & network management tools
					\$0	
	Peering points	Yes	120550	3		On-net traffic access
Routing	Egress points	Yes	120550	3		Off-net traffic access
					\$0	
	Optical Chassis	Yes	3973.4	3	\$11,920	10GB transport channels for economical BW accord
Transport	10GB Transponders	Yes	9538.97	6	\$57,234	
	Linecards	Yes	800	6	\$4,800	
	WDM-PON chassis	Yes	7239	14	\$101,346	WDM-PON shelf with backbone uplink
Access	WDM-PON OLT	Yes	13268	108	\$1,432,944	
	WDM-PON splitter.filter	Yes	1519	108	\$164,052	
	WDM-PON cabling, breaker interface, software	Yes	15403	1	\$15,403	
Other					\$0	
					\$0	
OUTSIDE PLANT					\$22,069,786	
	Fiber to the curb/homes passed	Yes	\$ 1,750.00	4,650	\$8,137,500	
	Fiber per foot	Yes	\$ 2.60	830,328		Metro Rings
	Fiber pulling - figure 8 - per foo	Yes	\$ 1.00	830,328	\$830,328	Metro Rings
	Fiber Laterals	Yes	\$ 15,000.00	137	\$2,055,000	Average cost for Anchor Institution build-outs
	Splicing	Yes	\$ 15.00	27,216	\$408,240	Butt Splice
O a h d a a	Termination Splicing	Yes	\$ 20.00	2,688	\$53,760	Splicing in Nodes
Cables	Splice Case Prep	Yes	\$ 300.00	441	\$132,300	
	Splice Cases	Yes	\$ 550.00	413	\$227,150	
	Patch Panel	Yes	\$ 5,030.10	28	\$140,843	
	Patch Rack	Yes	\$ 1,112.00	10	\$11,120	
	2" HPDE Duct per foot	Yes	\$ 1.38	958,678	\$1,322,976	
	Boring per foot	Yes	\$ 10.94	360,874	\$3,947,957	
	Hand Holes	Yes	\$ 800.00	444		30"x48"x36"
Conduit/Ducts	Vaults	Yes	\$ 8,000.00	24	\$192,000	

	Misc Concrete Repair	Yes	\$ 13.00	5,760	\$74.880	Concrete removal for sidewalks & streets
	· · · · · ·				\$0	
	FTTH Fiber drops	Yes	750	2700		Curb to Building
Other					\$0	
					\$0	
	E AREA or COMMON	Eligibility (Yes/No)	Unit Cost	No. of Units	Total Cost	Support of Reasonableness
BUILDINGS					\$0	
					0	
New Construction					0	
					0	
					0	
Pre-Fab Huts					0	
					0	
					0	
Improvements &					0	
Renovation					0	
					0	
Other					0	
					0	
CUSTOMER PREM					\$1,587,168	
	Wireless Router	Yes	100	2700	\$270,000	
Modems		165	100	2700	\$270,000	
Modellis					\$0 \$0	
					\$0 \$0	
Set Top Boxes						
Set Top Boxes					\$0	
	In Ruilding Wiring		050	0700	\$0	
Incide Writing	In-Building Wiring	Yes	250	2700	\$675,000	
Inside Writing			007.04	0700	\$0	
	100 Mbps WDM-PON ONT	Yes	237.84	2700		WDM-PON CPE access devices
Other					\$0	
Other					\$0	
					\$0	
BILLING SUPPORT	AND OPERATIONS SUPPORT	T			\$275,000	
Pilling Sumport	Provisioning & Billing	Yes	120000	1	\$120,000	
Billing Support Systems	Order Processing & Tracking Software	Yes	135000	1	\$135,000	
		100	133000		\$135,000	
	Community Help Desk Systems	Voc	20000			
Customer Care		165	20000	1	\$20,000	
Systems			+		\$0	
			+		\$0	
					\$0	

