The City of Minneapolis (the City) is proposing to install high speed broadband internet infrastructure in the Minneapolis Public Housing Authority’s (MPHA) residential high rise towers. Comprised of 4,958 of the 5,700 units owned and operated by MPHA. The high rise towers consist of forty one individual structures of heights from four stories to twelve stories across all areas of Minneapolis. Residents are primarily members of immigrant and/or ethnic minority groups. All residents are considered members of low-income households. The average annual income of high rise residents is approximately $14,000. The City is requesting $3,302,955 from the Broadband Technology Opportunity Program to bring uniform broadband internet infrastructure to the underserved residents of these public high rises. The cost of infrastructure installation per unit is $666. The cost of installation per household served over the course of the three year grant period is $524. In 2006 Minneapolis launched a City-wide wireless system, Wireless Minneapolis, to bring broadband technology to its residents and businesses. The wireless network covers all 59 square miles of Minneapolis providing residents, businesses, government and visitors with wireless broadband access anywhere in the City. The network allows the City to deliver services more efficiently and effectively than ever before, however, the limits of the terrestrial based system mean that residents and businesses above the 3rd story of buildings do not receive an adequate broadband signal. In the interest of being inclusive of all residents, particularly the low-income populations that are served in Public Housing, the City of Minneapolis is proposing to use BTOP funding to complete the wireless technology service to include the residents of the high rise buildings via a DSLAM network linked to the Wireless Minneapolis system. The City will contract with USI Wireless (USIW), the provider that installed the municipal wireless system, to install and maintain the high-rise broadband infrastructure. Founded in 1995, US Internet (the parent company of USI Wireless) is an international provider of Internet and hosting services. In the contiguous U.S., the company has points of presence in over 2,000 cities, enabling those with a mobile lifestyle to connect to the Internet from almost any location. The broadband infrastructure deployed is a DSLAM system engineered specifically for each building. The technology standard used in this system is both wireless and wireline. A wireless backhaul is connected to the Dragonwave antenna on the roof of each targeted building. A fiber riser cable is used for transport to the Dmark (switches are used at each end of riser), ADSL equipment is assembled in the Dmark, along with 66 Blocks for cross connects. The units existing phone line is then used to reach the customer and the modems are installed and tested per line. The rooftop Dragonwave transponders on each of the 41 high rise buildings will access the existing wireless system infrastructure already provided by the City. Individual residential units will access the broadband connection via existing telephone lines in the units. By leveraging the existing Wireless Minneapolis system and
residential phone lines, Minneapolis and USIW are able to complete this cycle of service at a relatively low cost. USIW’s service will allow broadband services to be offered to the 4958 units of the high rises at rates that offer a 20% to 50% savings over similar services offered in their areas. Residents will have access to speeds up to 20Mbps Downstream with 5Mbps Upstream with an additional, unique free wifi roaming account that can be used throughout the City’s Wireless Minneapolis network. The existing contract with USIW for the municipal broadband system will be amended to include the high rise residents under the current low monthly pricing. Services begin at $14.95/month. The current contract is valid for another 6.5 years. USIW has agreed to comply with all nondiscrimination and interconnection obligations and practices as required by NTIA and the City for activities outlined in this proposal. The number of jobs created by and for these specific activities is expected to be 20. The City is also submitting a BTOP Sustainable Adoption application in this round of funding to ensure that residents are adequately aware, educated and equipped to make full use of broadband technology once the infrastructure is in place.