



UC2B Policy Board Agenda

Regular Meeting

September 7, 2011 – 12:00 noon

Council Chambers, 102 N. Neil Street, Champaign, Illinois

- I. Call to Order
- II. Roll Call (By Roster) – Determine Quorum
- III. Approve Agenda
- IV. Approval of Minutes from 8/17/2011
- V. ACTION*/DISCUSSION ITEMS (note in this section we will go to audience for comment prior to discussion by Board of each item, comments are limited to 5 minutes in length per person)
 - a) Marketing Committee Update – Brandon Bowersox/John Kersh
 - b) Outreach Management Plan and Canvassing Strategy Update – Dr. Jon Gant (verbal)
 - c) NTIA/Grant Update – Mike Smeltzer
 - d) Discussion of Assumptions/Questions for Scope of Services for Business Planning and Consulting Services – Mike Smeltzer
- VII. Tasks to complete for next meeting
- VIII. Items for next meeting's agenda
- IX. Public Participation
- X. Adjournment
- XI. **Next Meeting:**
September 21, 2011- 12:00 p.m. to 1:30 p.m.
Council Chambers, 102 N. Neil Street, Champaign, Illinois
- XII. Items for future Action/Discussion:
 - a) Grant Required Approvals – Mike Smeltzer
 - b) Technical Committee Report and Request for approvals of items forwarded from Technical Committee and its sub-committees – Tracy Smith
 - c) FTTP RFP Decisions – should construction and management be included together as one RFP or not – Tracy Smith
 - d) Discussion of pursuing a change order for ring design in order to include a production class facility – Rough Cost Estimates – Mike Smeltzer
 - e) Consulting Bid results – Teri Legner



UC2B Policy Board Minutes

Policy Board Meeting
August 17, 2011

Location:
City of Champaign Council Chambers
102 N. Neil Street
Champaign, IL 61820

Board Members Present: Abdul Alkalimat, Rev. Zernial Bogan, Brandon Bowersox, Mike DeLorenzo, Deborah Frank Feinen, Pete Resnick, Richard Schnuer, Tracy Smith.

Board Members absent: Minor Jackson

- I. The meeting was called to order at 11:58 a.m. by Chair Feinen.
- II. Roll Call
- III. Alkalimat moved and Bogan seconded to approve the Agenda as written. The Board approved by voice vote.
- IV. Bogan moved and Bowersox seconded to approve the Minutes of the August 3rd and August 10, 2011 meetings as written. The Board approved by voice vote.
- V. Action Items:

Marketing Committee Update: Bowersox updated the Board on events the committee has been planning lately. Bogan thanked the marketing committee for its efforts and for the flyers they have designed and distributed and the events they have been planning and attending. Bowersox mentioned that Ray Mitchell from Volo Broadband has been instrumental in the design and printing of the flyers for the Tech Showcase.

NTIA Report – A written report was in the packet. The Board asked Smeltzer if he had received any additional feedback from the NTIA visit. He reported that it seems to have gone well and that they were impressed with our project. They will provide a written summary of their visit soon.

Resolution Approving The Household and Community Anchor Institution Outreach Management Plan and Canvassing Strategy: Bogan moved and Smith seconded a motion to approve the Resolution. Dr. Jon Gant, from the UI Graduate School for Library and Information Science, presented a written proposal to conduct the work which was

attached and incorporated into the Resolution. Dr. Gant also provided a proposed budget for the project which is attached to these minutes. Dr. Gant discussed his vision for the hiring of temporary workers to canvass the underserved neighborhoods and survey anchor institutions. His vision includes training these employees in a manner and with the relevant skills that will provide them with the opportunity to secure more permanent employment either with UC2B, the University or other similar employers. He is developing a recruitment plan that will seek individuals that are able to communicate effectively with people from diverse socio-economic and cultural backgrounds. There will be a concerted effort to broadcast the job announcements within the areas of our community that will be served initially by UC2B. The Board discussed the hiring process. With this proposal, the UI will be the employing agency due to the fact that they will be conducting the survey/canvass. There was discussion about whether or not the Cities should be the hiring agencies. Both Schnuer and Bowersox indicated that the UI is in a better position to hire and supervise the employees given current staffing levels. They also both suggested that it would be awkward for the Cities to hire these canvassers and assign them to work under the management of the UI team. Peter Folk asked who will own the data when the canvassing is done. Per the terms of the LOU, the UC2B assets will be transferred to UC2B. Legner will clarify whether this language is sufficient to ensure ownership of the canvassing/survey data as well or whether this needs to be handled and acquired in another manner. Committee Chair Feinen took a voice vote of the Board. Board approved 6-1 (Resnick opposed).

Other: Rev. Bogan asked why the demonstration of technology/equipment was not scheduled to be held in the targeted areas. He indicated that the University/Campus area can be intimidating for people not readily familiar with it. Bowersox responded that we needed to hold it on Campus to access the correct internet speeds that we are selling. They will record and post on You Tube for public viewing.

Feinen adjourned meeting at 1:35 p.m.

Next Meeting: September 7, 2011 at 12:00 noon – City of Champaign Council Chambers, 102 N. Neil Street, Champaign, IL

UC2B RESOLUTION NO. 2011 - 05

A RESOLUTION

APPROVING THE HOUSEHOLD AND COMMUNITY ANCHOR INSTITUTION
OUTREACH MANAGEMENT PLAN AND CANVASSING STRATEGY
(University of Illinois – Graduate School of Library and Information Science and the College of
Liberal Arts and Science Survey Research Service)

BE IT RESOLVED BY POLICY BOARD FOR THE URBANA-CHAMPAIGN BIG
BROADBAND CONSORTIUM, as follows:

Section 1. That the “Evaluation of the Social and Economic Impact of UC2B:
Household and Community Anchor Institution Outreach Management Plan and Canvassing
Strategy” attached hereto and incorporated by reference herein is hereby approved.

Section 2. That Project Investigator and representatives of the Consortium’s member
agencies are hereby authorized to implement the Outreach Management Plan and Canvassing
Strategy identified in Section 1 in substantially the same form as attached hereto.

RESOLUTION NO. 2011 - 05

DATE PASSED:

APPROVED: _____
Policy Board Chair

**Evaluation of the Social and Economic Impact of UC2B:
Household and Community Anchor Institution Outreach
Management Plan and Canvassing Strategy**

Submitted by

Dr. Jon P. Gant
Research Associate Professor
University of Illinois at Urbana-Champaign
Graduate School of Library and Information Science
501 E. Daniel St.
Champaign, IL 61820
jongant@illinois.edu
(217) 333-5975

OVERVIEW

This proposal describes our strategy to support the construction of the UC2B broadband network through the following outreach management plan and canvassing strategy. The University of Illinois is leading an intergovernmental consortium known as the Urbana-Champaign Big Broadband (“UC2B”) project. The goal of UC2B is to construct a 187-mile fiber-optic broadband network that will provide affordable high-speed broadband Internet access. The construction of this network also includes connecting community anchor institutions and households located across 12 fiber hub service areas encompassing both cities with 11-targeted census blocks that are underserved currently with broadband service.

Our team will collaborate with community stakeholders to assist UC2B with the construction of the broadband network in the following ways:

- Develop a comprehensive outreach management plan to support construction
- Canvas door-to-door approximately 4700 premises in the UC2B service area
- Sign up households and community anchor institutions for broadband services
- Collect construction information to connect each building or house
- Provide installation support including Internet and computer education and training
- Combine data collected from the canvassing phase and emerging research to:
 - Develop sustainable broadband adoption strategies for households and community anchor institutions
 - Evaluate and assess the social and economic impact of UC2B

Dr. Jon Gant is leading the project with a team from the Graduate School of Library and Information Science (GSLIS) and the College of Liberal Arts and Science Survey Research Service (ATLAS) at the University of Illinois at Urbana-Champaign. The team has nearly 25 years of experience in marketing, outreach and field survey research related to the digital divide, including in Champaign and Urbana. Members of the team conducted the 2009 UC2B Neighborhood Survey, which provided important benchmarks about the demographic characteristics of computer use among households in the UC2B targeted service areas. The planning is underway with survey work starting in October 2012 through the end of the project on January 31, 2013.

The project team will hire 12 people to serve on the community outreach team. The goal for this position is to serve as outreach ambassadors. Outreach team members will represent UC2B across the Urbana-Champaign community and participate in a door-to-door outreach campaign to increase awareness of the UC2B construction, sign up broadband subscribers, and educate subscribers on how to use the Internet.

The following proposal provides the complete outreach management and canvassing plan to support the construction of the UC2B network and the installation of broadband service to households and community anchor institutions.

MOTIVATION FOR COMMUNITY OUTREACH PLAN

For many low-income households, finding ways to afford broadband Internet is a challenge nationally. Various Internet service providers offer standard high-speed Internet services of 4 to 6 mbps for an average of \$41 per month. While this level of service is adequate for many households, there are approximately 90 million Americans that are not connected to the Internet at all and even more that are connected at slower speeds. Many of American households may be slow to adopt broadband Internet because of the costs of the service and the related costs of owning a computer or finding help to learn how to use the computer and the Internet.

Increasingly, Internet service providers face pressure to find ways to offer affordable service packages that meet the needs of the broader public and particularly low-income households. The FCC's National Broadband Plan set a goal of ensuring that "affordable broadband is available everywhere and everyone has the means and skills to use valuable broadband applications". Among the many goals of the National Broadband Plan, at least 100 million U.S. homes should have affordable access to actual download speeds of 100 Mbps and actual upload speeds of at least 50 Mbps by 2020.

As Internet service providers strive for this goal, it is imperative to understand how to ensure that all households accept and use broadband Internet. Research shows that access to the Internet along with positive support for digital literacy and development of skills for using various resources available through the Internet will lead to each participant achieving important life-changing outcomes. However, this will depend on the extent to which each individual in the program perceives the relevance of the Internet, develops skills for living a part of his or her life in digital form via the Internet, and level of access. The acceptance and use of broadband Internet is very uneven across households in the US economy. Recent studies by the Joint Center for Political and Economic Studies, FCC, and NTIA report that the digital divide continues to separate who is using the Internet from those that are not based on income, education level, disability status and race/ethnicity.

For example, as seen in Figure 1, the Internet is emerging as a critical channel for information and medium for applying for

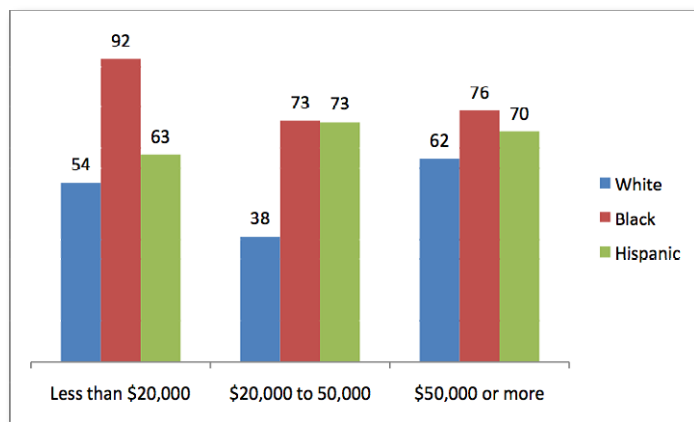


Figure 1 - Percentage of Population Using the Internet for Job Search by Income and Race, 2009;

Source: *National Minority Broadband Adoption*, Joint Center for Political and Economic Studies, March 2010

jobs. Increasingly, African-Americans and Hispanics, particularly living in low-income households rely heavily on the Internet to search for and to seek employment, especially lower-paying jobs.

This project will help UC2B to deepen its understanding of the barriers to the adoption of broadband among the residents of the targeted communities in Urbana-Champaign. As UC2B plans to construct the broadband network to serve neighborhoods that have traditionally been isolated in the digital divide, we observe that the demand for information and access to Internet services may be critically greater than expected due to the shift of employment opportunities, educational and health services online. This has a disproportionate impact on lower-income households, many of which comprise the neighborhoods in the 11-target census block served by the 12 fiber hubs.

