REQUEST FOR PROPOSALS

For Erlanger FCC Funded Pilot Program
Rural Healthcare Fiber Network Project

RFP # 00
HCP Number 17215
FCC RN 0010407203

Erlanger Health System
Suite B-1110
975 East Third Street
Chattanooga, TN 37403

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1. Background:

Erlanger Health System (the client) has been awarded a $2,198,610 grant from the FCC which is being matched by $387,990 from BrightBridge Inc. for the development of a fiber network to link rural non-profit health care providers and eligible rural for profit dedicated emergency centers (the rural healthcare network group), with the various urban located Erlanger Health System campuses. Erlanger Health System is requesting proposals for:

1) Technical services for network development, design, and system deployment;

2) the preleasing of fiber connectivity among these locations for periods of both 15 and twenty years;

3) the construction of missing segments of the fiber network;

This RFP addresses three core needs of the proposed network. It is anticipated that several vendors will be required to provide the three components of the RFP. Vendors are encouraged to make proposals on those parts of the project where they feel they can effectively provide a solution. While it is not a pre-requisite to submitting a proposal, potential vendors should provide a notice of intent to bid, so the client will be able to electronically notify them of updates, corrections, or revisions of this RFP prior to the due date.

The FCC established the Rural HealthCare Pilot Program (RHCPP) in its 2006 Program Order. The goal of the Pilot Program is to stimulate deployment of the broadband infrastructure necessary to support innovative telehealth and in particular telemedicine services to those areas of the country where the need for those benefits is most acute. Applications from 81 applicants and consortiums applied for funding in the pilot program and the FCC awarded funds to 69 applicants in FCC Order 07-198. These funds can be used to support up to 85 percent of the costs associated with the cost of construction of state or regional broadband health care networks and with the advanced telecommunications and information services provided over those networks.

The locations to be served will be further detailed in the body of this RFP but initially include: Copper Basin Medical Center in Copperhill TN, Erlanger Bledsoe in Pikeville TN, Erlanger Baroness in Chattanooga TN, Erlanger North in Red Bank TN, Hutcheson Medical Center in Fort Oglethorpe GA, North Valley Medical Center in Dunlap TN, Rhea Medical Center in Dayton TN, Erlanger East, Chattanooga TN, and Murphy Medical
Center, Murphy NC. The client reserves the right to modify the number and locations of these sites. Adequate capacity must be available from the vendor to add additional locations to the network over time. All sites in the network must support full internet protocol (IP) services/ports and advanced services including but not limited to H 323 audio and video conferencing, large (100MB+) file transfers, web based audio and video streaming, Voice over Internet protocol (VoIP) and full support for both IP Sec and SSL VPN traffic/services providing complete technical convergence throughout the infrastructure.

Since the network will carry protected health information, the vendor, subcontractors, and all their employees should be familiar with the Health Insurance Portability and Accountability Act of 1996 (HIPAA).

The Universal Service Administration Company (USAC) administers the Rural Healthcare Pilot Program. USAC will employ a form called the network cost worksheet (NCW) to approve planned project expenses and to manage the vendor payment process. The NCW will list all of the non-recurring and recurring vendor charges for building the broadband network and operating its first year of service. Vendors will be paid from two sources of funds. 85 percent of the payment will come from USAC and 15 percent from the rural healthcare network group through BrightBridge Inc.

2. Due Date and Contact Instructions

All contact regarding this RFP shall be directed to:

Douglas Fisher (Project Coordinator)
VP Government and Community Affairs
Erlanger Health System
Suite B-1110
975 East Third Street
Chattanooga TN 37403
423-778-9642
Douglas.fisher@erlanger.org
Response to this RFP are required within 28 Days of the date the RFP is posted on the USAC website and should be submitted by printed copy to Douglas Fisher at the above address by no later than 4:00 p.m. EDT on the 28th day after posting.

All questions regarding this RFP should be submitted in Word format and sent to Doug Fisher by e-mail (Douglas.fisher@Erlanger.org) at least a week prior to the RFP response due date.

