Request for Proposal
Core Network Switch
PROJECT DESCRIPTION

The Crisp County Board of Commissioners, (herein referred to as CCBOC), invites you a Data Network Design Contractor, (herein referred to as Contractor), to bid on the following Core Network Switch (herein referred to as Hardware). This Design Proposal must completely deliver, install, configure, test, commission, warrant and document this Hardware. This hardware will be installed at the new Crisp County Sheriff's Office in support of Security, Data Network, IP Telephony, Power over Ethernet, Video Conferencing, VLAN, MAC Filtering, Access Control, Video Monitoring, Public Safety, and other technologies.

This project requires you to confirm the current network design, to be handed out at the required Pre-Bid meeting, price the needed equipment, then install and configure as required to bring up the switched network on the new Core Network Switch. This network will interface with the County Fiber Optic Backbone.

SCOPE OF WORK

- Confirm the current county network configuration.
- Design Hardware to support County Requirements.
- Configure Hardware to support County Requirements.
- Deliver, install, configure, test, commission, warrant and document this Hardware
- Completely Document, in the form of a Network Drawing, installed Hardware Configuration and Connectivity.
- All Firmware, IOS, etc. must be current as of the date of installation.
- Provide Electronic Configuration File Backups for Hardware.
- Test and confirm Hardware connectivity to County Network.
- Test and confirm configuration of Hardware.
- Test and confirm routing of Hardware.
- Provide One Year Configuration Support, not to exceed 20 hours.
- Work with Firewall vendor and ensure Hardware configuration and integration, while firewall vendor configures and install new firewall in connection with this project.

MINIMUM SYSTEM REQUIREMENTS

- Core, distribution and advanced access layer
- Layer 2- Layer 4 unified networking solution
- Enterprise-class performance, security & mobility
- Advanced application integration
- Scalable 10/100, 10/100/1000 & 10GbE connectivity
- 48 - 10/100/1000 Ethernet ports.
- 24 – GBIC Fiber Optic Ports.
- 11 – GBIC Single Mode Gigabit LX modules, made by Hardware Manufacturer, to support a distance of up to 10 kilometers.
- 2 – GBIC Multimode SX Fiber Optic modules, made by Hardware Manufacturer.
- Throughput of 240 million packets per second
- Routing/Switching capacity of 322 Gigabits per second
- Switch Fabric Speed of 345 Gigabits per second
- Managed Switch.
- HTTP interface through Web Browser for Configuration, Firmware Update, Backup, Monitoring, etc.
- Multi cast Management.
- High Performance IP Routing.
- Advanced Quality of Service (QoS)
- VLAN Support for up to 128 VLAN's.
- Spanning Tree.
- Spanning Tree Port fast.
- IEEE 802.1s Multiple Spanning Tree
- 802.1Q Trunking Support.
- Port Based Security Capable with ability to remember or Assign MAC Address.
- Mean Time Between Failure (MTBF) of at least 100,000 Hours.
- Must Support Video Surveillance
- Must Support IP Telephony.
- Support Remote Video Kiosks.
- UPS – Rack Mounted – to support switch for 45 minutes of run time.
- Optional 10-Gigabit (CX4 and/or SFP+) ports.
- Ability to upgrade firmware without maintenance agreement.