Other Support					\$0	
					\$0	
	AREA or COMMON DRK FACILITES:	Eligibility (Yes/No)	Unit Cost	No. of Units	Total Cost	Support of Reasonableness
OPERATING EQUIP	MENT				\$10,000	
					\$0	
Vehicles					\$0	
					\$0	
Office Equipment /	Community Help Desk Furnishi	Yes	10000	1	\$10,000	
Furniture					\$0	
					\$0	
					\$0	
Other					\$0	
			ļ		\$0	
PROFESSIONAL SE	RVICES				\$254,990	
Enginooring	Engineering Services	Yes	3000	68.33	\$204,990	
Engineering Design		Yes	40000	1	\$40,000	
Design		100	10000	•	\$0	
					\$0	
Project					\$0	
Management					\$0	
					\$0	
Consulting	Design Consulting Services	Yes	10000	1	\$10,000	
_					\$0	
Other						
TESTING					\$166,033	
Network	Network Performance Monitor Software	Yes	20975	1	\$20,975	
Elements	Traffic Characterization Softwa	Yes	14995	1	\$14,995	
					\$0	
IT System	WDM-PON Test Equipment	Yes	35031.52	2	\$70,063	OSA/OTDR
Elements					\$0	
					\$0	
					\$0	
User Devices					\$0	
					\$0	
					\$0	
Test Generators					\$0	
					\$0	

Lah					\$0	
Lab Furnishings					\$0	
r unnsnings					\$0	
Servers /	Rack Mountable Servers	Yes	6000	10	\$60,000	
Computers					\$0	
Compatoro					\$0	
SERVICE AREA or COMMON NETWORK FACILITES:		Eligibility (Yes/No)	Unit Cost	No. of Units	Total Cost	Support of Reasonableness
OTHER UPFRON	T COSTS				\$2,339,393	
Site					0	
Preparation					0	
roparation					0	
	Permits	Yes	\$957.15	35	\$33,500	County, Railroad, State
	Benefits - Inspection	Yes	\$233,522	1	\$233,522	
Other	Benefits - Construction	Yes	\$318,607	1	\$318,607	
	FT Staff Resources - Inspection	Yes	\$590,000	1	\$590,000	
	FT Staff Resources-Construction	Yes	\$804,970	1	\$804,970	
	PT Staff Resources-Construction	Yes	\$358,794	1	\$358,794	
			P	ROJECT TOTAL:	\$29,386,925	



Budget Narrative

Applicant Name: Board of Trustees of the University of Illinois

EasyGrants Number: 1724

Organization Type (from Question 1D on BTOP application): Local, State or Other Government Entity

Proposed Period of Performance: Feb. 2010 through Sept. 2012

Total Project Costs: \$ 29,386,925

Total Federal Grant Request: \$ 22,534,776

Total Matching Funds (Cash): \$ 6,554,074

Total Matching Funds (In-Kind): \$ 298,075

Total Matching Funds (Cash + In-Kind): \$ 6,852,149

Total Matching Funds (Cash + In-Kind) as Percentage of Total Project Costs: 23.48%

1. Administrative and legal expenses

- List breakout of position(s), time commitment(s) such as hours or level-of-effort, and salary information/rates with a detailed explanation, and additional information as needed.

N/A

- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

2. Land, structure, rights-of-way, appraisals, etc.



- Provide description of estimated costs, proposed activites, and additional information as needed.

We are not purchasing any land or structures. Rights-of-way are being provided by the University and the cities partnering in the consortium.

- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

3. <u>Relocation expenses and payment</u>

- Provide explanation for the relocation, description of the person involved in the relocation, method used to calculate costs, and additional information as needed.

We do not anticipate any relocation expenses.

- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

4. Architectural and engineering fees

- Provide description of estimated fees, explanation of proposed services, and additional information as needed.

We are projecting engineering costs for the seven middle mile backbone rings which total 66.34 network miles is \$254,990. Engineering costs for the Anchor Institution laterals, FTTH service area & drops were covered by the total costs of each component. Below is a table illustrating the itemized costs.

Engineering for Each Component

		Engineel	ring for Each Co	mponent
Component	Total Component Cost	Units	Cost per Unit	Total Costs
Seven Middle Mile Backbone Rings		66.34 miles		\$254,990
Anchor Institution Laterals	\$15,000 per lateral	27.86 miles	\$3,000	\$83,580
FTTH service areas	\$1,750 per household passed	64.8 miles	\$3,000	\$194,400





FTTH drops

\$750 per drop 2563 drops \$100

\$256,300

- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

5. Other architectural and engineering fees

- Provide description of estimated fees, explanation of proposed services, and additional informaiton as needed.