3. Proposal Evaluation

Proposed vendor responses will be evaluated based on, but not limited to, the following:

50% - Cost
30% - Technical solution
   - Ability of the proposed solution to meet all technical requirements and
   - Resiliency/redundancy of the proposal
   - Flexibility to scale needs to higher bandwidth over time.
10% - Vendor qualifications, and experience
   - Demonstration that the vendor can complete the project on time and on budget and deliver a complete and solid solution; and
   - Demonstration that the vendor has a full understanding of the purposes described in this RFP and the laws applicable to the project
   - References, familiarity with area
10% - Implementation
   - Implementation time frame
   - Implementation Plan and approach; and
   - Vendor’s project management process

The rural healthcare network group, or client in consultation with other Pilot Project partners reserves the right to issue any resulting order with the vendor whose proposal, in the judgment of the client, most nearly conforms to the specifications and will best serve the needs as described herein. The client reserves the right to waive all technicalities in selecting or rejecting any or all proposals which satisfy or fail to satisfy respectively the best interests of the group. The client is not obligated to accept any proposal received. It may accept proposals in whole or in part, negotiate proposals in whole or in part, or may reject all proposals. Prior to acceptance of any proposal, the client will require adequate indemnification from the contractor through documentation of liability coverage’s which
shall hold the network group client(s) harmless from actions of the vendor.

4. Requested Solutions, Features, and Functions

4.01 General Overview:

This section provides is a general overview of all the components required to meet the project goals of establishing the rural healthcare fiber network. The project involves development of secure and reliable fiber connectivity to initially a minimum of nine (9) health care providers across southeast Tennessee, north Georgia and western North Carolina. These locations are expected to grow over time. The client reserves the right to modify, add and or substitute sites. Descriptions of the sites are provided in section 4.03. The project involves three basic components each of which may be responded to in individual Proposals for Service. These components are as follows:

4.02 Technical services for network development, design, and system deployment:

The client is requesting proposals from qualified vendors for technical services for network development, design and system deployment. The client would like to retain the services of an independent firm with project relevant engineering experience in network development design and deployment. The tasks of the selected vendor will be to provide project technical assistance to the group on an as needed hourly basis in the field of network design strategy, development, review and evaluation of network technical solutions and other project engineering, inspection and consultant services.

4.03 Preleasing of fiber connectivity among these locations for periods of both 15 and twenty years;

The network initially involves the development of fiber connectivity for a rural healthcare network which will initially serve nine (9) health care provider locations, expandable over the life of the project to additional locations. Bandwidth demand must be scalable to at least 100 Mbps up and down per site. The client is requesting proposals for preleasing fiber connectivity to these sites for a period of 15 years and as an alternative a period of twenty (20) years. As an additional alternative, discounted services at defined service levels will be
considered ranging from 10 mbps to 5000 mbps over the same 15 and twenty year periods. All equipment, transmission methods, and systems must be “industry standard” which is defined as the most current version of relative standards set by an American National Standards Institute (ANSI) or International Organization for Standardization (ISO) – accredited Standards Developing Organization (SDO), such as the Institute of Electrical and Electronics Engineers (IEEE), Telecommunications Industry Association (TIA), or Electronic Industries Alliance (EIA). Vendors should list the relevant standards the solution utilizes.

The preleased network connectivity must be capable of delivering the following capabilities to the client.

1. 100 Mb scalable Connection between the health care providers.
2. Lower Bandwidth Synchronous Failover Connections
3. Dedicated connections between the health care providers.
4. Wide Area Network Termination Hardware (including installation) for each facility to manage redundant telecommunications lines. Termination hardware will be capable of providing the following features:
   a. High Availability/Failover/Redundancy
   b. Bandwidth Management/Quality of Service
   c. Virtual Private Network capabilities
   d. Threat Management
   e. Intrusion Detection/Intrusion Prevention
5. Network Monitoring Software (including installation) capable of monitoring the following:
   a. Network Bandwidth
   b. Availability
   c. Threshold alerts
6. Network Testing to certify appropriate Security and Availability
7. Network Management Hardware/Software Solution (including installation) to facilitate efficient and secure distribution of applications over the network. Network management hardware/software will be capable of providing the following features:
   a. Manage Network by maximizing number of concurrent connections
   b. Manage Network by maximizing bandwidth utilization
   c. Manage and maximize network application performance
   d. Mechanism for managing security of access to network resources
The initial sites involved include:

Copper Basin Medical Center  
144 Medical Center Drive  
Copperhill TN 37317  
RUCA Code 10  
Census tract 9504  
Contact Alexander Altman CEO/CFO 423-496-8126

Erlanger Bledsoe  
128 Wheeler Town Road  
Pikeville, TN 37367  
RUCA Code 10  
Census Tract 9531  
Contact Douglas Fisher, 423-778-9642

Erlanger Baroness  
975 East Third Street  
Chattanooga, TN 37403  
RUCA Code 1  
Census tract 4  
Contact Douglas Fisher 423-778-9642

Erlanger North  
632 Morrison Springs Road  
Red Bank TN 36415  
RUCA Code 1  
Census Tract 109  
Contact Douglas Fisher 423-778-9642

Hutcheson Medical Center  
100 Gross Crescent Circle  
Fort Oglethorpe, GA 30742  
RUCA Code 1  
Census tract 307  
Contact : Debbie Reeves, Interim CEO 706-858-2000
North Valley Medical Center  
16931 Rankin Avenue (US 127)  
Dunlap TN  37327  
RUCA Code 10  
Census Tract 601  
Contact: Claude Lewis 423-949-3479  
Transitioning to non-profit  
(Dedicated emergency department)

Rheas Medical Center  
9400 Rhea County Highway  
Dayton TN 37321  
RUCA Code 8  
Census tract 9752  
Contact: Ken Crooms CEO  423-775-1121  
Public non-profit

Erlanger East  
1755 Gunbarrel Rd  
Chattanooga, TN 37421  
RUCA Code 1  
Census Tract 114.41  
Contact; Douglas Fisher 423-778-9642  
Public non-profit

Murphy Medical Center  
3990 East U.S. Highway 64 Alt  
Murphy North Carolina 28906  
RUCA Code 9  
Census tract 9906  
Contact: Mike Stevenson CEO, 828-835-7502  
Public non-profit

Additional Information Regarding Requested preleased fiber connectivity:

100 Mb connection between the Health Care Providers

The primary purpose of this connection will be to provide the bandwidth required for
the transmission of high definition video, data, and voice solutions between servers at
the various health care providers. This connection should be scalable from a smaller Mb
to the specified 100Mb per location. In order to determine a connection’s usefulness in
this context, FCC Pilot Program planners request diagrams that identify the precise end-
to-end routes of the connections, including final mile information. Carriers not
providing this information may be disqualified as unresponsive.

Alternative Synchronous Fail-over Connection for dedicated access if main
connection fails
a. This connection will be as redundant of the primary connection as possible (i.e. not
using the same local loop, etc.)
b. Carriers are asked to quote 3 separate speeds for this connection (1.5 meg, 3 meg,
and 4.5 meg)

In order to determine a connection’s usefulness in this context, FCC Pilot Program
planners request diagrams that identify the precise end-to-end routes of the connections,
including final mile information. Carriers not providing this information may be
disqualified as unresponsive.

Dedicated Connections Between Hospitals

These connections will be between the hospitals.

Wide Area Network Termination Hardware (including installation) for each facility
to manage redundant telecommunications lines. Termination hardware will be
capable of providing the following features:
a. High Availability/Failover/Redundancy
b. Bandwidth Management/Quality of Service
c. Virtual Private Network capabilities
d. Threat Management
e. Intrusion Detection/Intrusion Prevention

The termination hardware will manage the redundant connections, so that if one fails, the
other will automatically engage, with as little disruption to end-users as possible. It will
also allow participants to segregate bandwidth for specific purposes (QOS) and provide the
other functions listed. Vendors will need an understanding of the level of traffic or
concurrent connections from each site to determine what model device to propose. Vendors
should assume up to 300 concurrent connections from the Erlanger Baroness Site and 80 concurrent connections from each of the other eight sites.