**Device Management**
- RFC 1591 DNS (client).
- HTML and telnet management.

**General Protocols**
- IEEE 802.1ad Q-in-Q (License May Be Required)
  - IEEE 802.1D MAC Bridges
  - IEEE 802.1p Priority
  - IEEE 802.1Q VLANs
  - IEEE 802.1s Multiple Spanning Trees
  - IEEE 802.1v VLAN classification by Protocol and Port
  - IEEE 802.1w Rapid Reconfiguration of Spanning Tree
  - IEEE 802.3ad Link Aggregation Control Protocol (LACP)
  - IEEE 802.3af Power over Ethernet
  - IEEE 802.3x Flow Control
  - RFC 768 UDP
  - RFC 783 TFTP Protocol (revision 2)
  - RFC 792 ICMP
  - RFC 793 TCP
  - RFC 826 ARP
  - RFC 854 TELNET
  - RFC 868 Time Protocol
  - RFC 951 BOOTP
  - UDLD (Uni-directional Link Detection)
  - RFC 1058 RIPv1
  - RFC 1350 TFTP Protocol (revision 2)
  - RFC 1519 CIDR
  - RFC 1542 BOOTP Extensions
  - RFC 2030 Simple Network Time Protocol (SNTP) v4
  - RFC 2131 DHCP
  - RFC 2453 RIPv2
  - RFC 2548 (MS-RAS-Vendor only)
  - RFC 3046 DHCP Relay Agent Information Option
  - RFC 3576 Ext to RADIUS (CoA only)
  - RFC 3768 VRRP (License May Be Required)
  - RFC 4675 RADIUS VLAN & Priority
IP Multicast
- RFC 3376 IGMPv3 (host joins only)
- RFC 3973 Draft 2 PIM Dense Mode (License May Be Required)
- RFC 4601 Draft 10 PIM Sparse Mode (License May Be Required)

IPv6
- RFC 1981 IPv6 Path MTU Discovery
- RFC 2460 IPv6 Specification
- RFC 2710 Multicast Listener Discovery (MLD) for IPv6
- RFC 2925 Remote Operations MIB (Ping only)
- RFC 3019 MLDv1 MIB
- RFC 3315 DHCPv6 (client only)
- RFC 3513 IPv6 Addressing Architecture
- RFC 3596 DNS Extension for IPv6
- RFC 3810 MLDv2 (host joins only)
- RFC 4022 MIB for TCP
- RFC 4113 MIB for UDP
- RFC 4251 SSHv6 Architecture
- RFC 4252 SSHv6 Authentication
- RFC 4253 SSHv6 Transport Layer
- RFC 4254 SSHv6 Connection
- RFC 4293 MIB for IP
- RFC 4419 Key Exchange for SSH
- RFC 4443 ICMPv6
- RFC 4541 IGMP & MLD Snooping Switch
- RFC 4861 IPv6 Neighbor Discovery
- RFC 4862 IPv6 Stateless Address Auto-configuration

MiBs
- RFC 1213 MIB II
- RFC 1493 Bridge MIB
- RFC 1724 RIPv2 MIB
- RFC 1850 OSPFv2 MIB
- RFC 2021 RMONv2 MIB
- RFC 2096 IP Forwarding Table MIB
- RFC 2613 SMON MIB
- RFC 2618 RADIUS Client MIB
- RFC 2620 RADIUS Accounting MIB
- RFC 2665 Ethernet-Like-MIB
- RFC 2668 802.3 MAU MIB
- RFC 2674 802.1p and IEEE 802.1Q Bridge MIB
- RFC 2737 Entity MIB (Version 2)
- RFC 2787 VRRP MIB
- RFC 2863 The Interfaces Group MIB
- RFC 2925 Ping MIB

Network Management
- IEEE 802.1AB Link Layer Discovery Protocol (LLDP)
- RFC 2819 Four groups of RMON: 1 (statistics), 2 (history), 3 (alarm) and 9 (events)
- RFC 3176 sFlow
- ANSI/TIA-1057 LLDP Media Endpoint Discovery (LLDP-MED)
SNMPv1/v2c/v3
XRMON

**OSPF**
- RFC 2328 OSPFv2 (License May Be Required)
- RFC 3101 OSPF NSSA

**QoS/CoS**
- RFC 2474 DiffServ Precedence, including 8 queues/port
- RFC 2597 DiffServ Assured Forwarding (AF)
- RFC 2598 DiffServ Expedited Forwarding (EF)

**Security**
- IEEE 802.1X Port Based Network Access Control
- RFC 1492 TACACS+
- Secure Sockets Layer (SSL)
- SSHv1/SSHv2 Secure Shell
- RFC 2865 RADIUS (client only)
- RFC 2866 RADIUS Accounting

This Hardware will be used in a multi-faceted environment. This Hardware must be proven in both reliability and end user support in a critical commercial application.