We are not projecting any additional architectural or engineering fees.

- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

6. Project inspection fees

- Provide description of estimated fees, explanation of proposed services, and additional informaiton as needed.

Inspection will be performed by University, City of Urbana and City of Champaign staff. There is a total of \$590,000 in the direct reimbursement budget for inspection and another \$233,522 in Fringe Benefits for a total of \$823,522. This is based on one FTE for the city of Urbana for two years, 1 FTE for the city of Champaign for two years, 1 FTE for the City of Champaign for 1 year, 1 FTE for the University for 2 tears and and 1 FTE for the University for 1 year for inspections and coordination of inspections.

Inspection and Bene	on Costs - S efits	Salaries			
	STAFF	HOURS	YEARS	RATE	TOTAL COST
uiuc	Engineer	2080	2.00	\$38.4615	\$160,000.00
	Project				
uiuc2	Manager	2080	1.00	\$38.4615	\$80,000.00
champ1	Engineer	2080	2.00	\$33.6538	\$140,000.00
	Project				
champ2	Engineer	2080	1.00	\$33.6538	\$70,000.00
urbana	Engineer	2080	2.00	\$33.6538	\$140,000.00
				Total Inspection Labor Costs	\$590,000.00

39.58%

Benefits on Full Time Employees\$233,522.00Total Labor and Benefits Inspection
Costs\$823,522

- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

7. Site work

- Provide description of estimated fees, explanation of proposed services, and additional information as needed.

We anticipate that the cities participating in the consortium will waive permit fees. Below is a summary of other permits required for the project which total \$33,500.

Permits	Number Required	Cost Each	Total Cost
county	5	\$250	\$1,250
railroad	11	\$2,500	\$27,500
highway	19	\$250	\$4,750

- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

8. Demolition and removal

- Provide description of estimated fees, explanation of proposed services, and additional information as needed.

Concrete demolition and removal will be necessary for both sidewalks and streets. Below is a chart indicating the various costs which total \$74,880.

Туре	Number	Replacement Size	Cost per sq ft	Total Cost
Sidewalk	200	12 sq ft	\$12	\$28,800
Street	20	144 sq ft	\$16	\$46,080



- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

9. Construction

- Provide description of estimated fees, explanation of proposed services, state whether the work is being completed by the applicant or an outside contractor, and additional information as needed.

Total construction costs for this project will be \$23,477,277 and are split between materials/labor and implementation staffing costs:

The total cost of all fiber construction, which includes materials and contracted labor but not Engineering or Inspection or Implementation Labor and Benefits will be \$21,994,906.

The total cost of all Iplementation Labor will be \$1,163,764. The total cost of Benefits for the full-time Implementation Labor will be \$318,607. The total cost of all Implementation Labor and Benefits will be \$1,482,371.

STAFF	ROLE	HOURS	YEARS	RATE	TOTAL COST
Mike	Director	944	2.0	\$63.1980	\$119,318
Tracy	Manager Network	2080	1.0	\$39.0385	\$81,200.00
Aaron	Install Network	2080	1.0	\$41.7337	\$86,806.00
Skaar	Install Network	2080	1.0	\$30.3120	\$63,049.00
Nick	Engineer Network	2080	1.0	\$34.8558	\$72,500.00
Ryan	Engineer Network	2080	1.0	\$32.6601	\$67,933.00
Josh	Design OSP	2080	1.0	\$24.4067	\$50,766.00
Brian	Engineer OSP	2080	1.0	\$32.3221	\$67,230.00
Randy	Engineer	2080	1.0	\$41.0990	\$85,486.00
New	Engineer Project	2080	0.5	\$38.4615	\$40,000.00
Bob	Manager	2080	1.5	\$38.4615	\$120,000.00
Champ1	Engineer	2080	0.0	\$33.6538	\$0.00
Champ2	Project	2080	1.0	\$33.6538	\$70,000.00

Implementation Labor & Benefits Costs

BROADBAND TECHNOLOGY OPPORTUNITIES PROGRAM (BTOP)