**Network Monitoring Software (including installation) capable of monitoring the following:**

a. Network Bandwidth  
b. Availability  
c. Threshold alerts

Vendors may need an understanding of the level of traffic or concurrent connections from each site to determine what configuration to propose. Vendors should assume 300 concurrent connections for the Erlanger Baroness location and 80 concurrent connections from each of the other healthcare provider sites.

**Network Testing to certify appropriate Security and Availability**

Please clearly identify all the testing services that will be provided as part of this certifications process, including port sniffing, probing, wireless assessment, personnel assessment, etc.

**Network Management Hardware/Software Solution (including installation) to facilitate efficient and secure distribution of applications over the network.**

**Network management hardware/software will be capable of providing the following features:**

a. Manage Network by maximizing number of concurrent connections  
b. Manage Network by maximizing bandwidth utilization  
c. Manage and maximize network application performance  
d. Mechanism for managing security of access to network resources

Vendors will need an understanding of the level of traffic or concurrent connections from each site to determine what software/hardware configuration to propose. Vendors should assume 300 concurrent connections to be managed at the Erlanger Baroness location and 80 concurrent connections at the other sites. Also, it is critical that the hardware configuration proposed not have a single point of failure, as the network management solution will be distributing mission-critical applications and data. Please include a discussion of redundant features proposed.
4.04 The construction of missing segments of the fiber network;

It will be necessary to construct some missing links of the pilot project fiber network. Specific linkages that will need to be constructed are along the Old Line Railroad right of way from Delano TN to Copperhill Tennessee, (railroad mile marker 339 to the Georgia Tennessee State Line at Copperhill TN). Other gaps may be identified as new health care provider locations are identified or seek to become a part of the network. Proposals are requested for construction of a minimum of 46 miles of: a) 24 and b) 48 fiber strand (the client will select either 24 or 48 fiber strand, not both) this should be quoted both: 1) underground with no conduit and as an alternative: 2) overhead. Both alternatives would be along existing rights of way or with existing available pole space. Construction prices should be quoted on a unit cost basis per mile separately for below ground and above ground with both 24 and 48 fiber strands. Unit pricing should include allowances for splicing into existing fiber networks at the terminus of each segment. Pro rata allowances should also be included for any necessary equipment for signal boosting or other typical network support hardware necessary for the proper operation of the constructed line segment. Allowances should also be made on construction unit costs for paying prevailing wage rates (Davis Bacon Wages). A copy of current Davis Bacon wage rates applicable on the Old Line Railroad segment (Polk County TN) are attached to this RFP.

5. Pricing and Cost Information

Vendors submitting proposals should identify all costs associated with the solution or subset solution that they are quoting. Not all of the costs associated with the solutions may qualify for FCC funds, and it is critical that the rural healthcare network group understand the complete cost of the network. Quotes must include the following:

For telecommunications solutions:
1. Implementation Fees, including any cost of required hardware, for end to end connectivity
2. Ongoing transmission fees for end to end connectivity
3. Any other costs associated with the solution and/or description of requirements that are prerequisites for the solution that may add additional cost to the network and its participants
For network testing:

1. All costs associated with the solution and/or description of requirements that are prerequisites for the solution that may add additional cost to the network and its participants

6. Implementation Schedule Description

Please include a plan with timeline, and address your ability to meet project timeline goals. Identify any circumstances that may create potential delays.

7. Service and Performance Level Agreements

Please include information regarding service levels and any service level guarantees associated with the solution, including uptime and response time guarantees. Vendors are encouraged to include strong guarantees, as this will be one of the proposal evaluation criteria.


A. Any contract resulting from this solicitation will contain specific system test provisions. These provisions will be developed by the pilot project rural healthcare network and the vendor in accordance with the general concepts described in this RFP and executed in mutually agreed upon test environment.

B. Any contract resulting from this RFP will contain specific system acceptance provisions. Acceptance plans will be developed and executed in advance of delivery. Payment for the system shall not become due until acceptance plans as agreed to and incorporated into the contract are met. A payment schedule will be tied to a work plan with critical milestones. Failure to achieve milestones will impact the payment schedule along with other hard and soft remedies.