**RFP SCHEDULE**

- Release of RFP
- Pre-Bid Conference - Required
- Bids Due
- Award of Contract
- Project Start Date
  - Monday, May 17, 2010
  - Friday, May 28, 2010, 2:00 PM EDT
  - Wednesday, June 16, 2009, 2:00 PM EDT
  - Friday, June 18, 2010
  - Wednesday, June 28, 2010, No later than 9:00 AM EDT.

**DELIVERABLES**

**Prior to Contract Award:**

- Contractors Network Drawing of Hardware Connectivity.
- Contractor's pricing for the complete Scope of Work.
- Detailed Configuration Diagram and verbose explanation of Configuration.
- Provide costing for additional Configuration Support on a yearly basis.
- Contractor's Plan to respond to Emergencies within 2 hours.
- Completed Bid Form.
- Drawings of Complete County Network including Hardware.
- Drawings of Individual Sheriff’s Office Data Room Rack Layout.
  - All pricing submitted must be broken out into Materials and Labor.
  - If any licensing is required to meet minimum requirements, list as an optional cost.
  - List UPS as optional cost.
- Submit in Printed format, three copies.
- Submit in Electronic Format, Microsoft Word for Documents, PDF, Visio, for drawings, etc., as agreed upon at Pre Bid Meeting.
• Signed Background Check Form for all employees who will work on this project, to be handed out at the required Pre-Bid meeting.
• Employees must successfully pass this background check, prior to contract award.

**After Contract Award:**

• Deliver, install, configure (to support current County Network Operation/Design, Including VLAN's, any required routing, etc.), test, commission, warrant and document this Hardware
• “As Built” Drawings of Complete Data Network Installation including Hardware.
• “As Built” Drawings of Individual Sheriff's Office Data Room Rack Layout.
• 5-Year Warranty Statement.
• Hardware Test Results.
• Electronic Backup of Core Network Switch Configuration Files.
• Train 2 Administrators on Hardware.
• Turn over to CCBOC, all Related Manuals and Software that are a part of this Hardware purchase.
• Submit in Printed format, three copies.
• Submit in Electronic Format, Microsoft Word for documents, .PDF, Visio, for drawings, etc., as agreed upon award of contract.

**ACCEPTANCE OF SYSTEM**

The CCBOC will sign off as completed on these systems, once a walk through has been done, any punch list items completed, any configuration files, software, manuals, have been turned over, and training has been completed.

**SELECTION CRITERIA**

• Award of this contract is to be a Best Value Award.
• Ability to Integrate directly with and support the existing County Hewlet Packard Switched Data Network.
• Ability to provide Maintenance and Configuration Support.
• Warranty.
• Cost/Availability of Firmware, IOS, etc upgrades.
• Price.
• Future Expandability.
• Browser Based Interface capabilities.
• Browser Based Interface Ease of Use.

It is intended that a robust, yet cost effective, Core Network Switch be installed that will support the current and planned IP Ethernet Communication requirements of the CCBOC. Particular attention must be paid to the intended use of this Hardware. All minimum requirements must be met in order to qualify unless changed or corrected by addendum.

**PREPARATION OF BID**

• Contractors are expected to thoroughly and completely examine and familiarize themselves with this RFP.
• Failure in any area of this RFP, to understand the content, will be at the Contractor's risk.
• Each Contractor shall furnish the information required by this RFP.
• The Contractor shall sign the bid in the appropriate spaces.
• Each Contractor by making a proposal represents that they have visited the site and familiarized themselves with the local conditions under which the work is to be performed.
Each Contractor by making a proposal represents that they have read and understand the RFP documents.

Contractor must provide Certificate of Insurance for Automobile Liability, General liability, and Workers’ Compensation prior to order to proceed.

Completeness of Bid

- All Contractors are cautioned to make the Bid complete and to furnish all required information and details.
- Your Bid Package must break cost into materials and labor.
- Any changes to the RFP will be made in the form of an Addendum.

Contractor Questions

- Any explanation desired by a Contractor regarding vague or not understood wording, meaning, or Interpretation of any portion of this RFP may be made in writing to John L. Crow, III at the contact information at the end of this section.
- Questions are due no later than 2:00 PM EDT, Friday, May 28, 2010.
- Answers given to a Contractor concerning this RFP will be furnished to all Contractors as an addendum to this RFP.
- Receipt of all addenda by a Contractor must be acknowledged on the bid.
- Written instructions or explanations not bearing the signature of John L. Crow, III, or oral instructions or explanations given before the award of the bid contract, will not be binding on CCBOC.