Our goal is to serve the Urbana-Champaign community through this work for UC2B. The stakeholders in this initiative would like to deepen their understanding of the barriers to the adoption of broadband among the residents of the targeted geographic areas. The stakeholders would like to use this research to adjust their strategy for outreach, digital literacy development, computer purchasing and computer support. We will use a formative evaluation research approach to understand how well the implementation and progress of the program is unfolding, as well as to assess the overall success of the program. This approach is designed to provide information that can be used to modify or make other improvements to the broadband program as it is underway. This will help UC2B and its partners adjust the strategy for sustainable broadband adoption activities ranging from outreach, digital literacy development, computer purchasing and computer support.

We would like to ensure that the data collected for this evaluation is shared particularly among community stakeholders and local policy makers. We will build a web portal embedded with social media tools and a digital archive of UC2B information to facilitate knowledge sharing with the City of Urbana and City of Champaign. This will facilitate the development of innovations to improve the sustainable adoption of broadband.

DESCRIPTION OF OUTREACH MANAGEMENT PLAN

In this section, we offer specific details of the outreach management plan and evaluation of the social and economic impact of UC2B. We are proposing a 16-month project ending on January 31, 2013 that includes canvassing households, community anchor institutions and businesses residing in the 12 fiber hub service areas.

User Acceptance Study of Households and Community Anchor Institutions

In order to assist UC2B with the construction of the broadband network, our team will administer a survey through a door-to-door canvassing campaign to approximately 4,700 premises. The goals are threefold: 1) Identify households, community anchor institutions, businesses and other organizations that would like to receive broadband services; 2) Assess why these entities may be slow or not likely to adopt broadband and develop strategies to sustain the adoption of broadband; and, 3) Collect information to support the installation of the broadband service by identifying service preferences, equipment bundles for wired or wireless connections and identify connection points for the fiber from the curb to the home.

The community outreach ambassadors will organize as a canvassing team, with a canvassing coordinator and 12 canvassers to conduct in-person interviews through surveys delivered on Apple iPads. This is a labor-intensive process for collecting data and is very similar to the approach used to conduct the Census.

We estimate that the canvassers' total surveying efforts will accommodate two hours for each residential premise and three hours for each community anchor institution or business. The canvassers will have three service encounters with each premise:

1. Initial contact – conduct survey to learn about initial interest in receiving broadband service and information to assess digital literacy and computer needs
2. Installation contact – collect information to support installation process including connection locations at the premise and lateral connection layout from the curb to the premise; provide information about installation process and timing; answer questions
3. Post-installation contact – provide assistance with setting up computers and other devices, training for connecting to the Internet

Based on lessons learned from the July 2009 survey collection, we are improving the survey design by including a culturally sensitive data collection process. Through a participatory process, we will seek the involvement of neighborhood residents to design the survey questions, determine the data collection strategy, and to pretest the survey prior to entering the field. Community members in these targeted neighborhoods will be sought as potential canvassers. The study area includes a neighborhood with a high Spanish speaking population. We will translate the survey to Spanish. A group of canvassers will be multi-lingual and able to conduct the survey in Spanish. We will update the survey collection process and use survey applications designed for mobile

technology using the iPad. As an added benefit, this will create opportunities for community members to learn about surveys, mobile technologies and the acceptance of technology by users.

The survey will determine why individuals are reluctant to adopt broadband services and distinguish these barriers by the type of non-adopter (e.g. Digitally Distant, Digital Hopefuls, Digitally Uncomfortable, and Near Converts). We will also survey a sample of households in Urbana and Champaign outside of the target block groups at 6-month intervals.

Preliminary work is underway to update the canvassing survey that was administered in June-August, 2009. The revised canvassing survey will be submitted to the University of Illinois' Institutional Review Board (IRB) for approval, with aim to begin canvassing efforts in October 2011. According to University of Illinois policy, "any research involving living humans, human tissues or specimens, or humans' records or data that is conducted by any faculty, staff, student, employee or agent of the University of Illinois at Urbana-Champaign (UIUC), or otherwise conducted at or sponsored by the UIUC, requires IRB review" (<http://irb.illinois.edu/?q=investigator-handbook/part1.html#A>).

A project coordinator will be hired to lead the canvassing team, help develop the canvassing campaign, and manage the day-to-day operation of the canvassing campaign.

The canvassing coordinator is a full-time position for the duration of the UC2B project through January 31, 2013. The position requires knowledge and understanding of cross-cultural competency; strong organizational, leadership and interpersonal skills with demonstrated success working with intergovernmental partners; project management, survey research, and marketing experience.

Twelve persons will be hired to serve as community outreach ambassadors. The position is part-time with a pay rate of \$12-\$18 per hour. The key functions of the position include performing multiple survey methods to gain knowledge of community interest, adoption and satisfaction of high-speed broadband Internet access. The team members will be cross-trained to support other areas of the canvassing campaign including data preparation, installation support, customer support, marketing support, and training.

All of the positions will be hired through the University of Illinois, pending final approval. Representatives from the City of Champaign and City of Urbana will be consulted to develop the job description and hiring strategy. One of the hiring priorities is to recruit individuals that have an established kinship within the neighborhoods receiving the broadband service. Additional job advertising efforts will be made to these communities; as well, the University seeks opportunity to partner with local workforce development services to offer direct job application support to the community.

DEVELOPMENT OF INFORMATION SYSTEM

Our research team will develop a paperless information system to manage the data for this project. The system will integrate data collected through iPads in the field to a database wirelessly. We will build a knowledge management system using Sharepoint 2010 to permit collaboration among the team members. This web portal will support the construction process. It will also serve as a research support system that will permit users to access knowledge, information and data about the UC2B project. The goal of the system is combine data from multiple and disparate sources related to UC2B. This includes bringing together local knowledge, expert knowledge and official knowledge to create a system of collective intelligence about UC2B and its social and economic impact on the community and individuals. The system will promote collaboration to foster the exchange of ideas and to improve coordination of the construction process. This will permit all members of Urbana-Champaign community to participate in UC2B and in understanding its impact. The system will organize the data through a GIS interface and a data infrastructure to bring together data held by a wide range of stakeholders.

Components

- Sharepoint 2010
- ArcGIS 10
- iPads for field data collection
- Spatial data infrastructure of spatially referenced data
 - Census data from 1990, 2000, 2010 (when released)
 - Broadband mapping data from SBDD Mapping Program
- Digital Archive
 - Collection of UC2B materials
 - Links to GSLIS and University of Illinois community engagement projects related to digital inclusion in Urbana-Champaign
- Digital library
 - Serve as a clearinghouse of resources on digital inclusion and broadband adoption
 - Organize, store, search for map layers
 - Provide metadata on programs, activities and databases (other clearinghouses), and data layers
- Tools for data exchange to facilitate access to the data
- Social
 - Develop mechanisms to link data with organizations and citizens
 - Collaborate with stakeholders – Citizens, governments of Urbana, Champaign and Champaign county, State of Illinois, NGOs, universities and colleges – U of Illinois and Parkland College
 - Build capacities to use data and tools
- Integrate social media and social networking applications to build a community among users

EVALUATION RESEARCH DESIGN

The project includes evaluating the social and economic impact of UC2B. This is partially funded through additional grants. The research framework has three parts: the project, the people, and the community.

1. **The project.** What did the UC2B project actually do?
2. **The people.** What difference has UC2B made to individuals? Where are the innovations? What is the impact?
3. **The community.** What difference has UC2B made to local institutions? Where are the innovations? What is the impact?

The evaluation will analyze the impact of the broadband deployment on individuals and community anchor institutions served by UC2B in the targeted communities and the Urbana-Champaign region. Through this evaluation research study, our team will also develop deeper understanding of how to overcome the many barriers that limit the adoption and sustained use of broadband Internet services among individuals and community anchor institutions. There are three aspects to the question of UC2B and its social and economic impact.

1. **Baselines:** What is the state of things before UC2B is implemented?
2. **Innovations:** What new things, or new ways of doing old things, emerge among individuals or institutions in the local community?
3. **Metrics:** What specific measurements can make visible the changes that are expected from community rollout of broadband?

The research evaluation is also part of a separately funded grant that we received from the Partnership for a Connected Illinois and the University of Illinois Community Informatics Initiative.

The evaluation includes a study of community anchor institutions and the development of an archive of UC2B. The study is in partnership with Dr. Kate Williams, a professor from GSLIS. Professor Williams will develop case studies to provide in-depth information chronicling the transformation of community anchor institutions as they adopt broadband. Professor Williams and Professor Alkalimat will supervise the case studies, coordinated by a graduate student assistant, and carried out by 30-50 graduate students as their fall semester field work in two graduate community informatics courses at GSLIS.

Professor William's team will document the UC2B project and create a digital archive. While it might seem that in the digital age, files of all formats are archived as they are created, the fact is that saving and organizing the digital record of a multi-institutional project like UC2B requires active archival intervention starting from the time and place of creation of information to ensure its long-term preservation and usability by other than the original creator. The archive will be a critical resource for the UC2B project.

RESEARCH TEAM

The project leadership includes:

- Dr. Jon Gant, Project Director with over 20 years of expertise in public policy research and evaluation of the acceptance and use of new information and communication technologies; Co-author of *National Minority Broadband Adoption: Comparative Trends in Adoption, Acceptance, and Use*
- Dr. Maryalice Wu, Director of the ATLAS survey research service will lead a professional survey research team with extensive scientific expertise in neighborhood level data collection
- Marketing and Outreach Specialists
 - Safiya Noble and Miriam Sweeney, marketing specialists with 15 years of experience leading campaigns for Fortune 500 companies;
 - Ricardo Diaz, works to develop outreach models to Spanish-speaking communities and leads Hispanic outreach at UIUC
- LaEisha Meaderds Project Coordinator with 13 years of experience in program coordination, project management, and the implementation of diverse community engagement initiatives
- Technology and innovation team including:
 - Dr. Martin Wolske, Mobile Technology Advisor with over 20 years of experience studying the adoption of emerging technologies in underserved communities
 - Sunah Suh, Systems Analyst, Database Administrator and Programmer

Maryalice and Safiya designed and managed the UC2B Neighborhood Survey with volunteers in 2009. This survey provides important benchmarks about the demographic characteristics of computer use among households in the UC2B targeted service areas in Urbana and Champaign.

UC2B Canvassing to Support Construction, Construction Planning and Customer Acquisition

August 16, 2011 to August 15, 2012

Budget from UC2B

UC2B

Personnel

Grad Hourly - PhD Student Hourly 50% (1040 hours)	Programmer, Database Admin	20,280.00
Grad Hourly - Benefits		28.39
Masters students Stipend 50% Appointment	ATLAS Survey Support	18,113.00
Masters student benefits at 6.25% of stipend		1,132.06
Masters student stipend 25% Appt (Customer Aquis.)	GSLIS Personnel	9,057.00
Masters student benefits at 6.25% of stipend		566.06
Masters student stipend 25% Appointment (Mkting)	GSLIS Personnel	9,057.00
Masters student benefits at 6.25% of stipend		566.06

Management Team

Research Director - Jon Gant; 25%		30,874.00
Research Director - Jon Gant Benefits		13,266.56
Project Coordinator - 100% FTE @\$54,000		56,304.00
Project Coordinator - Benefits		24,193.83

Canvassing Support

Computer Server Tech. Supp. (Brynnen Owen 2 1/2%)	GSLIS Personnel	1,858.00
Computer Server Tech.Supp. (Brynnen Owen Benefits)		798.38
Canvassing Technology Tech. Supp.- Martin Wolske		4,371.00
Canvassing Tech. Tech. Supp.- Martin Wolske Benefits		1,878.22
Marketing and outreach services - Kim Schmidt 5%	GSLIS Personnel	3,100.00
Marketing and outreach services - Kim Schmidt Ben.		1,332.07
Marketing and outreach services - Cindy Ashwill 2%	GSLIS Personnel	1,500.00
Marketing and outreach services - Cindy Ashwill Ben.		644.55
Consultant on canvassing strategy - Ricardo Diaz	UIUC Personnel	3,500.00
Canvassers	UIUC Personnel To Be Hired	219,850.00

Supplies

Printing, Print materials and services, supplies		8,500.00
Software		1,000.00
Transportation for canvassing		11,000.00
Travel		2,500.00
Total		445,270.19