	Engineer				
Urbana1	Engineer admin	2080	0.0	\$33.6538	\$0.00
Champ3	assistant admin	1560	2	\$22.0692	\$68,856.00
Champ4	assistant admin	1040	2	\$15.8654	\$33,000.00
Champ5	assistant admin	1040	2	\$14.4231	\$30,000.00
Champ6	assistant admin	1040	2	\$14.1712	\$29,476.00
Urbana2	assistant admin	1560	2	\$16.3923	\$51,144.00
Urbana3	assistant	1040	2	\$12.9808 Total Full-Time Implementation	\$27,000.00
				Salary Costs	\$804,970
	39.58%			Benefits on F-T Implementation Salaries	\$318,607
	07.0070			Sularios	<i>4010(00)</i>
				Total Part Time Implementation Salaries	\$358,794
				Total All Implementation Salaries	\$1,163,764
				Total All Implementation Salaries and Benefits	\$1,482,371

- Provide description, calculation, and basis of evaluation for Cash Matching Funds.

\$6,554,074 in cash matching funds will be used for Construction.

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. Existing conduit, fiber and equipment installed within the last two years by the Urbana Unit 116 Schools totaling \$298,075 are the project's only in-kind matching funds. The consortium will assume ownership and management of that infrastructure.

10. Equipment

- Provide list of equipment with description, number of units, unit cost, state whether it is being purchased or leased, and additional information as needed.

All equipment will be purchased.

Description	Number Required	Cost Each	Total Cost
Switches	4	\$35,089.00	\$140,356.00
Aggregation routers	4	\$8,300.00	\$33,200.00
Peering routers	6	\$120,550.00	\$723,300.00



Optical chassis 10GB transponders DWDM linecards WDM-PON OLT shelves WDM-PON OLT blades WDM-PON filters Misc WDM-PON parts/software	3 6 14 108 108 1	\$3,973.00 \$9,539.00 \$800.00 \$7,239.00 \$13,268.00 \$1,519.00 \$15,404.00	\$11,919.00 \$57,234.00 \$4,800.00 \$101,346.00 \$1,432,944.00 \$164,052.00 \$15,404.00
In-home wireless routers WDM-PON ONT In-building wiring	2700 2700 2700	\$100.00 \$237.84 \$250.00	\$270,000.00 \$642,168.00 \$675,000.00
Servers Software: Monitoring, Billing, Support	10 1	\$6,000.00 \$320,970.00	\$60,000.00 \$320,970.00
Network test equipment	1	\$70,063.04	\$70,063.04

- Provide description, calculation, and basis of evaluation for Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation for In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

11. Miscellaneous

No miscellaneous

- Provide additional information as needed.

- Provide description, calculation, and basis of evaluation of Cash Matching Funds. No cash matching funds will be used for this activity

- Provide description, calculation, and basis of evaluation of In-Kind Matching Funds. No in-kind matching funds will be used for this activity.

Addendum

 If indirect costs (i.e., indirect, overhead, general and administrative, facilities and administration, etc.) and/or fringe benefits are included in the budget, please provide a copy of your existing Negotiated Indirect Cost Recovery Agreement (NICRA), if available. If the NICRA is applied accordingly in the budget, there is no need to justify the costs. If a NICRA is not available or is not consistent with the rates/calculations in the budget,

please provide an explanation of how the amounts were calculated. Please clearly list the manner in which indirect costs are calculated in the budget.

The University's NICRA has been sent in a separate email. The Fringe benefit rate was charged for full-time dedicated University labor, including inspection, project management, design and network implementation. The rate applied for the costs that were eligible was 39.58%, which is the University's negotiated fringe benefit rate. For the entire BTOP request, the effective fringe benefit rate is 2.45%.

Full-time Staff costs total \$1,394,970. At the University's fringe benefits recovery rate of 39.58%, that works out to a total of \$552,128. In the Budget Narrative and form 424C that is split between Inspection and Construction as indicated above.

Fringe benefits recovery was not applied to any part-time or non-dedicated staff.