John L. Crow, III
210 S 7th St, Room 307, Cordele GA, 31015
john.crow@crispcounty.com
Fax 229-276-2675

Submission of Bid Package

Contractors are to submit their Design Proposal and Bid Documents to the following address prior to 2:00 PM EDT, Wednesday, June 16, 2010:

Crisp County Board of Commissioners
“Core Network Switch Proposal”
Attn: Mr. Lester E. Crapse
210 S. 7th St
Cordele GA, 31015

Maintenance/Service

Provide 24/7/365 support. 2-hour response time on critical failures.
Attachment A
Core Network Switch Design and Installation Proposal

Place: Crisp County Board of Commissioners
210 S 7th St
Cordele, GA 31015

Date: June 16, 2010
Time: 2:00 PM EDT

Proposal of ________________________________DBA______________________________________
(Hereinafter called Contractor) organized and existing under the laws of the State of

Georgia, as a ____________________________________________________________
(Corporation, partnership, individual)

To: The Crisp County Board of Commissioners (hereinafter called CCBOC).

Gentlemen:

The Contractor, in compliance with your invitation for proposals from qualified Data Network Design Contractor, knowing the site of the proposed work, and being familiar with all the conditions surrounding this project, hereby submits the following proposal:

Contractor acknowledges the receipt of the following addendum (if any):
________________________________________________________________________________
________________________________________________________________________________

Contractor agrees to be prepared to commence work on requested tasks Wednesday, June 28, 2010, No later than 9:00 AM EDT.

Contractor agrees to perform all of the work described in the PROJECT DESCRIPTION, and the SCOPE OF WORK provided herewith, as presented in the Request for Proposal as requested at the rates set forth below:

Total Project Cost: $________________________________________________________

The Contractor provides the following estimates:

1. Itemized cost of materials.
2. Itemized cost of labor.

The Contractor understands that compliance with all applicable Federal, State and Local Law, Rules and Regulations is required.
The Contractor understands that he must comply with the Copeland “Anti-Kick Back” Act. This act provides that each contractor shall be prohibited from inducing, by any means, any person employed in the conduct of public work to give up any part of the compensation to which he is otherwise entitled.

The Contractor understands that he must provide Certification of Equal Opportunity Employer, Drug Free Workplace, and D.B.E. Candidate or Minority Contractor status where applicable. D.B.E Contractors are encouraged to participate.

The Contractor understands that he must comply with the **Georgia Security and Immigration Compliance Act:**

1. Contractor and any and all sub-contractors utilized in conjunction with services provided to local government will comply with the requirements of O.C.G.A. § 13-10-91 and the Georgia Department of Labor's Rule 300-101-.02.
2. Contractor must indicate the appropriate blank: Contractor employs: __ 500 or more employees; __ 100 to 499 employees; __ 99 or fewer employees.
3. Contractor will provide a lawfully executed affidavit or substantially similar affidavit to the Georgia Department of Labor’s’ Contractor Affidavit, as set forth in Rule 300-10-1-.07, to the local government which will be a material term of the contract and incorporated into the contract.
4. In the event that Contractor employs or contracts with any subcontractor(s) in conjunction with this contract, Contractor will secure from each and every subcontractor a written representation of the number of employees each subcontractor employs as being 500 or more employees, 100 to 499 employees or 99 or fewer employees.
5. Contractor will provide lawfully executed affidavits or substantially similar affidavits from each and every subcontractor utilized in conjunction with this agreement and will provide copies of those affidavits to the local government. These subcontractor affidavits will be attached and incorporated into this agreement. The subcontractor affidavit should be identical or substantially similar to the subcontractor affidavit prepared by the Georgia Department of Labor at Rule 300-10-1-.08. This subcontractor affidavit also must be or become a part of any agreement between the Contractor and Subcontractor.
6. Contractor and any subcontractor that provides services related to the contract understands and acknowledges that it may be subject to audit by the Georgia Department of Labor for its compliance with O.C.G.A. 13-10-90 et seq. and all implementing rules.

