

The School District of Newberry County is accepting proposals for the purchase and installation of Seon Digital Camera Systems (or equivalent/better) for school buses that are housed at the following location during the summer months.

Location:

Newberry School Bus Maintenance Shop  
1150 Airport Road  
Newberry, SC 29108

Proposals must be in writing and submitted to the Transportation Department on or before July 12, 2012. They may be mailed, or hand delivered to:

Penney Nichols  
PO Box 718  
1539 Martin St  
Newberry, SC 29108

**Description of Purchase**

- 26 units TL4 Channel Recorder w / 320GB Drive, 20' Power Harness
- 26 units TL4 Wiring Bundle (Diagnostic Display / Panic Button, 20' Signal Input Harness)
- 26 units SQ Infrared Dome Camera, 540TVL Day / Night, Audio with high resolution color / night vision lens
- 26 On-site installation
- 01 Premium software kit with peripheral and all accessories to include software with blurring feature.
- 01 On-site software and hardware training
- 05 "Spare" 320GB Hard Drive for the TL4 Digital Recording System

**Description Digital Video Recording System**

- The DVR must record up to 4 channels of video simultaneously, "**switching**" systems **not acceptable**.
- The DVR must have 4 channels of audio.
- The DVR must be capable of both vertical and horizontal mounting, including under-mount.
- The DVR must support data storage on 2.5 mobile ruggedized hard drives.
- Hard disk capacity must be a minimum of 320 GB
- The DVR hard drive must be hot swappable and mounted in a removable, locking carrier.
- The DVR hard drive must connect to a PC or laptop via a USB cable.
- The DVR must offer a "One Touch Download" feature to download recordings with a single key press.
- The DVR must have alarm settings and be programmable by recording resolution, frame rate, and quality per video channel,
- The DVR must have:
  - Compression: H.264
  - Recorded Resolution: Selectable 720 x 480, 720 x 240, or 360 x 240

Recorded Quality Settings: 4 levels, adjustable for each channel  
Per Channel Recording Rate: 1 to 30 frame per second, adjustable for each channel  
Aggregate Recording Rate: 60 frames-per-second

- The DVR must have automatic repeat-record when hard drive is full (user selectable on/off).
- The DVR must have configurable protected memory for alarms.
- The DVR must have programmable timer record setting with selectable frames rates and image quality.
- The DVR must record vehicle voltage.
- The DVR must record vehicle position, direction, and speed with an optional GPS receiver.
- Vehicle speed recording using optional speed harness; external speed conditioner Not required
- The DVR must record up to five functions (signals) including brake lights stop lights, warning lights, turn signal, stop arm, wheelchair lift, etc. (user programmable).
- DVR record Delay Off : 0-60 min (user-selectable)
- DVR record Delay On: 0-60 min (user-selectable)

### **Video and Data Search Playback and Display Specifications**

- Display modes: Single camera, quad
- Playback rate: 1x to 32x
- Search function: By time and date or event, alarms, signals
- User interface: OSD with remote control, pointing device, web browser, vMax software suite
- On-screen display vehicle position, direction, and speed if equipped with optional GPS receiver.
- On-screen display vehicle speed using optional speed harness; **external speed conditioner Not** required
- On-screen voltage display
- On-screen time and date display
- On-screen display of up to five functions (signals) including brake lights, stop lights, warning lights, turn signal, stop arm, wheelchair lift, etc...(user programmable Built-in real time clock with automatic Daylight Savings Time adjustment (selectable on / off)
- Automatic Daylight Savings start/end dates and times setting must be configurable.

### **Electrical Specifications**

- The DVR must have input voltage range from 8VDC to 32VDC
- The DVR must have Smart-Smart power up protection to prevent damage from extreme environmental conditions and voltage transients
- Back-up battery saves settings for 10 years without powering the unit

### **Remote Access Specifications**

- The DVR must include Ethernet network port (RJ45) for the connection to a Local Area Network (LAN) or wireless modem.
- The DVR must have multilevel user access control and must be password protected.
- The DVR must support industrial WiFi networking with Smart-Reach Mobile (wireless bridge) or equivalent with roaming capability. **Consumer-grade bridge is not acceptable.**
- The DVR must have a temporary power button for operation and programming when bus is off.
- The DVR must have a front panel video output for easy setup and programming.
- The DVR must have a programmable monitor output for quad view or toggle view of video.
- The recorded video and audio can be transferred to a PC by means of the hot-swappable hard drive, USB flash drive, or wireless transmission via Smart-Reach mobile (industrial wireless bridge) or equivalent.
- The DVR must be able to transfer recorded video and audio to a removable USB flash drive.

### **Mechanical Specifications**

- The DVR must have an 18 gauge steel enclosure, powder painted finish with tamper-proof lock.
- The lock box and DVR are integrated with removable locking door for easy access to the DVR. **Separate lock box is not acceptable.**
- The door must have rounded edges for safety. **Straight edges are not acceptable.**
- The DVR must attach to a low profile mounting plate.
- The DVR must be capable of vertical, sideways, and horizontal mounting.
- The DVR dimensions: 2.5" x 7" x 9.5" (HxWxD)

### **Environmental Requirements**

- The DVR must have a built-in fan (reversed to draw clean filtered air into the DVR); field-replaceable filter.
- The DVR must come standard with built-in internal heater.
- The DVR must have a high and low temperature protection – the DVR will power up but will not start recording until a safe internal temperature is reached.
- The DVR must have a Smart-Start power-up protection to prevent damage from voltage transients.
- The DVR must have a Smart-Temp power-up protection to not start recording until a safe internal temperature is reached.