		BUDGET INFORMATION	I - Construction Program	ns
NOTE: Certain Federal assistance programs require additional compu	tations to arrive at the Federal share	e of project costs eligible for particip	pation. If such is the case, you wil	I be notified.
COST CLASSIFICATION	a. Total Cost	b. Matching Funds (Cash)	c. Matching Funds (In-Kind)	d. Federal Funding Request (Columns a-b-c)
1. Administrative and legal expenses	\$0	\$0	\$0	\$0
2 . Land, structures, rights-of-way, appraisals, etc.	\$0	\$0	\$0	\$0
Relocation expenses and payments	\$0	\$0	\$0	\$0
4. Architectural and engineering fees	\$254,990	\$0	\$0	\$254,990
5. Other architectural and engineering fees	\$0	\$0	\$0	\$0
6. Project inspection fees	\$823,522	\$0	\$0	\$823,522
7. Site work	\$33,500	\$0	\$0	\$33,500
8. Demolition and removal	\$74,880	\$0	\$0	\$74,880
9. Construction	\$23,477,277	\$6,554,074	\$298,075	\$16,625,128
10. Equipment	\$4,722,756	\$0	\$0	\$4,722,756
11. Miscellaneous	\$0	\$0	\$0	\$0
12. SUBTOTAL (add #1 through #11)	\$29,386,925	\$6,554,074	\$298,075	\$22,534,776
13. Contingencies	\$0	\$0	\$0	\$0
14. SUBTOTAL (add #12 and #13)	\$29,386,925	\$6,554,074	\$298,075	\$22,534,776
15. Project (program) income	\$0	\$0	\$0	\$0
	FEDERAL FUNDING	έ.		

General UC2B Budget Overview

Budget	Loan Request	Federal Funding Request	Matching Funds (Cash)	Matching Funds (In-Kind)	Equity	Debt	Bond	Other	TOTAL
Network & Access Equipment (switching,									
routing, transport, access)	0	2,684,555							\$2,684,555
Outside Plant (cables, conduits, ducts,									
poles, towers, repeaters, etc.)	0	15,217,637	6,554,074	298,075					\$22,069,786
Buildings and Land – (new construction,									
improvements, renovations, lease)	0								\$0
Customer Premise Equipment (modems, set-									
top boxes, inside wiring, etc.)	0	1,587,168							\$1,587,168
Billing and Operational Support Systems (IT									
systems, software, etc.)	0	275,000							\$275,000
Operating Equipment (vehicles, office									
equipment, other)	0	10,000							\$10,000
Engineering/Professional Services (engineering design, project management,									
consulting, etc.)	0	254,990							\$254,990
Testing (network elements, IT system									
elements, user devices, test generators, lab									
furnishings, servers/computers, etc.)	0	166,033							\$166,033
Site Preparation	0								\$0
Other - Direct and Indirect Costs	0	2,339,393							\$2,339,393
TOTAL BROADBAND SYSTEM:	\$0	\$22,534,776	\$6,554,074	\$298,075	\$0	\$0	\$0	\$0	\$29,386,925

General UC2B Budget Overview

Budget	Loan Request	Federal Funding Request	Matching Funds (Cash)	Matching Funds (In-Kind)	Equity	Debt	Bond	Other	TOTAL
Network & Access Equipment (switching,									
routing, transport, access)	0	2,684,555							\$2,684,555
Outside Plant (cables, conduits, ducts, poles,									
towers, repeaters, etc.)	0	15,217,637	6,554,074	298,075					\$22,069,786
Buildings and Land – (new construction,									
improvements, renovations, lease)	0								\$0
Customer Premise Equipment (modems, set-									
top boxes, inside wiring, etc.)	0	1,587,168							\$1,587,168
Billing and Operational Support Systems (IT									
systems, software, etc.)	0	275,000							\$275,000
Operating Equipment (vehicles, office									
equipment, other)	0	10,000							\$10,000
Engineering/Professional Services									
(engineering design, project management,									
consulting, etc.)	0	254,990							\$254,990
Testing (network elements, IT system									
elements, user devices, test generators, lab									
furnishings, servers/computers, etc.)	0	166,033							\$166,033
Site Preparation	0								\$0
Other - Direct and Fringe Benefit Costs	0	2,339,393							\$2,339,393
TOTAL BROADBAND SYSTEM:	\$0	\$22,534,776	\$6,554,074	\$298,075	\$0	\$0	\$0	\$0	\$29,386,925