Math for UC2B Broadband Canvas

8/16/2011

	Households	Businesses	Institutions	Anchor
Canvas Total Hours	8,258	800	1,638	10,696
Follow-Up Total Hours	2,483	114	320	2,917
	10,741	914	1,958	13,613
Less Percent of Canvas for research (5%)				681
TOTAL HOURS FOR CANVAS				12,932
Average Rate for Canvas				\$ 17.00
TOTAL COST FOR CANVASSERS				\$ 219,844

Assumptions - From UC2B Planning Documents

# of Households	4,129
# of Businesses	200
# of Anchor Institutions	273
Avg Canvas Hours per Household	1
Avg Canvas Hours per Business	2
Avg Canvas Hours per Anchor Inst.	3
Members per Canvas Team - Households	2
Members per Canvas Team - Business	2
Members per Canvas Team - Anchor Inst.	2
# of weeks for canvas	13
# of Household Subscribers	2483
# of Business Subscribers	57
# of Anchor Subscribers	160
Avg Follow-Up Hours per Household Subscriber	1
Avg Follow-Up Hours per Business Subscriber	2
Avg Follow-Up Hours per Anchor Institution Subscriber	2
# of Team Members for all Follow-Up	1
Hours Works per Week per Person	32.5

	2000 Census Households	Percent of Total
Urbana	1,460	35.4%
Champaign	2,669	64.6%
Total	4,129	

	2000 Census Population	Percent of Total
Urbana	3,502	32.9%
Champaign	7,158	67.1%
Total	10,660	

Average Percentages

Urbana	34.1%
Champaign	65.9%

	Based on Average Percentages		
	Both	Urbana	Champaign
Total # of canvases & follow-up needed	32.2	11.0	21.2
# of just canvases	25.3	8.6	16.7
# of just follow-up	6.9	2.4	4.5



NTIA and Grant Update – 9/2/11

Due to a calendaring problem, I missed the planned call with NTIA last week. Teri and others were on the call and I am told it was short and uneventful. We learned this week that our Revised Environmental Assessment has been approved, so we are good to go with our lateral connections to the Anchor Institutions that are outside the FTTP areas and with our revised backbone ring routes. Everything else was already approved.

Other good news from this week is that all parties have now signed the Letter of Understanding between the cities and the University. That breaks a paperwork, financial and contractual logjam and clears the way for the start of construction next week.

Finally, NTIA has accepted our quarterly report for the second quarter. It is attached.

Assumptions and Questions Agenda Item – Now that we are moving full speed ahead, hiring a business consultant is back on the front burner. Attached to this report is a six-page list of 18 Assumptions and 21 questions that will help define the scope of work of that consultant. Those numbers are misleading, because many of the headings have multiple questions.

While I have had help in developing this document, I will take the blame for most of its contents. I may have listed some things as Assumptions that the Policy Board would prefer to move to the list of Questions that we want the consultant to address. There may also be additional questions that we want the consultant to address.

Please consider this a work in progress that will be shaped by the discussion on Wednesday next week and possibly by further discussions as well. Ultimately we need to define the areas we want the consultant to explore and the areas that we believe to be settled.

September 6th Groundbreaking Ceremony – You should all have received invitations by now. Both Mayors, Interim Chancellor Easter and Ryan Croke from Governor Quinn's office are all slated to make short remarks and then we will all pose for the official photo. Please bring your shovels, hard hats and a smile next Tuesday.

Technology Demos – Adtran will be sending demo equipment with two of their engineers for our September 15th technology demo. Two CITES employees will be returning from Adtran training on the 16th and will run the equipment for the demo on the 17th.

Revised Environmental Assessment – Has been approved.

Construction Update – Both Contactors have started regular local meetings with the cities and Shive-Hattery and are staging equipment, materials and staff in preparation for the beginning of construction next week. Urbana will get off to a small head start, but the Champaign contractor plans to have twice as many crews here once everything gets rolling.

With the delays in getting the contactors hired, and with the shortage of fiber cable, it is realistically looking like the first customers in both cities will be brought on line in February or March - depending on the weather. It is possible that we will have a “soft launch” for a small number of “beta” sites before then, but in terms of setting public expectations the February/March timeframe is probably realistic.

Urbana has created two documents that will be used as door-hangers in the areas where construction will be happening. One version is aimed at residents and businesses that are in the FTTP construction areas. The other is aimed at residents and businesses that will have UC2B rings fiber happening in their neighborhood, but are outside the grant-funded FTTP areas. Both of those flyers were scheduled to be “hung” this week and are also attached to this report.

Urbana Open House – On Wednesday the 31st of August, Urbana sponsored an open house at King School, where for 3 hours Urbana residents, business owners and Anchor Institution staff could come and learn about UC2B. The event itself was not well attended by the general public, but there were some good discussions, and some useful documents created for the event. Those included a more general Urbana Public Works / UC2B flyer, a project map with all the Anchor Institutions and IRU sites listed and shown, and a document titled “12 things to know about UC2B”. They are all attached as well.

Save the Date – The plans for the Central Illinois Broadband Summit have not changed since my last report. On the morning of October 12th, there will be a gathering of all the researchers in the state who are studying various broadband projects.

The afternoon of the 12th will be the BTOP project presentations sponsored by the Partnership for a Connected Illinois. The morning of the 13th will be a meeting of the Illinois Broadband Development Council. All of these sessions are now slated for the auditorium in the NCSA building – just south of the University’s parking deck on University Avenue.

See you on Tuesday.

Mike

QUARTERLY PERFORMANCE PROGRESS REPORT FOR BROADBAND INFRASTRUCTURE PROJECTS

General Information

<p>1. Federal Agency and Organizational Element to Which Report is Submitted</p> <p>Department of Commerce, National Telecommunications and Information Administration</p>	<p>2. Award Identification Number</p> <p>NT10BIX5570044</p>	<p>3. DUNS Number</p> <p>041544081</p>
---	--	---

4. Recipient Organization

University of Illinois 506 S. Wright St.
364 Henry Admin. Bldg., Urbana, IL 61801-3620

<p>5. Current Reporting Period End Date (MM/DD/YYYY)</p> <p>06-30-2011</p>	<p>6. Is this the last Report of the Award Period?</p> <p><input type="radio"/> Yes <input checked="" type="radio"/> No</p>
---	--

7. Certification: I certify to the best of my knowledge and belief that this report is correct and complete for performance of activities for the purposes set forth in the award documents.

<p>7a. Typed or Printed Name and Title of Certifying Official</p>	<p>7c. Telephone (area code, number and extension)</p>
	<p>7d. Email Address</p>

<p>7b. Signature of Certifying Official</p>	<p>7e. Date Report Submitted (MM/DD/YYYY):</p>
--	---

Project Indicators (This Quarter)

1. Please describe significant project accomplishments completed during this quarter (600 words or less).

The most significant accomplishment of this quarter was the release of the RFPs for our three construction bid packages. The combined total of the three low bids exceeded our budget, so at the end of the quarter we were in negotiations with the apparent low bidders on changes to the specifications that would allow them to reduce their costs and pass those savings onto the project. We believe we were able to find ways to cut costs that did not negatively impact the overall scope or purposes of our project.

We have also filed a request for an amended Environmental Assessment to take into account some small route changes that were made during the fiber engineering process. Approvals were pending with Fish and Wildlife as well as the Illinois Historical Preservation Agency at the end of the quarter.

The RFP winner for the UC2B Fiber-to-the-Premise (FTTP) electronics was approved both by the University of Illinois Board of Trustees as well as the State of Illinois procurement office. The vendor has a major hardware/software release scheduled for August 21st, so we will wait until then to purchase this equipment. In the meanwhile we are making arrangements to have demo equipment shipped to us so that our network engineers can become more familiar with it. We are also planning for two community forums at which we will demonstrate this technology.

We have also begun work on an RFP to procure a fiber management system. That RFP will most likely be released in the next quarter. We have also started work on the design of the database that will be used to track the door-to-door canvass of the 4,650 households and 200 businesses in our FTTP areas.

2. Please provide the percent complete for the following key milestones in your project. Write "0" in the Percent Complete column and "N/A" in the Narrative column if your project does not include this activity. If you provided additional milestones in your baseline plan, please insert them at the bottom of the table. Unless otherwise indicated in the instructions, figures should be reported cumulatively from award inception to the end of the most recent reporting quarter. Please provide a narrative description if the percent complete is different from the target provided in your baseline plan (300 words or less).

	Milestone	Percent Complete	Narrative (describe reasons for any variance from baseline plan or subsequent written updates provided to your program officer)
2a.	Overall Project	6	Our baseline projected 45%, which was based on getting a lot of construction completed this summer. Due to the delays in completing our detailed fiber design and in hiring our construction contractors, construction will not begin until the 3rd quarter of 2011. We expect to complete our overall project in January of 2013.
2b.	Environmental Assessment	100	Complete
2c.	Network Design	100	Complete
2d.	Rights of Way	80	Baseline projected 100%. All of our IDOT ROW permits are complete. We still lack several private easements. Those will be negotiated in the 3rd quarter as soon as our construction contracts are finalized.
2e.	Construction Permits and Other Approvals	80	Baseline Projected at 100%. All but two of our railroad crossing permits are complete. The railroad has been short-staffed due to the flooding along the Mississippi River. We expect to secure all construction permits and approvals in September of 2011.
2f.	Site Preparation	0	Baseline projected at 100%. Due to the delays in completing our detailed fiber design and in hiring our construction contractors, construction will not begin until the 3rd quarter. We expect to spend all of these site construction dollars by the end of the 4th quarter of 2011.
2g.	Equipment Procurement	10	Baseline projected at 60%. While the RFP winner for the UC2B FTTP electronics was approved both by the University of Illinois Board of Trustees as well as the State of Illinois procurement office, the vendor has a major hardware/software release scheduled for August 21st, so we will wait until then to begin purchasing this equipment. We will buy much of this equipment up-front to bring up the core network in the 4th quarter of 2011. However, the equipment that resides at a customer location and the core components that connect directly to the customers' equipment will be purchased on an as-needed basis. There is typically a one or two year warranty on the customer equipment, which starts when it is purchased, not when it is installed. If we purchase the customer equipment too far ahead of time, we use up too much of the warranty

	Milestone	Percent Complete	Narrative (describe reasons for any variance from baseline plan or subsequent written updates provided to your program officer)
			before it is ever deployed. We expect to purchase the last of this customer-specific equipment in the 4th quarter of 2012.
2h.	Network Build (all components - owned, leased, IRU, etc)	1	Baseline projection was 30%. Construction has been delayed by the length of time it took for the Environmental Assessment, the fiber engineering and completing the RFP process for our construction contractors. We underestimated all three in our baseline plan. The final Network Build will be completed in January of 2013.
2i.	Equipment Deployment	0	Baseline projection was 60%. Equipment Deployment has been delayed by the length of time it took for the Environmental Assessment, the fiber engineering and completing the RFP process for our construction contractors. We underestimated all three in our baseline plan. We will be installing customers through January of 2013, so the final date for equipment deployment will be January 31, 21013.
2j.	Network Testing	0	Baseline projection was 25%. Network Testing has been delayed by the length of time it took for the Environmental Assessment, the fiber engineering and completing the RFP process for our construction contractors. We underestimated all three in our baseline plan. We projected Network testing to be complete by the 2nd quarter of 2012. It seems likely that the actual date will be late in the 3rd quarter or early in the 4th quarter of 2012 instead.
2k.	Other (please specify):	0	N/A

3. To the extent not covered above, please describe any challenges or issues faced during this past quarter in achieving planned progress against the project milestones listed above. In particular, please identify any areas or issues where technical assistance from the BTOP program may be useful (600 words or less).

Our primary challenge in the last quarter was that the low bids for our three construction packages totaled more than we have budgeted or available. As was detailed above, we entered into a "Value Engineering" process with the two apparent low bidders. At the end of the quarter it looked likely that we would be able to drive enough cost from the construction to meet our budget without negatively impacting the scope or goals of our project.

