Broadband USA Applications Database

Applicant Name: Country Connections LLC

Project Title: Fayette County Ohio Area Remote Broadband

Project Type: Middle Mile

_____Executive Summary_____

a) Opportunity the proposed system seeks to address. This project will install the infrastructure for reliable and modern broadband access to the remote residents in the Fayette County, Ohio area. This initiative brings the same levels of service found in the county's cities out to remote households and businesses via a network of towers and wireless technology. b) A general description of the proposed funded service areas (location, number of communities, etc.) Fayette County, Ohio is a rural area county. The U.S. Census estimates that the population of the county is 28,319 over approximately 406 square miles. Within the county and surrounding counties, broadband Internet is available via cable and/or DSL only in the cities and along some roads between cities. Large companies currently provide broadband only in places where they can reap maximum profits. As a result, the vast majority of the area does not have access to cable or DSL. These unserved and underserved communities, households, businesses, and organizations are the sole focus of this project. In fact, when the census blocks from the primary cities like Octa, Milledgeville, Jeffersonville, Bloomingburg, Good Hope, and Washington Court House are removed from the totals, this project is effectively serving a truly remote area with the associated low population densities, very high-costs for delivering service, and substantially lower revenue. c) Number of households and businesses passed. For over seven years, Country Connections LLC (and previously known as In-Touch Internet Services) has been a pioneer in rural broadband Internet service for remote rural locations in Fayette County and surrounding counties. Country Connections currently serves the target area addressed in this proposal and offers wireless Internet service to approximately 400 locations in a 1411 square mile area. Serving this sparse population base has been challenging. The company cannot afford to purchase wireless networking towers because revenue from customers who would rely on these towers is not sufficient to offset the tower construction costs. As a result, the wireless networking equipment is located on various tall structures such as farmer's grain legs, grain elevators, and water towers. These are often not situated in the best locations, can be difficult to access and to mount equipment, have reliability issues, and are usually not high enough. As a result of these tower limitations, only about 50% of the remote population can actually receive our Internet service. In addition, the Country Connections network infrastructure is based on 10 Mb/s backhauls. Customers want and need more bandwidth, but the current aging infrastructure cannot support it. Our main service Level #1 offers just 512 Kb/s download and 256 Kb/s upload speeds because the infrastructure is not able to support the increase to the defined minimum broadband throughput of 768 Kb/s download. On this project, Country Connections will replace the current infrastructure 1) with taller towers that are better placed to serve the majority of the rural population and 2) with higher bandwidth backhauls to support higher download speeds, and 3) with smaller towers to fill in areas with

weak signal strength. These upgrades will enable Country Connections to deliver service to over 95% rural locations with the minimum of 768 Kb/s download and 256 Kb/s upload, and provide much higher speeds to everyone, including competing companies interested in purchasing network access to provide Internet-related services. d) Number of community anchor institutions, public safety entities, and critical community organizations passed and/or involved with project (e.g., health care, education, libraries, etc.). Country Connections is a strong supporter of the community and already offers, and will continue to offer, free or reduced-rate broadband Internet to police/fire departments and other public service organizations in the service area. We currently offer free Internet service and web hosting to four different organizations including free email accounts for all police officers in Fayette County and free wireless Internet at the Fayette County Fair. These organizations will benefit greatly from the infrastructure enhancements in this project and more organizations will be served. Of course, these are Last Mile connections that will be made with company funds, not project funds, because this is a Middle Mile project. e) Proposed services and applications for the proposed funded service areas and users. This project will create a high-reliability, wireless broadband infrastructure for the area. The infrastructure will include a set of tall towers strategically placed throughout the area. The towers will deliver very high bandwidth Internet access, and will be augmented by a series of smaller towers to provide service to difficult-to-reach areas that may be obstructed by terrain elevation changes or forested areas. The infrastructure will be available for direct connectivity to over 95% of homes / businesses / organizations or to be resold to vendors of Internet services. One key and unique aspect of this proposal is that funds are requested for this Middle Mile project, but Country Connections LLC is committed to implementing the last mile portion entirely on its own with its own funding. This has two primary benefits. First, less grant money is required. Second, by the end of the project, the service area will not only have a Middle Mile infrastructure, it will also have over 1000 customers benefiting directly from this project. This accelerates the impact of this project and meets the true intent of the stimulus funding both quickly and cost effectively. f) Approach to addressing the non-discrimination and interconnection obligations As part of the implementation of this project, our company will develop written policies and procedures designed to ensure that we comply fully with the nondiscrimination and interconnection obligations outlined in the NOFA. g) Type of broadband system that will be deployed (network type and technology standard). Internet connectivity will come from an existing (in use now) gigabit Ethernet fiber optic connection. The system will utilize wireless network technology to distribute the bandwidth throughout the area. A combination of 802.11b/g/n and proprietary protocols on unlicensed and licensed frequencies will be deployed to traverse many miles of rural countryside. Of course, these funds will not be used to acquire spectrum as part of an FCC auction or secondary market acquisition. h) Qualifications of the applicant that demonstrate the ability to implement and operate a broadband infrastructure, and/or be a sustainable broadband services provider. Country Connections LLC (previously In-Touch Internet Services) has been providing wireless Internet services continuously for over seven years. Larry Schriver, the president and co-owner, has over 30 years of business, management, and marketing experience and has a Bachelors of Science Degree from The Ohio State University. Mark Stephenson is the lead engineer and co-owner of the company. He has over 25 years of engineering experience and has a Masters Degree in Electrical Engineering with emphasis on RF and processing devices. Currently, three of the five field technicians have over five years of experience with this company doing installation and maintenance of wireless networking equipment. We also have

certified tower climbers and the associated gear needed for safe tower climbing. We have a highly skilled team in place that can rapidly deploy this new system. i) Overall infrastructure cost of the broadband system. The total cost is $995K. A detailed cost analysis is presented later in this application. j) Overall expected subscriber projections for the project. Within five years of the completion of this project, we estimate that we will add 2,000 new rural customers due to the availability of this service, the increased network bandwidth to our customers, and the increased desire for Internet connectivity. k) Number of jobs estimated to be created or saved as result of this project. In addition, to the large tower construction crews and a variety of outside consultants, this project will save two jobs and will add and sustain at least four new full-time jobs.