### **Software Requirements**

- The HD Reader Software must be able to save recordings in a proprietary EDS format as well as in a standard AVI. The format can be played back on a standard PC running Windows XP, XP Pro and Windows 7 OS.
- The DVR firmware must be field upgradeable.

### **Warranty Requirements**

- The DVR must have a minimum 3-year parts and labor warranty.
- The Hard Drive must have a minimum 3-year parts and labor warranty.

### **Camera Minimum Specifications**

- Resolution: 520 TV lines
- Light sensitivity: 0.1 lux at F1.2 (B&W, D/N); 0.00 lux with IR illumination
- Day/Night Function: Auto switches to B&W at low illumination
- Imager: 1/3" Sony CCD
- Infrared Illuminators: 14 high efficiency illuminators
- Automatic Electronic Iris: 1/60-1/100,000 sec
- Signal to noise ratio: Greater than 50 dB (AGC off)
- Video output: 1 VP-P/75 Ohms
- Warranty: minimum 3 years parts and labor

### **Audio Minimum Specifications**

- Audio output: Line level
- Frequency response: 300 Hz - 5 KHz (filtered to improve voice quality)
- Sensitivity: Sensitivity adjustable

### **Mechanical Specifications**

- The dome camera must have dimensions no larger than Diameter: 3.75" (95mm) and Height: 3.4" (86mm).
- The dome camera must use a single secured locking screw.
- The dome camera must be flush mountable to the mounting surface, such that the electrical cable connecting the dome camera to the recorder remains concealed.
- The dome camera must have an adjustable lens bracket with 360 degree pan and 90 degree tilt.

- The dome camera must have the ability to conceal the internal electronics from outside view.
- The dome camera must have the following mechanical specifications:
- Weight: 0.9 lbs (0.4 kg)
- Dome Material: Impact-resistant polycarbonate, anti-glare, scratch-resistant hard coating, UV protected
- Housing Material: Solid aluminum alloy
- Mounting Options: Ceiling, Header or Surface, no brackets required

### **Electrical Specifications**

- The dome camera must have a built-in regulated power supply.
- The dome camera must have backlight compensation control that can be turned ON or OFF in order to compensate the exposure of the camera for strongly backlit scenes.
- The dome camera must have a second video out for local monitoring of the video during setup and installation
- The dome camera must have a single connector for power, video and audio.
  
- Power consumption: 1.3 W (IR on)  
2.7 W (IR off)
- Input voltage: 11 to 17 VDC

### **Environmental Specifications**

- Operating temp. range: -4°F to 140°F (-20° C to 60°C)
- Environmental rating: IP54

### **Description of work**

The scope of work for this project consists of the installation of the Recorders, the installation of the Dome Cameras, running of all wiring harnesses from the recorders to the cameras using state regulations, and technicians based in South Carolina.

Vendor must be an authorized seller for the cameras proposed, be certified to install or arrange for all installation and maintain the proposed cameras.

Furnish and install (26) TL4 Channel recorders and (26) SQ Infrared Dome cameras (or equivalent/better). Installer will need to run the wiring harnesses for cameras to the recorders to power source (in 3/4 or 3/8 convoluted- tubing where necessary). The vendor will provide installation and training of all necessary software/licenses for the camera systems.

If Vendor submits a proposal for any camera other than the proposed, the School District of Newberry may request an on-site demonstration of the camera and equipment before the proposal is awarded.

Vendors must include all sales tax and applicable charges in the bid.

Bids must include all shipping cost for the complete units.

If any person contemplating submitting a proposal for the proposed work is in doubt as to the true meaning of any part of the RFP, or finds discrepancies in, or omissions herein, the person may submit to the Transportation Department written request for clarification or correction.

Written requests for clarification or correction of this RFP must be received no later than three (3) calendar days prior to proposal submission deadline.

Notification letters will be mailed. Vendors should receive a letter by July 19, 2012.

Criteria for evaluation of proposal:

**A. Quality of Response – 40 points**

- **1. Level of Experience (10 points).** Describe how the qualification and experience of your firm best meet the requirements of this RFP. Proposals must include the following:
  - a. How long the Firm has been in business.
  - b. How much experience the firm has performing similar work.
- **2. Fulfillment and Support (18 points).** Describe the key personnel assigned to SDNC's account and personnel assigned to provide sales and service support to SDNC's members. Proposals should include the following:
  - a. Name of dedicated account representative to handle NCSD's product, pricing and support questions.
  - b. Professional development the firm provides around requested products.
  - c. Technical support available to NCSD – how to request replacement parts, turn-around time on replacement parts, length of warranty/coverage, etc.
- **3. References (10 points).** Provide at least 3 educational references, preferably from within South Carolina.
- **4. Proposal (2 points)**
  - a. Were all directions for this RFP followed?

- b. Is the proposal logical, reasonable and professional?
- c. Vendor acknowledged and signed that they accept all terms as laid out by the RFP and/or any Addendums.

**B. Pricing – 60 points**

- 1. The lowest responsive price proposal shall receive the full point value for this section; other proposals will receive points in inverse proportion to the lowest bid.

**The School District of Newberry County reserves the right to refuse any and all proposals and waive informalities and minor irregularities in proposals received.**