DETAIL OF UC2B PROJECT COSTS

PLEASE COMPLETE THE TABLE BELOW FOR THE DIFFERENT CATEGORIES OF EQUIPMENT THAT WILL BE REQUIRED FOR COMPLETING THE PROJECT. EACH CATEGORY SHOULD BE BROKEN DOWN TO THE APPROPRIATE LEVEL FOR IDENTIFYING UNIT COST

	CE AREA or COMMON WORK FACILITES:	Eligibility (Yes/No)	L	Jnit Cost	No. of Units	Total Cost	Support of Reasonableness
	ESS EQUIPMENT					\$2,684,555	
	Metro Aggregation Switches	Yes		35089	4	140356	Aggregates OLTs and Service Providers
Switching							Aggregates transport circuits & network
ennenng	"Circuit" & Mgmt Aggregation	Yes		8300	4	33200	management tools
						0	a
	Peering points	Yes		120550	3		On-net traffic access
Routing	Egress points	Yes		120550	3		Off-net traffic access
					-	0	
-	Optical Chassis	Yes		3973.4	3		10GB transport channels for economical BW acc
Transport	10GB Transponders	Yes		9538.97	6	57233.82	
	Linecards	Yes		800	6	4800	
•	WDM-PON chassis	Yes		7239	14		WDM-PON shelf with backbone uplink
Access	WDM-PON OLT	Yes		13268	108	1432944	
	WDM-PON splitter.filter	Yes		1519	108	164052	
	WDM-PON cabling, breaker interface, software	Yes		15403	1	15403	
Other		Tes		15405	1		
						0	
						0	
OUTSIDE PLANT	Fiber to the curb/homes passed		\$	1,750.00	4,650	\$22,069,786 8137500	
	Fiber per foot		⊅ \$	2.60	830,328	2155532.241	
	Fiber pulling - figure 8 - per foo	Yes	⊅ \$	1.00	830,328		Metro Rings
	Fiber Laterals		э \$	15,000.00	137		Average cost for Anchor Institution build-outs
	Splicing	Yes Yes	\$	15,000.00	27,216		Butt Splice
	Termination Splicing	Yes	\$	20.00	2,688		Splicing in Nodes
Cables	Splice Case Prep		э \$	300.00	441	132300	
	Splice Cases	Yes Yes	\$	550.00	441	227150	
	Patch Panel		э \$	5,030.10	28		
	Patch Rack	Yes	φ \$	1,112.00	10	140842.8 11120	
		Yes	φ	1,112.00	10	11120	
	2" HPDE Duct per foot	Yes	\$	1.38	958,678	1,322,975.82	
	Boring per foot	Yes	\$	10.94	360,874	3,947,956.53	
Conduit/Ducts	Hand Holes	Yes	\$	800.00	444		30"x48"x36"
Contaily Ducto	Vaults	Yes	\$	8,000.00	24	192000	
	Misc Concrete Repair	Yes	\$	13.00	5,760		Concrete removal for sidewalks & streets
				750	0700	0	
Other	FTTH Fiber drops	Yes		750	2700		Curb to Building
Uner			_			0	
			1			0	

SERVICE AREA or COMMON NETWORK FACILITES:		Eligibility (Yes/No)	Unit Cost	No. of Units	Total Cost	Support of Reasonableness
BUILDINGS					\$0	
					0	
New Construction					0	
					0	
					0	
Pre-Fab Huts					0	
					0	
					0	
Improvements &					0	
Renovation					-	
					0	
Other					0	
Other					0	
					0	
CUSTOMER PREMI					\$1,587,168	
	Wireless Router	Yes	100	2700	270000	
Modems					0	
					0	
					0	
Set Top Boxes					0	
					0	
	In-Building Wiring	Yes	250	2700	675000	
Inside Writing					0	
	100 Mbps WDM-PON ONT	Yes	237.84	2700	642168	WDM-PON CPE access devices
					0	
Other					0	
					0	
BILLING SUPPORT	AND OPERATIONS SUPPORT	SYSTEMS			\$275,000	
	AND OPERATIONS SUPPORT	Yes	120000	1	120000	
Billing Support	Software Order Processing & Tracking	100	120000		120000	
Systems	Software	Yes	135000	1	135000	
-					0	
	Community Help Desk Systems	Yes	20000	1	20000	
Customer Care					0	
Systems					0	
					0	
Other Support					0	
					0	
	E AREA or COMMON	Eligibility (Yes/No)	Unit Cost	No. of Units	Total Cost	Support of Reasonableness
OPERATING EQUIP					\$10,000	
					910,000	
Vehicles					0	
1010103			+			
	Community Hale Deals Free 11	Vaa	40000		0	
Office Equipment /	Community Help Desk Furnishi	res	10000	1	10000	
Furniture					0	
					0	
					0	
Other					0	