4. Please report the following information regarding network build progress. Write "0" in the Total column and "N/A" in the Narrative column if your project does not include this activity. Unless otherwise indicated in the instructions, figures should be reported cumulatively from award inception to the end of the most recent reporting quarter. Please provide a narrative description if the total is different from the target provided in your baseline plan (600 words or less).

Indicator	Total	Narrative (describe your reasons for any variance from the baseline plan or any other relevant information)
New network miles deployed	0	Baseline projected 56.45 miles. Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction by about a full quarter. We expect to get caught up to our baseline projection in the 3rd quarter of 2012.
New network miles leased	0	N/A
Existing network miles upgraded	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction by about a full quarter. We will be purchasing some existing fiber and conduit infrastructure and will either be installing larger fiber cables, or lighting more of the existing strands. We expect to get caught up to our baseline projection in the 3rd quarter of 2012.
Existing network miles leased	0	N/A
Number of miles of new fiber (aerial or underground)	0	Baseline projected 56.45 miles. Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in

Indicator	Total	Narrative (describe your reasons for any variance from the baseline plan or any other relevant information)
		starting construction by about a full quarter. We expect to get caught up to our baseline projection in the 3rd quarter of 2012.
Number of new wireless links	0	N/A
Number of new towers	0	N/A
Number of new and/or upgraded interconnection points	0	Baseline projected 198 interconnection points. Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction by about a full quarter. We expect to get caught up to our baseline projection in the 3rd quarter of 2012.

For questions 5 and 6 please include information relating to agreements that you are negotiating or have entered into, or that your sub recipient, contractor or subcontractor is negotiating or entered into.

5a. If applicable, please provide the following information with regard to agreements with broadband wholesalers and/or last mile providers as a result of your project.

Indicators	
Number of signed agreements with broadband wholesalers or last mile providers	0
Number of agreements currently being negotiated with broadband wholesalers or last mile providers	0
Average term of signed agreements (in quarters)	0

5b. Please list the names of the wholesale and last mile providers with whom you have signed agreements (100 words or less). Providers: We have not signed any wholesale or last mile provider agreements yet. We have concentrated all of our efforts thus far in getting construction started. Until we have fiber in the ground we cannot reasonable expect any wholesale or last-mile provider to be serious about negotiating or entering into agreements with us. This activity will pick up speed in the 3rd and 4th quarters of this year.

5c. What wholesale services are being provided by this project? Please describe below. As an attachment to this report, please provide pricing plans (in \$ per month) associated with each wholesale service provided by your product (100 words or less). Wholesale services description: We will provide layer-two transport services, which are often referred to as Metro Ethernet. We will also offer dark fiber services. We have several commitments for 20-year dark fiber IRUs, but have not completed those contracts yet. We may also offer shorter term dark fiber leases. Attached are our proposed pricing plans for layer-two transport and 20-year dark fiber IRUs.

5d. If you have designated a third party to operate all or a portion of your network, please provide the name and contact information for this third party, indicate if this entity is a sub recipient, contractor, and/or subcontractor, and describe with specificity the portion of your network this this third party operates (600 words or less). We have not designated a third party to operate any portion of our network.

6. Please provide the data according to the type of subscriber. Write "0" in the Total column and "N/A" in the Narrative column if your project does not pass or serve a particular subscriber type. Unless otherwise indicated in the instructions, figures should be reported cumulatively from award inception to the end of the most recent reporting quarter. Please provide a narrative description if the total is different from the target provided in your baseline plan (300 words or less).

Subscriber Type	Access Type	Total	Narrative (describe your reasons for any variance from the baseline plan or any other relevant information)
Broadband Wholesalers or Last Mile Providers	Providers with signed agreements receiving new access	0	Baseline projected 1 provider with new access. Because we have not connected any providers yet we are behind in this category. Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction by about a full quarter. We expect to be caught up with our baseline projection in this area by the end of the 4th quarter of 2011.
	Providers with signed agreements receiving improved access	0	Baseline projected 3 providers with improved access. Because we have not connected any providers yet we are behind in this category. Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction by about a full

Subscriber Type	Access Type	Total	Narrative (describe your reasons for any variance from the baseline plan or any other relevant information)
			quarter. We expect to be caught up with our baseline projection in this area by the end of the 4th quarter of 2011.
	Providers with signed agreements receiving access to dark fiber	0	The baseline did not include a projection for dark fiber customers.
	Please identify the speed tiers that are available and the number of subscribers for each	5	There will be two levels of customer connectivity - 100 Mbps and 1 Gbps, and three levels of provider connectivity - dual 1 Gbps connections, dual 2 Gbps connections and dual 10 Gbps connections to our network core. See the attached chart of wholesale services and speed tiers for customer and provider connections.
Community Anchor Institutions (including Government institutions)	Total subscribers served	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any Anchor Institutions. We will serve our first Anchor Institutions in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Subscribers receiving new access	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any Anchor Institutions. We will serve our first Anchor Institutions in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Subscribers receiving improved access	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any Anchor Institutions. We will serve our first Anchor Institutions in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Please identify the speed tiers that are available and the number of subscribers for each	5	There are five levels of Anchor Institution connectivity. They are detailed on the attached chart of retail services. All levels have 1 Gbps connections to the UC2B Intranet. The Internet bandwidth is tiered from 5 Mbps to 40 Mbps. All connections are symmetrical.
Residential / Households	Entities passed	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any households. We will pass our first residences in the 3rd quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Total subscribers served	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any households. We will serve our first residences in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Subscribers receiving new access	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any households. We will serve our first residences in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Subscribers receiving improved access	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any households. We will serve our first residences in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Please identify the speed tiers that are available and the number of subscribers for each	5	There are five levels of residential connectivity. They are detailed on the attached chart of retail services. All levels have 1 Gbps connections to the UC2B Intranet. The Internet bandwidth is tiered from 5 Mbps to 40 Mbps. All connections are symmetrical.
Businesses	Entities passed	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any businesses. We will pass our first businesses in the 3rd quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.

Subscriber Type	Access Type	Total	Narrative (describe your reasons for any variance from the baseline plan or any other relevant information)
	Total subscribers served	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any businesses. We will serve our first businesses in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Subscribers receiving new access	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any businesses. We will serve our first businesses in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Subscribers receiving improved access	0	Our detailed fiber engineering and our construction bidding have taken longer than we estimated in our baseline plan. We are therefore behind in starting construction and serving any businesses. We will serve our first businesses in the 4th quarter of 2011. We will get back on our baseline plan in the 3rd quarter of 2012.
	Please identify the speed tiers that are available and the number of subscribers for each	5	There are five levels of business connectivity. They are detailed on the attached chart of retail services. All levels have 1 Gbps connections to the UC2B Intranet. The Internet bandwidth is tiered from 5 Mbps to 40 Mbps. All connections are symmetrical.

7. Please describe any special offerings you may provide (600 words or less).
 All of our customers will have 1 Gbps symmetric Intranet connectivity to each other, and to all local Community Anchor Institutions. While Internet connectivity will be sold in tiers of bandwidth, UC2B Intranet connectivity will be limited only by the port speed of the customer's Optical Network Terminal (ONT), which will be 1 Gbps. This is very similar to the service model deployed by Lafayette, Louisiana in their Fiber-to-the-Premise system.

We are also considering layering a community-wide Wi-Fi service on top of the private Wi-Fi SSID that each of our customers will have. UC2Bnet Wi-Fi service would be available anywhere that there was UC2B service and would use the existing Wi-Fi equipment. UC2B fiber customers and "Wi-Fi only" UC2B service could access the UC2Bnet wireless service wherever they can get the signal. As UC2B subscriber locations grow, the UC2Bnet Wi-Fi signal will be available in ever increasing areas throughout the community. UC2B "Wi-Fi only" customers would pay a monthly fee that would be less than the lowest rate that a fiber-connected customer pays, and would have access to less Internet bandwidth. Wi-Fi only customers would still have connectivity to all UC2B-connected Community Anchor Institutions and customers at the full speed of their wireless adapter.

8a. Have your network management practices changed over the last quarter? Yes No

8b. If so, please describe the changes (300 words or less).
 N/A

9. Community Anchor Institutions:
 Using the table below, please provide a list by service area of the community anchor institutions (including Government institutions) connected to your network as a result of BTOP funds. Figures should be reported for the most recent reporting quarter only (NOT cumulatively). Also indicate whether your organization is currently providing broadband service to the anchor institution. Finally, provide a short narrative description with examples of how institutions are using BTOP-funded infrastructure (300 words or less).

Institution Name	Service Area (town or county)	Type of Anchor Institution (as defined in your baseline)	Are you also the broadband service provider for this institution? (Yes / No)	Narrative description of how anchor institutions are using BTOP-funded infrastructure
none	N/A	N/A	N/A	N/A

Project Indicators (Next Quarter)

1. Please describe significant project accomplishments planned for completion during the next quarter (600 words or less).
 We have our negotiated fiber construction contracts queued up to be approved by the City of Urbana and the City of Champaign city councils the first week in August. That will set the stage for fiber construction to begin later in August or in early September. We will stage construction so that we can get a maximum number of Community Anchor Institutions throughout the community as well as

households and businesses in our eleven underserved Census Block Groups connected this calendar year. We will not be able to complete all fiber construction this calendar year, but we will seek to optimize the results we get from what we can accomplish before the ground freezes.

2. Please provide the percent complete for the following key milestones in your project. Write "0" in the Planned Percent Complete column and "N/A" in the Narrative column if your project does not include this activity. If you provided additional milestones in your baseline plan, please insert them at the bottom of the table. Unless otherwise indicated in the instructions, figures should be reported cumulatively from award inception to the end of the next reporting quarter. Please provide a narrative description if the percent complete is different from the target provided in your baseline plan (300 words or less).

	Milestone	Planned Percent Complete	Narrative (describe reasons for any variance from baseline plan or any other relevant information)
2a.	Overall Project	20	Baseline Projection was 75%. All milestones that are projected to be behind are due to the unplanned-for length of time required by the Environmental Assessment, and then the delays in completing our fiber engineering and the delays in hiring our fiber construction contractors. We are now past all of those delays and construction will begin with a great deal of urgency in the 3rd quarter. The 20% projection is based on the projection of spending 19.94% of our total project budget, not just our federal grant. We are currently top heavy with local matching expenditures, so just measuring the federal spend against the federal grant is not a true representation of where we will be.
2b.	Environmental Assessment	100	Complete
2c.	Network Design	100	Complete
2d.	Rights of Way	100	Complete
2e.	Construction Permits and Other Approvals	100	Complete
2f.	Site Preparation	80	Baseline Projection was 100%. All milestones that are projected to be behind are due to the unplanned-for length of time required by the Environmental Assessment, and then the delays in completing our fiber engineering and the delays in hiring our fiber construction contractors. We are now past all of those delays and construction will begin with a great deal of urgency in the 3rd quarter. This milestone category will be caught up by the end of the 4th quarter of 2011.
2g.	Equipment Procurement	50	Baseline Projection was 70%. All milestones that are projected to be behind are due to the unplanned-for length of time required by the Environmental Assessment, and then the delays in completing our fiber engineering and the delays in hiring our fiber construction contractors. We are now past all of those delays and construction will begin with a great deal of urgency in the 3rd quarter. Equipment procurement has been further delayed by a conscious decision to wait until after August 21st when the FTTP electronics vendor will be releasing upgraded software and hardware. We will buy much of this equipment up-front to bring up the core network in the 4th quarter of 2011. However, the equipment that resides at a customer's location and the core components that connect directly to the customers' equipment will be purchased on an as-needed basis. There is typically a one or two-year warranty on the customer equipment, which starts when it is purchased, not when it is installed. If we purchase the customer equipment too far ahead of time, we use up too much of the warranty before it is ever deployed. We expect to purchase the last of this customer-specific equipment in the 4th quarter of 2012.
2h.	Network Build (all components - owned, leased, IRU, etc.)	10	Baseline projection was 69%. All milestones that are projected to be behind are due to the unplanned-for length of time required by the Environmental Assessment, and then the delays in completing our fiber engineering and the delays in hiring our fiber construction contractors. We are now past all of those delays and construction will begin with a great deal of urgency in the 3rd quarter. We expect to conform to the projections in our baseline by the 3rd quarter of 2012. The final Network Build will be completed in January of 2013.
2i.	Equipment Deployment	50	Baseline projection was 70%. All milestones that are projected to be behind are due to the unplanned-for length of time required by the Environmental Assessment, and then the delays in completing our fiber engineering and the delays in hiring our fiber construction contractors. We are now past all of those delays and construction will begin with a great deal of urgency in the 3rd quarter. Equipment deployment has been further delayed by a conscious decision to wait until after August 21st when the FTTP electronics vendor will be releasing upgraded software and hardware. We do not expect to get back on track with our baseline projections until the 1st quarter of 2013, which is the end of our project.