The Contractor agrees that this bid shall be valid and may not be withdrawn or revoked for a period of sixty (60) calendar days after the scheduled bid opening time.

Respectfully submitted by:

______________________________
(Seal-if Contractor is a corporation)

______________________________
(Title)

______________________________
(Business address)
Attachment B
GSICA CONTRACTOR AFFIDAVIT AND AGREEMENT

By executing this affidavit, the undersigned contractor verifies its compliance with O.C.G.A. 13-10-91, stating affirmatively that the individual, firm, or corporation that is contracting with Crisp County Georgia has registered with and is participating in a federal work authorization program* [any of the electronic verification of work authorization programs operated by the United States Department of Homeland Security or any equivalent federal work authorization program operated by the United States Department of Homeland Security to verify information of newly hired employees, pursuant to the Immigration Reform and Control Act of 1986 (IRCA), P.L. 99-603], in accordance with the applicability provisions and deadlines established in O.C.G.A.13-10-91.

The undersigned further agrees that, should it employ or contract with any subcontractor(s) in connection with the physical performance of services pursuant to this contract with Crisp County Georgia, contractor will secure from such subcontractor(s) similar verification of compliance with O.C.G.A. 13-10-91 on the Subcontractor Affidavit provided in Rule 300-10-01-.08 or a substantially similar form. Contractor further agrees to maintain records of such compliance and provide a copy of each such verification to the County Administrator of Crisp County Georgia at the time the subcontractor(s) is retained to perform such service.

Contractor must indicate the appropriate blank: Contractor employs _ 500 or more employees; __ 100 to 499 employees; __ 99 or fewer employees;

EEV / Basic Pilot Program* User Identification Number: ______________________

BY: Authorized Officer or Agent: _________________________________________

Contractor Name: ____________________________________________________

Title of Authorized Officer or Agent of Contractor: ____________________________

Printed Name of Authorized Officer or Agent: _______________________________

Date: ________________

Subscribed and sworn before me on this the ____ day of ____________________, 200__.  

Notary Public

My Commission Expires: _______________________________

* As of the effective date of O.C.GA 13-10-91, the applicable federal work authorization program is the "EEV (Basic Pilot Program" operated by the U. S. Citizenship and Immigration Services Bureau of the U. S. Department of Homeland Security, in conjunction with the Social Security Administration (SSA). (End of Form)
SUBCONTRACTOR AFFIDAVIT

By executing this affidavit, the undersigned subcontractor verifies its compliance with O.C.G.A. 13-10-91, stating affirmatively that the individual, firm or corporation that is engaged in the physical performance of services under a contract with _______________________________ (Name of Contractor) on behalf of Crisp County Georgia has registered with and is participating in a federal work authorization program* [any of the electronic verification of work authorization programs operated by the United States Department of Homeland Security or any equivalent federal work authorization program operated by the United States Department of Homeland Security to verify information of newly hired employees, pursuant to the Immigration Reform and Control Act of 1986 (IRCA), P.L. 99-603], in accordance with the applicability provisions and deadlines established in O.C.G.A. 13-10-91.

Contractor must indicate the appropriate blank: Contractor employs:

__ 500 or more employees:

__ 100 to 499 employees;

__ 99 or fewer employees;

EEV / Basic Pilot Program* User Identification Number: _____________________________

BY: Authorized Officer or Agent: ________________________________

Contractor Name: _________________________________________________________

Title of Authorized Officer or Agent of Contractor: _____________________________

Printed Name of Authorized Officer or Agent: ________________________________

Date: __________________________________________________________________

Subscribed and sworn before me on this the ____day of _____________________, 200__.

Notary Public:

My Commission Expires: ____________________________________________

* As of the effective date of O.C.G.A 13-10-91, the applicable federal work authorization program is the "EEV / Basic Pilot Program" operated by the U.S. Citizenship and Immigration Services Bureau of the U.S. Department of Homeland Security, in conjunction with the Social Security Administration (SSA).