		0	
		0	
			k

PROFESSIONAL SI	ERVICES				\$254,990	
	Engineering Services	Yes	3000	68.33	204990	
Engineering	Engineering Services	Yes	40000	00.33		
Design	Plant Engineering Services	res	40000	1	40000	
					0	
Project					0	
Management					0	
					0	
Consulting	Design Consulting Services	Yes	10000	1	10000	
oonouning	Design Consulting Services	163	10000	1	00000	
			I		-	
Other						
TESTING					\$166,033	
	Network Performance Monitor					
Network		Yes	20975	1	20975	
Elements	Traffic Characterization Softwa	Yes	14995	1	14995	
					0	
IT System	WDM-PON Test Equipment	Yes	35031.52	2	70063.04	OSA/OTDR
Elements					0	
					0	
					0	
User Devices					0	
					0	
					0	
Test Generators					0	
					0	

Lab					0				
Furnishings					0				
g-					0				
Servers /	Rack Mountable Servers	Yes	6000	10	60000				
Computers					0				
Computers					0				
	SERVICE AREA or COMMON NETWORK FACILITES:		Unit Cost	No. of Units	Total Cost	Support of Reasonableness			
OTHER UPFRONT	COSTS				\$2,339,393				
Site					0				
Preparation					0				
reparation					0				
	Permits	Yes	957.15	35	33500.25	County, Railroad, State			
Other	Fringe Benefits	Yes	576827	1	576827				
	Staff Resources	Yes	1729066	1	1729066				
	PROJECT TOTAL: \$29,386,925								

U	Irbana-Champaign Big	Broadband								
		BUDGET INFORMATION	- Construction Program	ns						
NOTE: Certain Federal assistance programs require additional computations to arrive at the Federal share of project costs eligible for participation. If such is the case, you will be notified.										
COST CLASSIFICATION	a. Total Cost	b. Matching Funds (Cash)	c. Matching Funds (In-Kind)	d. Federal Funding Request (Columns a-b-c)						
1. Administrative and legal expenses	\$0	\$0	\$0	\$0						
2 . Land, structures, rights-of-way, appraisals, etc.	\$0	\$0	\$0	\$0						
3. Relocation expenses and payments	\$0	\$0	\$0	\$0						
4. Architectural and engineering fees	\$254,990	\$0	\$0	\$254,990						
5. Other architectural and engineering fees	\$0	\$0	\$0	\$0						
6. Project inspection fees	\$561,729	\$0	\$0	\$561,729						
7. Site work	\$33,500	\$0	\$0	\$33,500						
8. Demolition and removal	\$74,880	\$0	\$0	\$74,880						
9. Construction	\$23,739,070	\$6,554,074	\$298,075	\$16,886,921						
10. Equipment	\$4,722,756	\$0	\$0	\$4,722,756						
11. Miscellaneous	\$0	\$0	\$0	\$0						
12. SUBTOTAL (add #1 through #11)	\$29,386,925	\$6,554,074	\$298,075	\$22,534,776						
13. Contingencies	\$0	\$0	\$0	\$0						
14. SUBTOTAL (add #12 and #13)	\$29,386,925	\$6,554,074	\$298,075	\$22,534,776						
15. Project (program) income	\$0	\$0	\$0	\$0						
16. TOTAL PROJECT COSTS (subtract #15 from #14)	\$29,386,925	\$6,554,074	\$298,075	\$22,534,776						
	FEDERAL FUNDING									
17. Federal assistance requested, calculated as follows: (Consult Federal agency for Federal percentage share.) Enter the resulting Federal share.	\$5,877,385									