	Milestone	Planned Percent Complete	Narrative (describe reasons for any variance from baseline plan or any other relevant information)
2j.	Network Testing	0	Baseline projection was 60%. All milestones that are projected to behind are due to the unplanned-for length of time required by the Environmental Assessment, and then the delays in completing our fiber engineering and the delays in hiring our fiber construction contractors. We are now past all of those delays and construction will begin with a great deal of urgency in the 3rd quarter. We projected Network testing to be complete by the 2nd quarter of 2012. It now seems likely that the actual date will be late in the 3rd quarter or early in the 4th quarter of 2012 instead.
2k.	Other (please specify):	0	N/A

3. Please describe any challenges or issues anticipated during the next quarter that may impact planned progress against the project milestones listed above. In particular, please identify any areas or issues where technical assistance from the BTOP program may be useful (600 words or less).

Like many BTOP projects, we are concerned about the availability of fiber-optic cables. Our contractors will be providing their own materials and in the next quarter we will learn of what they have available to them and what we may have to wait on. It is possible that we will be able to complete most of our conduit infrastructure this calendar year, but may need to wait until 2012 to have access to fiber in the lengths and strand-counts we need. If we lack access to the fiber we need, it will negatively impact our equipment deployment as well as our network testing line items, not to mention providing services.

We will have two prime fiber installation contractors on this project working in different parts of the community. It is possible that each will have upwards of 20 boring crews here at the same time. Those 30-40 crews could be quite a burden for the local J.U.L.I.E. underground utility locate crews. The Public Works departments of both cities are working on ways to coordinate the locates and keep the locators a step ahead of the contractors.



**An “Incomplete List” of Assumptions and Questions
For the UC2B Policy Board and Business Plan Consultant**

version #4

Assumptions:

A1. The parties to the UC2B Intergovernmental Consortium Agreement will move forward with revisions to that Agreement that reflect the language of the Letter of Understanding (LOU) signed by all parties in August and September. That Letter designates the City of Champaign as the Lead Agency for UC2B Operations and reaffirms that the University will administer the NTIA and DCEO grants and manage the UC2B construction and related activities funded by those grants.

A2. The LOU also specifies that University personnel will manage the UC2B core electronics in the UIUC nodes and in the 12 neighborhood equipment cabinets for a period of two years starting with the commencement of UC2B retail services. It further specifies that University personnel will not support the fiber infrastructure, the UC2B equipment in customer locations or those UC2B customers.

A3. The UC2B Consortium will contract with third parties to do utility locates.

A4. The UC2B Consortium will contract with third parties to do fiber maintenance and repair once the UC2B fiber has been accepted. The fiber will be accepted in sections as they are complete, rather than all at once at the end of the project.

A5. From now until the end of the first phase of grant-funded construction (the 7 backbones rings, Community Anchor Institution laterals to the curb and the fiber-to-the-curb in the designated Census Block Groups) UC2B will not construct any additional lateral connections or fiber-to-the-curb areas (other than possibly the list of “additional” Anchor Institutions.) While we will encourage and facilitate discussions and planning on how to expand UC2B services beyond the grant-funded locations and areas, any additional construction will only be after the grant-funded first construction phase is complete.

A6. In September, the University will issue an RFP for a fiber management system for UC2B.

A7. In October, the UC2B Intergovernmental Consortium will issue an RFP for the construction of fiber from the curbs into the buildings, inside wiring and UC2B FTTP equipment installation and configuration for 247 identified “original” Anchor and IRU locations and approximately 2,450 other households and businesses to be determined by the door-to-door canvas and other customer acquisition activities. The City of Champaign as the lead agency for UC2B operations, will issue this bid request as per its procurement policies. The prevailing wage requirements of the Davis-Bacon Act will apply to this work.

A8. The University will facilitate and fund the purchase of up to 1 Gbps of tier one Internet connectivity through its existing competitively bid contracts and deliver it to UC2B core routers in UIUC Nodes 8 and 9 for a period of five years starting with the commencement of UC2B retail services. The purchase of any equipment specifically required to deliver this bandwidth will be funded by the BTOP grant. All public IP addresses associated with UC2B services will be registered to UC2B, not the University of Illinois.

A9. The University will purchase routers, switches and core network servers for UC2B through existing competitively bid contracts that the University either holds or has access to. As with **A8** (above) this will allow UC2B to benefit from the discounts that the University has already secured based on purchasing relatively much larger quantities of these items than UC2B will need.

A10. UC2B will initially be in the retail Internet service business, and only that retail business. To avoid making the necessary capital investments and to avoid the associated regulatory oversight, UC2B will not directly offer television or telephone services. UC2B will also not provision or host email, web sites or on-line storage. For all retail services other than Internet connectivity, UC2B will depend on others, (typically from the private sector) to provide those retail services. It is expected that others will offer competing Internet connectivity services as well, both as a component of a bundle of services and also as a stand-alone service.

A11. All customer connections to the UC2B network will be at least 1 Gbps symmetrical at the physical layer. Rate limiting at data and network layers will be used to control access to Internet bandwidth and layer two services, but UC2B retail customer locations will almost always have at least 1 Gbps of connectivity at the physical layer to each other. (See the one limitation to this in **A15** below.)

A12. As promised in our initial grant application and in subsequent Due Diligence discussions with NTIA, through the end of the period during which the University will provide funding for up to 1 Gbps of Internet access (5 years from the commencement of retail UC2B services), UC2B will deliver an Internet service priced at \$19.99 per month that will provide at least 5 Mbps of symmetric Internet connectivity and 1 Gbps of symmetric UC2B Intranet connectivity. Tiers of Internet connectivity with more Internet bandwidth will also be offered at higher - yet to be determined - monthly rates.

A13. UC2B will enter into Indefeasible Rights of Use (IRU) contracts with the entities identified in the BTOP grant application that committed to purchasing IRU's via signed letters of intent. Additionally, UC2B will enter into IRU's with Champaign County, the Illinois Department of Transportation (IDOT), and potentially the Illinois Department Central Management Services (CMS). All of these IRU's will be priced for fiber strands on entire rings. Nothing less than two strands of fiber on an entire ring will be included in an IRU agreement. NTIA rules will require UC2B to make dark fiber available to other entities, but UC2B is not required to offer those other entities IRU agreements. It would be acceptable to NTIA if UC2B offered dark fiber via a monthly rental fee instead via an IRU, which is typically pre-paid for a period of 20 years.

A14. UC2B will require all providers of services on the UC2B network to locally peer to UC2B and to each other using BGP-4 or successor protocols. UC2B will not peer with service providers that seek to avoid UC2B service provider connection fees through local peering.

A15. Service providers that wish to offer services over the UC2B network must redundantly connect to the UC2B network core and pay the established rates for those service provider connections. UC2B ring fiber strands will be made available to facilitate those redundant service provider connections. The costs for using that UC2B ring fiber are included in the proposed service provider connection charges. Other than hosting subscription web sites, retail and retail service providers will not be allowed to offer retail services to UC2B customers from a non-redundant UC2B fiber-to-the-premise connection.

A16. Whether through the facilities of the City of Champaign or through the facilities of a service provider that may be hired to run the day-to-day operations of UC2B, there will be at least one physical location in Champaign-Urbana where UC2B retail customers can go in person during regular business hours and pay their UC2B monthly charges in cash, by check or with a credit card.

A17. The Urbana-Champaign Big Broadband Intergovernmental Consortium will retain that name and continue to use the "UC2B" acronym as it moves forward. The existing UC2B logo and color scheme will also be used through at least the end of the University's provision of up to 1 Gbps of Internet connectivity – which will be 5 years from the commencement of retail UC2B services.

A18. It is in UC2B's best interest and the best interest of the community for UC2B to identify the 2,700 households, businesses and Anchor Institutions from within the approximate 5,000 possible eligible sites for grant-funded installation, that want UC2B service and are the most likely to be willing and able to pay their monthly UC2B service charges. The worst possible outcome would be for UC2B to use its grant funding to install fiber into 2,700 locations that are unwilling or unable to pay their monthly UC2B service charges. Sensitively identifying and enrolling those desirable customers will be a challenge, and the answers to many of the questions below will impact that process.

Organizational Structure Questions:

OSQ1. Is the existing Intergovernmental Consortium the optimal legal structure for UC2B going forward? Is it optimal for operations? Is it optimal for funding expansion? Is it optimal for the comfort level of the two City Councils? Is it optimal for legal liability?

OSQ2. Will UC2B have employees beyond a General Manager, or will it outsource the day-to-day operational and support activities? If the operations will be outsourced, what is the optimal process for finding a vendor to perform the day-to-day operational tasks necessary to provide fiber-based services?

OSQ3. Will UC2B rely on the City of Champaign for functions such as accounting, legal, and billing as METCAD does, or will the city's role be more in support of the UC2B Policy Board and not the day-to-day operations of UC2B?

Operational, Services and Financial Questions:

OSFQ1. Beyond the \$19.99 base service, what should the retail pricing be for additional tiers of symmetric bandwidth? How much symmetric Internet bandwidth should be included in the \$19.99 service? Are the tiers and pricing currently approved by NTIA appropriate to start with? How does the existence of the \$600,000 start-up-fund impact the minimum price point needed for UC2B to be sustainable? Could that base service become \$17.99 or \$15.99 a month?

OSFQ2. What should the pricing be for layer-two (private VLAN/Metro-Ethernet) services? Are the connectivity levels and the pricing currently approved by NTIA appropriate to start with?

OSFQ3. What should UC2B charge service providers who wish to deliver their services over the UC2B network? Are the service levels and pricing currently approved by NTIA appropriate to start with?

OSFQ4. Will UC2B require a deposit (for equipment, for service or for both?) when customers sign up for grant-funded UC2B service installation? If there will be a required deposit, how much should that deposit be? Is that deposit tied to the on-site customer equipment and cabling, the UC2B service or both?

OSFQ5. Will UC2B require customers to sign a contract for a certain length of time when they sign up for grant-funded installation of UC2B fiber? If they must sign a contract, for how long should that contract be? What are the penalties for failing to live up to the contract? Would it be the loss of the service portion of the deposit if at least the equipment were returned? Would it be the loss of the entire deposit if the equipment were not returned?

OSFQ6. If a retail customer becomes delinquent in paying his or her bill for UC2B services, what will the remedies be? Cessation of all services? Cessation of just Internet service? A graduated penalty of some sort?

OSFQ7. If a service provider becomes delinquent in paying its bill for using the UC2B network to deliver its services, what will the remedies be?

OSFQ8. Will UC2B pre-cable apartment buildings with internal hallways in the designated FTTP Census Block Groups with “fiber-in-the-hall”?

OSFQ9. Assuming that the ShadowWood Mobile Home Park owner is agreeable, will UC2B pre-cable fiber-to-the curb in that private development.

OSFQ10. If the ADTRAN gateway hardware will support it, do we want to require UC2B customers to provide a second (community-wide) Wi-Fi SSID from every UC2B gateway? Does it make sense for UC2B to provide a \$10.00 per-month, \$5.00 per-week, \$1.00 per-day UC2Bnet Wi-Fi service that has highly automated sign-up and provisioning?

OSFQ11. Should UC2B pursue the Internet Archive’s offer of free design, equipment and installation for a community-wide wireless-to-the-building solution? Or should UC2B concentrate on just fiber-based “last-mile” solutions and the proposed low-cost community Wi-Fi service?

OSFQ12. As all UC2B customers will by definition have Internet connectivity, can UC2B totally rely on email-based billing to save postage and handling? Should UC2B encourage on-line payments to the extent possible?