The Pilot Program Rural Healthcare Network expects that any contract resulting from this RFP will contain guarantees to the performance of the proposed solution to the specified speeds, transaction volumes, uptime rates, etc. Vendors have been asked to describe their service and performance level agreements. Respondents to this RFP should describe their capability of meeting these expectations and describe the terms of their response time guarantees.
9. Vendor Invoicing and Payment Process

The vendor invoicing process described in this section is mandated by USAC and its various administrative requirements.

USAC will disburse Pilot Project funds to the vendor based upon the submission of detailed invoices for incurred eligible expenses. Invoices should be submitted on a monthly or less frequent basis. The vendor must allocate all costs associated with the project to specific Health Care Provider participants. Any specific cost attributable to multiple participants (such as laying fiber optic cable) must be allocated on a reasonable and demonstrable basis. Any costs that do not directly support the health care network cannot be funded by the pilot program project.

During the invoicing process while the network is being built or assembled, USAC mandates use of the Network Cost Worksheet (NCW) to process the charges. The network Group will be responsible for finalizing and submitting the NCW to USAC but the vendor’s cooperation and assistance will be needed.

The vendor invoice must at a minimum contain the following information:
- Vendor Invoice Number
- Vendor Invoice Date
- Vendor Billing Account Number
- Total Invoice Amount.
- Non–Recurring Costs Each and every identifiable one-time non-recurring) cost to construct the health care network must be allocated to one or more health care provider sites and described using the following fields.
  - A non-recurring tag
  - Identification of the health care provider receiving the “item” or to whom the network expense is being allocated.
  - General description of the item. If any hardware is involved it must have the manufacturer and model number. If any costs are allocated among multiple sites, briefly explain why.
  - Category, equipment, infrastructure
  - Component ie fiber, network switch, bandwidth fee, connection fee, install fee, etc.
- The number of items
- The cost per item
- Total cost for this line item (the number of items times the price per item).
10. Security
Employees of the vendor or any subcontractor hired for this project who are working at any participating Health Care Provider site must carry photo identification that shows the employee’s name, employer, and an employer phone number to verify identity. They will be required to provide the identification to the Health Care Provider personnel upon request.

At no time should the vendor, subcontractor, or employee of same attempt to access, look at, review, log/record/retain/save/copy, redirect or in any way access the content of the traffic on the network. If at any time the vendor becomes aware that unauthorized access is taking place, it is required to take immediate steps to stop current and or future unauthorized access and immediately notify the client staff.

11. Vendor Qualifications

All vendors submitting proposals must meet the following minimum qualifications:
The vendor must be in” good standing” with the FCC, the State of Tennessee and local governments in the service area.
The vendor should be thoroughly familiar with any and all laws, statutes, rules or regulations related to this project.
Prior to award of any contact, the vendor(s) must have a current FCC Registration Number (FRN) and a current USAC Service Provider Identification Number (SPIN).

12. Miscellaneous

Fixed Price Period

All prices, costs, and conditions outlined in a vendor’s proposal shall remain fixed and valid for acceptance for 60 days starting on the due date for proposals.

Oral Presentations

The Pilot Program Rural Healthcare Network group may require any vendor to make oral presentations to supplement its proposal. If this is necessary, the client will make every effort to schedule a mutually agreeable time.
Proposal Expense

The client is not liable for any costs incurred by any bidder or vendors prior to the execution of a contract by all parties.

Errors and Omissions in the RFP

The RFP has been kept intentionally simple to facilitate flexibility and innovation in proposals. If through this process a vendor discovers any significant ambiguity, error, conflict, discrepancy, omission or other deficiency in the RFP, the vendor should immediately notify the RFP contact identified in Section 2 of such error and request a modification or clarification of the RFP document. In the event it becomes necessary to provide additional data or information, or revise the RFP, the client will provide supplements or revisions via e-mail to all vendors who have submitted a notice of intent to bid. Each vendor is responsible for ensuring that its proposal reflects any and all revisions issued prior to the proposal due date.