OSFQ13. Will Champaign, Urbana, Savoy, Champaign County or the University of Illinois charge UC2B an ongoing fee for the use of their respective rights-of-way? If there is a ROW fee, what will it be based on for each entity? How would such a fee be presented on UC2B bills? Would it be listed as an extra “tax” or “fee” on top of the UC2B Internet service charge? Or would it be incorporated into UC2B monthly service charge?

OSFQ14. Will Champaign, Urbana, Savoy, Champaign County or the University of Illinois charge any of the entities with UC2B fiber IRU’s an ongoing fee for the use of their respective rights-of-way? If there is a ROW fee, what will it be based on for each entity? Will the UC2B IRU and fiber maintenance agreements specify that those ROW fees will be paid by UC2B?

OSFQ15. Is there some mechanism other than ROW fees by which Champaign, Urbana, Savoy, Champaign County or the University of Illinois could charge UC2B or any of the service providers on the UC2B network a local tax or fee that is based on their local sales.

OSFQ16. Can Champaign, Urbana, Savoy or Champaign County require UC2B to enter into some sort of franchise agreement in order to provide services in their respective areas? If they can, should they or will they?

OSFQ17. What are the 2 or 3 most promising models for UC2B to explore to finance the expansion of FTTP services throughout the community after the grant-funded areas have been built? What are the advantages and disadvantages of each model?

OSFQ18. Should UC2B enter into any additional IRU agreements? If UC2B were to enter into any IRU agreements beyond what have already been discussed, should the rates per-strand-mile and for fiber maintenance be the same as in the original IRU agreements, or more?

OSFQ19. What should UC2B's monthly rates be for dark fiber rental?



Public Works Department
706 South Glover Avenue
Urbana, IL 61801
(217) 384-2342
FAX (217) 384-2400

September 2011

**RE: Urbana Champaign Big Broadband (UC2B)
Construction Project**

Dear Resident/Business Owner:

Construction of a new fiber optic (broadband) network will begin in the City of Urbana and Urbana Township within the next few weeks.

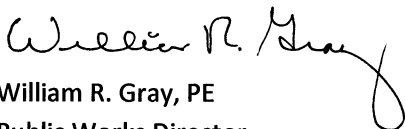
During construction the contractor will install small plastic pipes underground that will later be used as a pathway for fiber optic cables. The size of the plastic pipes is one and a quarter inches in diameter. On the surface the contractor will install junction boxes that will serve as access points to the fiber optic network. Connection to the fiber optic network by residents and businesses will occur under a separate contract at a later date. For now, the work you will see is the installation of the backbone or lateral lines of the system.

The contractor for the project is John Burns Construction Company from Orland Park, Illinois. We anticipate little disruption during the construction phase. All construction work is expected to occur within city or township owned public rights-of-way. The construction work in your area is expected to take a couple of months to complete. Installation of the entire fiber optic network within the city and township is expected to be completed by February 2013.

UC2B is a consortium consisting of the City of Urbana, the City of Champaign and the University of Illinois. Collectively, those agencies were awarded Federal and State grant funding to build the UC2B community fiber optic network. The back of this letter contains information about UC2B and how you can gain access to the network if you so desire.

The Public Works Department will make every attempt to keep residents informed during the construction project. Information about the project will also be posted on the City's website at www.urbanaininois.us. If at any time you have any construction related questions about the project please contact Beth Reinke with the City at 217-384-2385. The City thanks you in advance for your patience and cooperation.

Sincerely,



William R. Gray, PE
Public Works Director





**Urbana-
Champaign
Big Broadband**



Fast, affordable broadband is coming to your street!

UC2B is building an underground fiber-optic Internet network and every home and business in your neighborhood is eligible. Grant funds allow you to get connected with zero installation cost when you subscribe to fast, affordable Internet service. This one-time opportunity is available to the first 2,500 households who subscribe.

To Sign Up

1. Talk with UC2B staff. They will be knocking on every door in eligible neighborhoods starting this fall.
2. Get property owner signature and schedule installation of cable and box with UC2B staff.
3. Sign up for monthly Internet service.

Internet Service Options

- From \$19.99/month
- 5 Mbps and higher speed options
- Symmetric speeds (both upload and download)
- Blazing 1 Gbps speed to campus, K-12 schools, and all UC2B users

* In the coming months UC2B expects to announce additional TV and Phone service options for the 2,500 UC2B subscribers.



UC2B staff will knock on every door in the neighborhood in teams of 2 this Fall. They will conduct a brief survey and invite you to sign up for fast Internet.

Questions? Contact us:

Web: www.UC2B.net

Email: info@UC2B.net

Phone: 217-366-UC2B (8222)

UC2B is a partnership of the City of Urbana, University of Illinois, and City of Champaign. With help from Federal and State grant funds UC2B is building public, cutting edge broadband.



Public Works Department
706 South Glover Avenue
Urbana, IL 61801
(217) 384-2342
FAX (217) 384-2400

September 2011

**RE: Urbana Champaign Big Broadband (UC2B)
Construction Project**

Dear Resident/Business Owner:

Construction of a new fiber optic (broadband) network will begin in the City of Urbana and Urbana Township within the next few weeks.

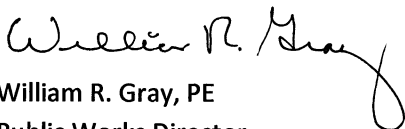
During construction the contractor will install small plastic pipes underground that will later be used as a pathway for fiber optic cables. The size of the plastic pipes is one and a quarter inches in diameter. On the surface the contractor will install junction boxes that will serve as access points to the fiber optic network. Connection to the fiber optic network by residents and businesses will occur under a separate contract at a later date. For now, the work you will see is the installation of the backbone or lateral lines of the system.

The contractor for the project is John Burns Construction Company from Orland Park, Illinois. We anticipate little disruption during the construction phase. All construction work is expected to occur within city or township owned public rights-of-way. The construction work in your area is expected to take a couple of months to complete. Installation of the entire fiber optic network within the city and township is expected to be completed by February 2013.

UC2B is a consortium consisting of the City of Urbana, the City of Champaign and the University of Illinois. Collectively, those agencies were awarded Federal and State grant funding to build the UC2B community fiber optic network. The back of this letter contains information about UC2B and how you can gain access to the network if you so desire.

The Public Works Department will make every attempt to keep residents informed during the construction project. Information about the project will also be posted on the City's website at www.urbanaininois.us. If at any time you have any construction related questions about the project please contact Beth Reinke with the City at 217-384-2385. The City thanks you in advance for your patience and cooperation.

Sincerely,



William R. Gray, PE
Public Works Director





UC2B fiber-optic cables are coming to your neighborhood

UC2B is building an underground fiber-optic Internet network. The cables form seven fiber rings throughout the community. They will provide very-high speed Internet access to roughly 250 Anchor Institutions throughout the community.

Connecting Our Community

UC2B will serve schools, public facilities, social service providers and more:

- 40 K-12 schools, including all Champaign and Urbana schools
- 70 government facilities, including improved MTD bus shelters
- 25 public safety facilities, such as fire and police stations
- Healthcare facilities
- Public libraries
- Social service providers and youth centers
- Senior centers and public housing
- University of Illinois and Parkland College

UC2B is improving access to high-speed Internet to help provide job opportunities, serve vulnerable populations, improve public safety and bridge the digital divide.

Can homes and businesses get high-speed Internet?

Fiber-optic Internet service is only available in select neighborhoods that met federal qualifications based on a 2009 survey. There are 11 eligible neighborhoods in Urbana and Champaign with roughly 4,850 total households and businesses. Although your home or business is not eligible at this time, the fiber-optic cables near you could be used in the future to expand service to your neighborhood.

Questions? Contact us:

Web: www.UC2B.net

Email: info@UC2B.net

Phone: 217-366-UC2B (8222)

UC2B is a partnership of the City of Urbana, University of Illinois, and City of Champaign. With help from Federal and State grant funds UC2B is building public, cutting edge broadband.



Public Works Department
706 South Glover Avenue
Urbana, IL 61801
(217) 384-2342
FAX (217) 384-2400

September 2011

**RE: Urbana Champaign Big Broadband (UC2B)
Construction Project**

Dear Resident/Business Owner:

Construction of a new fiber optic (broadband) network will begin in the City of Urbana and Urbana Township within the next few weeks.

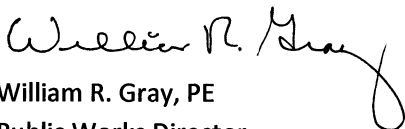
During construction the contractor will install small plastic pipes underground that will later be used as a pathway for fiber optic cables. The size of the plastic pipes is one and a quarter inches in diameter. On the surface the contractor will install junction boxes that will serve as access points to the fiber optic network. Connection to the fiber optic network by residents and businesses will occur under a separate contract at a later date. For now, the work you will see is the installation of the backbone or lateral lines of the system.

The contractor for the project is John Burns Construction Company from Orland Park, Illinois. We anticipate little disruption during the construction phase. All construction work is expected to occur within city or township owned public rights-of-way. The construction work in your area is expected to take a couple of months to complete. Installation of the entire fiber optic network within the city and township is expected to be completed by February 2013.

UC2B is a consortium consisting of the City of Urbana, the City of Champaign and the University of Illinois. Collectively, those agencies were awarded Federal and State grant funding to build the UC2B community fiber optic network. The back of this letter contains information about UC2B and how you can gain access to the network if you so desire.

The Public Works Department will make every attempt to keep residents informed during the construction project. Information about the project will also be posted on the City's website at www.urbanaininois.us. If at any time you have any construction related questions about the project please contact Beth Reinke with the City at 217-384-2385. The City thanks you in advance for your patience and cooperation.

Sincerely,



William R. Gray, PE
Public Works Director

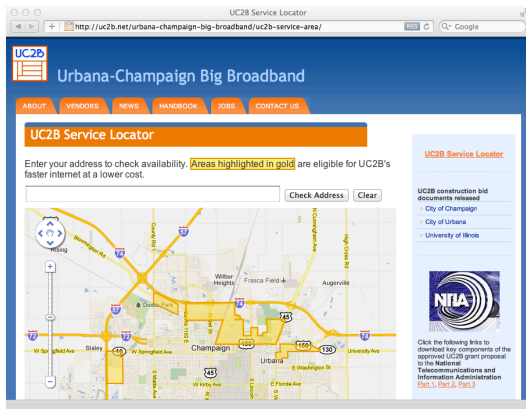




Fast, affordable broadband is coming to our community

UC2B is building an underground fiber-optic Internet network. The network will provide broadband Internet access to roughly 250 Anchor Institutions throughout the community along with homes and businesses in 11 eligible neighborhoods.

Is service available at my home or business?



Visit www.UC2B.net and click 'UC2B Service Locator' to see a map of eligible neighborhoods.

UC2B staff will knock on every door in eligible neighborhoods with a brief survey and invitation to sign up.

To Sign Up

Every home and business in eligible neighborhoods can sign up for fast, affordable Internet service. Plans begin at \$19.99/month for 5Mbps fiber-optic Internet. Installation is free for the first 2,500 subscribers. A property owner signature is needed to install the cable and box. Talk with UC2B staff to learn more and sign up.

Connecting Our Community

UC2B will bring high-speed Internet to K-12 schools, government and public safety facilities, libraries, healthcare providers, social service agencies and more. Even if your home or business is not in an eligible area, our whole community will benefit from these connections. In the future, the fiber-optic cables could be used to expand service to homes and businesses in your neighborhood.

Questions? Contact us:

Web: www.UC2B.net

Email: info@UC2B.net

Phone: 217-366-UC2B (8222)

UC2B is a partnership of the City of Urbana, University of Illinois, and City of Champaign. With help from Federal and State grant funds UC2B is building public, cutting edge broadband.



**Urbana-
Champaign
Big Broadband**

12 Things To Know about UC2B



1. UC2B is the short name for Urbana-Champaign Big Broadband, which is a collaboration between the cities of Urbana and Champaign, the University of Illinois and several other public and private partners. Together they received some \$22.5 million in Federal stimulus funding from the Department of Commerce and another \$3.5 million in funding from the State of Illinois Department of Commerce and Economic Opportunity to build the UC2B fiber-optic network in the Urbana-Champaign community. Local organizations pledged another \$3.4 million to the \$29.4 million project.



2. There are a total of nine local organizations that pledged money to help build the UC2B fiber-optic network.

University of Illinois - \$510,971

City of Champaign - \$498,070

City of Urbana - \$345,675

Champaign Unit 4 Schools - \$622,557

Urbana District 116 Schools - \$298,075

Champaign-Urbana Mass Transit District - \$339,103

Champaign Telephone Company - \$587,698

Urbana-Champaign Sanitary District - \$ 20,000

Lincoln Trail Libraries System - \$30,000

Total of all Local Matching Funds: \$3,352,149

What?

3. There are two parts of the UC2B project. The first part will build seven underground fiber-optic rings that span the entire community. The rings will connect some 200 Community Anchor Institutions to each other, to the Internet and to local residents and businesses. The rings also form the backbone for the second part, which is a Fiber-to-the-Premise (FTTP) network in 11 Census Block Groups that qualified for the federal Broadband Technology Opportunities Program (BTOP) grant - based on a door-to-door survey that was conducted in 2009.

Who?

4. To qualify for grant funding for the Fiber-to-the-Premise construction, we had to show that less than 41% of the households in a Census Block Group subscribed to a broadband service. The Federal government defined the minimum speeds that qualified as "broadband". The 11 local Census Block Groups that had less than a 41% broadband subscription rate in the door-to-door survey are the areas that qualified for the grant.

FTTP

5. All households, businesses and the Community Anchor

Institutions that subscribe to UC2B fiber-to-the-Premise (FTTP) service will have a small fiber-optic cable installed into their building. That fiber cable will come from a small hand-hole at the edge of their property in the public right-of-way in front of their building. Typically the hand-holes will be small - 12 inches by 17 inches - and look like this:



Safe?

6. Fiber-optic cable is by far the safest technology to bring into your home or business. The fiber strands themselves only transmit light, not electricity. Should lightning hit the UC2B fiber cable that comes into your home, the energy might melt the cable, but no electrical charge will be carried into your home. The fiber cable entering your home or business contains no metal that could conduct electricity. Your computer, Blu-ray player, game console or TV will be safe from lightning that strikes your UC2B fiber cable. Fiber-optic cables also do not transmit any electromagnetic radiation as they provide service.

Inside 7. Once the fiber-optic cable enters your home, it is connected to an Optical Network Terminal (ONT), which converts the pulses of light on the fiber strand to low voltage electrical signals that can be transmitted over standard Ethernet cables to your computer, Blu-ray player, game console, TV or any other Internet-enabled device. Signals from the fiber strand can also be transmitted within your home or business by your very own secure Wi-Fi wireless network. That will allow you to use a UC2B connection with a Wi-Fi capable smart-phone, an iPad, netbook, laptop computer or any Wi-Fi enabled device.

Services 8. UC2B's primary service will be an Internet / Intranet data service. Over that connection you will be able to browse the Internet, download movies and music, stream movies and music - (including HD movies with great quality), use a Voice-over-IP (VoIP) phone service, have video chats and conferences, and do a host of other things. While many of those activities will be over the Internet, there will also be many things that you or your family can do over the UC2B Intranet. Your children will have practically unlimited bandwidth from your home to any local school or library. If your employer is a UC2B subscriber, you can have practically unlimited bandwidth from your home to your place of work. If your place of worship is a UC2B subscriber (and many are slated to be), you may be able to watch services or participate in study groups from your home. If you have a medical condition that requires regular monitoring, you may be able to have that done remotely over UC2B, saving you the time and cost of an office visit across town. With a home automation system, you would be able to control your lights, appliances and your thermostat while away from home, saving on utility costs.

Rates 9. UC2B service rates will be affordable, but even the families with the least expensive service - \$19.99 a month - will have practically unlimited bandwidth to the local schools, libraries and Community Anchor Institutions. The UC2B Policy Board has not yet finalized the pricing for the full range of services, but we know that even the least expensive UC2B service will allow families to stream HD movies or TV shows and browse the Internet at the same time. Video chats and conferences will be detailed and clear. Sending family photos or movies to your relatives across town or across the country will be faster than you have ever experienced from home.

Where? 10. You will be able to sign up for UC2B service where you will be using it - in your home or business. Canvassers for UC2B will call on every household and business in the 11 grant-eligible Census Block Groups. They will explain the service options, the costs and answer all questions. The good news is that for the first 2,500 households or businesses in those 11 Census Block Groups that subscribe, (there are a total of roughly 4,850 households and businesses in those areas) the installation of UC2B service will be totally paid for by the grant. UC2B subscribers will need to pay for the monthly charges, but the installation for the first 2,500 UC2B subscribers will be totally free.

When? 11. The canvass in the very first FTTP service areas will be late this fall. Services in those first areas will begin in February or March of 2012 - depending on the weather and the availability of fiber-optic cable. The canvass for the rest of the UC2B FTTP service areas will be next spring with services being activated later in the summer and fall of 2012.

UC2B




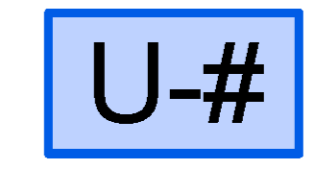










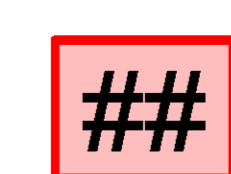
12. For More Information

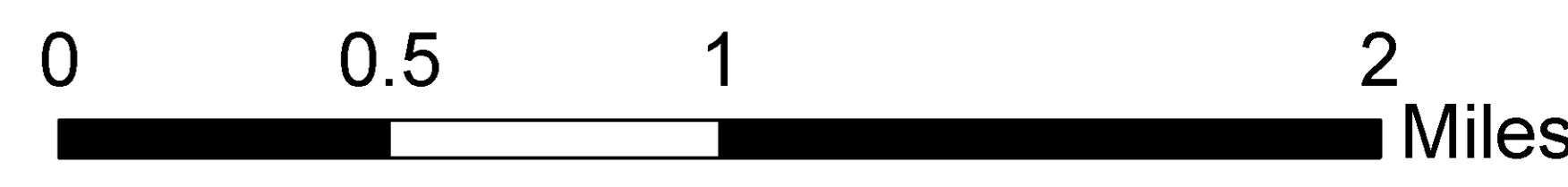
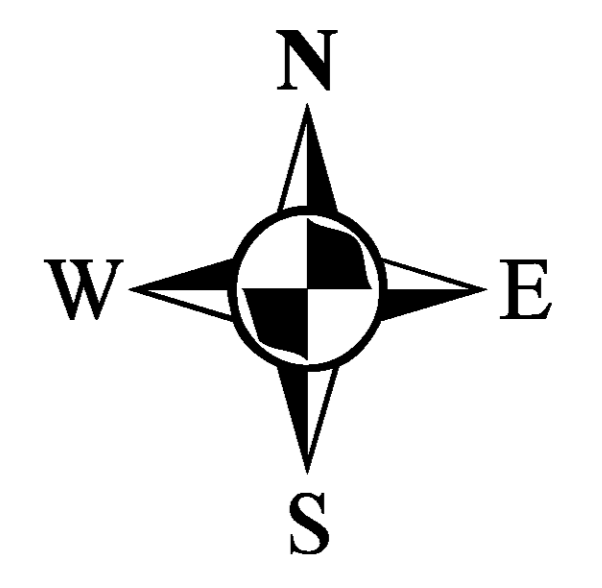
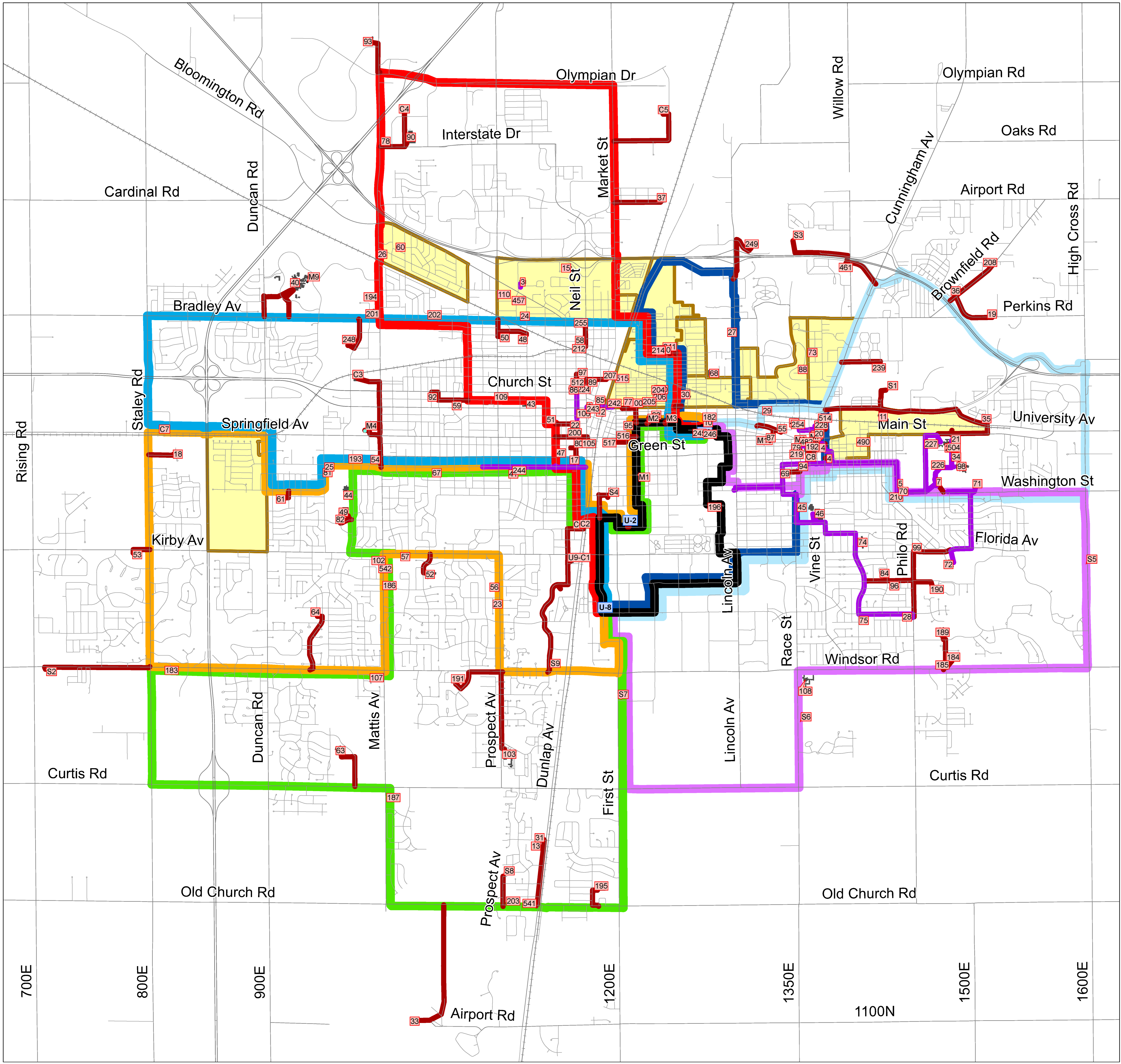
Please visit: www.UC2B.net - or send e-mail to: info@UC2B.net - or call: (217) 366-8222 (UC2B)

UC2B Policy Board meetings are open to the public and are held on the 1st and 3rd Wednesdays of the month in the Champaign City Council chambers from Noon to 1:30.



Project Ring Map

-  grant-funded fiber-to-the-home (FTTH) service areas
-  UC2B node
-  Ring 1
-  Ring 2
-  Ring 3
-  Ring 4
-  Ring 5
-  Ring 6
-  Ring 7
-  Internodal transport cable
-  UC2B lateral conduit
-  existing municipal conduit
-  Anchor Institution or IRU customer





UC2B Community Anchor Institution & IRU Sites

- 2 - City of Champaign - City Building
- 3 - City of Champaign - Public Works Department
- 4 - City of Urbana - Fire Department (Main Station)
- 4 - City of Urbana - Police Department
- 4 - City of Urbana - City Hall
- 5 - City of Urbana - Glover Avenue facility
- 5 - City of Urbana - Public Works Department
- 6 - Champaign County - Courthouse
- 7 - Champaign County - Regional Planning Commission
- 7 - Champaign County - Brookens Administration Center
- 7 - State of Illinois Regional Offices
- 7 - Urbana Park District - Brookens Gym
- 11 - Champaign-Urbana Mass Transit District - Main Offices
- 12 - C-U MTD - Transportation Center (Illinois Terminal)
- 13 - Village of Savoy - Municipal Center
- 14 - United States Courthouse
- 14 - Illinois State Police
- 15 - Champaign County - Children's Advocacy Center
- 15 - Champaign-Urbana Public Health District
- 17 - City of Champaign Township
- 18 - Champaign Township
- 19 - Urbana Township
- 20 - Champaign County - Sheriff's Office
- 21 - METCAD & Emergency Services
- 21 - Illinois State Police
- 22 - City of Champaign - Fire Department (Station 1)
- 23 - City of Champaign - Fire Department (Station 2)
- 24 - City of Champaign - Fire Department (Station 3)
- 25 - City of Champaign - Fire Department (Station 4)
- 26 - City of Champaign - Fire Department (Station 5)
- 27 - City of Urbana - Fire Department (North Station)
- 28 - City of Urbana - Fire Department (South Station)
- 29 - Carle Clinic Main & Mills Cancer Center
- 30 - Provena Covenant Medical Center
- 31 - Village of Savoy - Police & Fire Department
- 33 - Federal Aviation Administration
- 33 - University of Illinois Willard Airport
- 34 - Champaign County - Youth Detention Center
- 35 - Edge-Scott Fire Protection District
- 36 - Carroll Fire Protection District
- 37 - Eastern Prairie Fire Protection District
- 40 - Parkland College
- 40 - Parkland Police
- 41 - Champaign Unit 4 Schools - South Side School
- 42 - Urbana School District 116 - Central Office
- 43 - Champaign Unit 4 Schools - Central High School
- 44 - Champaign Unit 4 Schools - Centennial High School

- 45 - Urbana School District 116 - Urbana High School
- 46 - Urbana School District 116 - Urbana Middle School
- 47 - Champaign Unit 4 Schools - Edison Middle School
- 48 - Champaign Unit 4 Schools - Franklin Middle School
- 49 - Champaign Unit 4 Schools - Jefferson Middle School
- 50 - Judah Christian School
- 51 - Holy Cross School & Catholic Church
- 52 - St. Matthew's School & Catholic Church
- 53 - Countryside School
- 54 - St John's Lutheran School & Church
- 55 - Canaan Academy & Baptist Church
- 56 - Champaign Unit 4 Schools - Bottenfield School
- 57 - Champaign Unit 4 Schools - Carrie Busey School
- 58 - Champaign Unit 4 Schools - Stratton School
- 59 - Champaign Unit 4 Schools - Dr. Howard School
- 60 - Champaign Unit 4 Schools - Garden Hills School
- 61 - Champaign Unit 4 Schools - Kenwood School
- 62 - Champaign Unit 4 Schools -Marquette School
- 63 - Champaign Unit 4 Schools - Barkstall School
- 64 - Champaign Unit 4 Schools - Robeson School
- 66 - Champaign Public Library - Douglass Branch
- 67 - Champaign Unit 4 Schools - Westview School
- 68 - Urbana School District 116 - King School
- 69 - Urbana School District 116 - Leal School
- 70 - Urbana School District 116 - maintenance & bus barn
- 71 - Urbana School District 116 - Prairie School
- 72 - Urbana School District 116 - Thomas Paine School
- 73 - Urbana School District 116 - Washington School
- 74 - Urbana School District 116 - Wiley School
- 75 - Urbana School District 116 - Yankee Ridge School
- 77 - Don Moyer Boy's & Girl's Club
- 78 - Lincoln Trail Libraries System
- 79 - The Urbana Free Library
- 80 - Champaign Public Library - Main Branch
- 81 - Champaign Park District - Bresnan Center
- 82 - Champaign Park District - Leonhard Center
- 84 - Sunnycrest Manor
- 85 - Stevick Senior Center
- 86 - Champaign Park District - Springer Center
- 87 - Urbana Park District - Phillips Center
- 88 - Urbana Park District - Planning & Operations
- 89 - Orpheum Children's Science Museum
- 90 - U.S. Army EDRC-CERL
- 92 - Champaign Park District - Hays Center
- 93 - High School of St. Thomas More
- 94 - Urbana Senior Residence (Edge of Mall Senior Residence)
- 95 - Housing Authority of Champaign County - Skelton Place

- 96 - Housing Authority of Champaign County - Steer Place
- 97 - Housing Authority of Champaign County - Washington Square
- 98 - Champaign County - Nursing Home
- 99 - Florida House
- 100 - Carle Arrow Ambulance
- 102 - Carle Clinic Champaign on Kirby
- 103 - Windsor of Savoy
- 105 - Pro Ambulance
- 106 - Christie Clinic - Champaign on University
- 107 - Christie Clinic - Champaign on Windsor
- 108 - Clark-Lindsay Village
- 109 - The Pavilion Behavioral Health System
- 110 - Frances Nelson Health Center
- 183 - City of Champaign - Fire Department (Station 6)
- 184 - Carle Clinic - Urbana on Windsor
- 185 - Christie Clinic - Urbana on Windsor
- 186 - Carle Clinic - Champaign on Mattis
- 187 - Carle Clinic - Champaign on Curtis
- 189 - Amber Glen Alzheimer's Special Care Center
- 189 - Canterbury Ridge
- 190 - Prairie Winds of Urbana
- 191 - Next Generation School
- 192 - United States Postal Service - Downtown Urbana Station
- 192 - Urbana-Champaign Independent Media Center
- 193 - Round Barn Manor
- 194 - Parkland - Job Training Center / Champaign Consortium
- 195 - Champaign Unit 4 Schools - new Savoy grade school
- 200 - Catholic Worker House
- 201 - Restoration Urban Ministries
- 202 - Developmental Services Center
- 203 - Champaign County - Savoy Head Start
- 204 - A Woman's Place / Center for Women in Transition
- 205 - Bethel A.M.E. Church
- 206 - Salem Baptist Church
- 207 - MHCCC - TIMES Men's Shelter / Respite Center
- 208 - Muslim American Center
- 209 - City of Urbana - Urbana Neighborhood Connections Center
- 210 - City of Urbana - New Community Center #2 (Tri-Star site)
- 212 - Unit 4 - Early Childhood Center & Academic Academy
- 212 - Champaign County - Champaign Head Start
- 214 - Champaign Park District - Douglass Center Annex
- 215 - Urbana Park District - Urbana Indoor Aquatic Center
- 217 - Illinois Law Enforcement Alarm System (ILEAS)
- 219 - Cunningham Township
- 220 - Urbana Park District - Anita Purves Nature Center
- 221 - Urbana Park District - Crystal Lake Pool
- 222 - Urbana Park District - Lake House

- 224 - City of Champaign - Hill Street Parking Deck
- 226 - Champaign County - Satellite Jail
- 227 - Champaign County - Highway Department
- 228 - City of Urbana - Civic Center
- 229 - Bristol Place Metanoia Center Inc.
- 238 - Urbana Park District - Phebus Administration Building
- 240 - Champaign Park District - Douglass Center
- 241 - Champaign Unit 4 Schools - BT Washington School
- 242 - City of Champaign - Police Department
- 243 - Inman Plaza
- 244 - Champaign Unit 4 Schools - Mellon Administrative Center
- 248 - University of Illinois - Champaign County Extension Office
- 249 - Carle Clinic - North Annex
- 250 - Center for Women in Transition
- 254 - Urbana School District 116 - Urbana Adult Education
- 255 - Champaign Unit 4 Schools - Columbia School
- 260 - Habitat for Humanity of Champaign County
- 265 - St Luke Christian Methodist Episcopal Church
- 267 - The Church of the Living God / Love Corner Worship Center
- 272 - St. Mary's Catholic Church
- 273 - Empty Tomb, Inc.
- 279 - Park Avenue Seventh Day Adventist Church
- 287 - Second Chance Church of God
- 296 - Power House Church of God in Christ
- 301 - Alpha and Omega Church of Jesus Christ
- 305 - Center of Hope Church
- 308 - Mt Olive Baptist Church
- 309 - New Life United Pentecostal Church of Champaign
- 318 - New Free Will Baptist Church
- 321 - Macedonia Baptist Church
- 323 - First Church of God
- 329 - Pilgrim Missionary Baptist Church
- 332 - Deliverance Temple Apostolic Church, Inc.
- 334 - Grove Street Church of God in Christ
- 356 - Dublin Street Church of Christ
- 357 - Morning Star Free Will Baptist Church
- 360 - New Birth Missionary Baptist Church
- 361 - Greater Holy Temple Church and Fellowship Hall
- 366 - Christ Unity Church
- 377 - Webber Street Christian Church
- 385 - First Wesleyan Church
- 388 - Urbana-Champaign Friends Meeting
- 390 - Baha'i Center
- 408 - United States Government - Area Offices
- 408 - 40 North 88 West: Champaign County Arts Council
- 408 - Junior Achievement of Champaign County
- 435 - State of Illinois - Dept. of Military Affairs - Champaign Armory

- 457 - Champaign Unit 4 Schools - Service Center
- 461 - Kingswood School
- 471 - Regional Health Resources Center / Community Blood Services
- 473 - State of Illinois - Dept. of Healthcare and Family Services
- 473 - Cunningham Children's Home
- 482 - City of Urbana - parking deck
- 490 - Champaign County - Marilyn Queller Head Start
- 494 - Jericho Missionary Baptist Church
- 495 - Servants of Holy Heart Mary
- 496 - Lighthouse World Ministries
- 498 - Housing Authority of Champaign County - Hayes Homes
- 499 - Housing Authority of Champaign County - Columbia Place
- 500 - Housing Authority of Champaign County - Dunbar Court
- 510 - Land of Lincoln Legal Assistance
- 512 - Champaign Unit 4 Schools - Curriculum Center
- 513 - Douglass Square Apartments
- 515 - City of Champaign - Washington Street Pump Station
- 539 - Christian Counseling Services
- 540 - Carle Low Vision Center
- 541 - Savoy Public works
- 542 - Carle Surgery Center
- C1-U9 - 100 Trade Center - Champaign
- C2 - 1300 South Neil Street - Champaign
- C3 - 2002 Glenn Park Drive - Champaign
- C4 - 1602 Newton Drive - Champaign
- C5 - 3201 Appolo Drive - Champaign
- C6 - 107 Hessel Drive - Champaign
- C7 - 4101 Fieldstone Road - Champaign
- C8 - Lincoln Square - Urbana
- M1 - MTD Bus Shelter - 3rd and Daniel - Champaign
- M2 - MTD Bus Shelter - 4th & White Streets - Champaign
- M3 - MTD Bus Shelter - 6th & White Streets - Champaign
- M4 - MTD Bus Shelter - Country Fair South - Champaign
- M6 - MTD Bus Shelter - Lincoln Square - Courthouse - Urbana
- M7 - MTD Bus Shelter- Lincoln Square Garage - Urbana
- M8 - MTD Bus Shelter - Lincoln Square South - Urbana
- M9 - MTD Parkland Bus Shelter - Champaign
- M10 - MTD Bus Shelter - 505 W. Stoughton - Urbana
- S1 - UCSD NE Plant 1100 E. University - Urbana
- S2 - UCSD SW Plant - 2404 S. Rising Road - Champaign
- S3 - UCSD Pump Station 3 - 57 Apple Tree - Urbana
- S4 - UCSD Pump Station 4 - 49 E. Armory Ave - Champaign
- S5 - UCSD Pump Station 5 - 1607 S. High Cross Road - Urbana
- S6 - UCSD Pump Station 6 - 3208 S. Race Street - Urbana
- S7 - UCSD Pump Station 7 - 2516 S. First - Champaign
- S8 - UCSD Pump Station 8 - 302 S. Prospect - Savoy
- S9 - UCSD Pump Station 9 - 502 Windsor Road - Champaign