

# **ARLINGTON COUNTY, VIRGINIA**

# AGREEMENT NO. 22-DES-ITB-300 AMENDMENT NUMBER 1

This **Amendment Number 1** is made on the date of execution by the County and amends Agreement Number 22-DES-ITB-300 ("Main Agreement") dated November 30, 2021 between **Econolite Control Products, Inc.** ("Contractor") and the **County Board of Arlington County, Virginia** ("County").

The County and the Contractor agree to amend the Main Agreement as follows:

- <u>Contract Renewa</u>l: Pursuant to clause 4. Contract Term, the contract is hereby renewed for its 2<sup>nd</sup> optional contract term for not more than 12-month period, From December 1, 2023 to November 30, 2024.
- Contract Price Increase: Pursuant to clause 5. Contract Price Adjustment, the contract amount/unit price (s) is hereby increased by 3.7%, consistent with the change in the U.S. Department of Labor Consumer Price Index, All Items, Unadjusted, Urban Areas (CPI-U) for the 12-month period ending August 30, 2023. A revised Price Schedule is attached to this Amendment No. 1.
- 3. **Specification:** Pursuant to clause 2. Scope of Work, the contract Specification is hereby revised. A revised Specification is attached to this Amendment No. 1.
- 4. Remove the <u>COVID-19 VACCINATION POLICY FOR CONTRACTORS IN CLAUSE 23. COVID 19 VACCINATION POLICY FOR CONTRACTORS</u> in its entirety.

All other terms and conditions of the Main Agreement remain in effect.

WITNESS these signatures:

| COUNTY, VIRGINIA                                 | ECONOLITE CONTROL PRODUCTS, INC.                             |
|--|--|
| AUTHORIZED DocuSigned by: SIGNATURE: Sy Gazalium | AUTHORIZED Docusigned by:  SIGNATURE: Docusigned by:  Maddin |
| NAME:  | NAME:  |
| TITLE: PROCUREMENT OFFICER                       | TITLE: Vice President, East                                  |

| ATE: 11/30/2023 | DATE: | 11/29/2023 |
|-----------------|-------|------------|
|-----------------|-------|------------|

#### II. REVISED SPECIFICATIONS

#### A. INTRODUCTION

The purpose of this solicitation is to establish a contract with a qualified firm to furnish and deliver Traffic Signal ATC cabinets with associated equipment for Arlington County's (the County) Traffic Signal System on an as-needed, requirements basis. Any contract awarded pursuant to this solicitation shall be for a base contract period of one (1) year, with contract period extension option allowances at the County's option for up to four (4) additional 12-month period. The Contractor shall provide all goods, materials, equipment, supplies, incidentals and technical services as required in the Agreement. The cabinet assembly shall comply with the following specifications and attached drawings.

# B. REQUIREMENTS

# 1) Manufacturer Qualifications

a. To ensure manufacturing quality of the cabinet the manufacturer shall be certified in the IPC "Class 2" training for all manufacturing staff. Proof of this or equivalent certification shall be submitted with the bid package to be considered responsive.

# 2) General Cabinet Specifications

- a. The traffic signal control cabinet assembly shall meet at a minimum all applicable sections of ATC 5301 V02 Advanced Transportation Controller Cabinet Standard.
- b. The cabinets component layout shall match the Arlington County ATC Cabinet Layout Diagram 70-02.
- c. The cabinet shall have 19" rack(s) in cabinet form assembly and component mounting.
- d. All individual wiring in the cabinet shall be run in loom material and should be secured with zip ties a minimum of every 6 inches.
- e. The cabinet shall be UL 508 certified.
- f. The cabinet shall be a "Touch Safe" enclosure.
- g. All cabinets for new installations or replacements shall be Size and type designated by the signal plan and detailed below.
- h. Cabinets shall be pre-wired and tested prior to delivery to the county facility. Evidence and documentation of such testing shall be included in the cabinet document package.
- i. Cabinets shall include 3 sets of cabinet drawings and schematics labeled for the specific intersection and cabinet serial number.
- j. The cabinet shall be constructed of 0.125" Aluminum.
- k. The cabinet(s) shall be equipped with a police panel that contains the following:
  - i. Flash/ Auto switch- to activate local flash in the cabinet.
  - ii. Signal/ Off switch shall turn of all field indications without disturbing power or the operation of the components within the cabinet.
  - iii. A weatherproof ethernet connector shall be installed in the police panel with a 10' ethernet cable provided for switch connection.

#### I. Finish:

i. Exterior: The exterior of the cabinet shall be RAL 7040 Grey powder coat with anti-graffiti coating.

- ii. Interior: White powder coat on interior.
- iii. The manufacturer shall include the option of a Black Powder coated exterior cabinet with heat deflector panels on all sides of the cabinet as a separate line item in order to be considered responsive.
- m. Lifting ears shall be provided that can be turned down or removed after use.
- n. The panel of all individual assemblies near terminal bars and pluggable connections shall be labeled and color coded with silk-screening to identify terminal and or connector use and operation per designation:
  - i. Red-Red Interval or Don't Walk
  - ii. Yellow-Yellow Interval
  - iii. Green- Green Interval or Walk
  - iv. Red Diagonal Stripe- AC+
  - v. White with Black Text- AC-
  - vi. Green Diagonal Stripe Earth Ground
  - vii. Yellow Diagonal Stripe- DC+
  - viii. Grey Diagonal Stripe- Logic Ground
- o. The cabinet shall be compatible with all ATC capable controllers including Intelight X3 as well as standard shelf and rack mount ATC Controllers.
- p. The Cabinet shall have a built in HBL 2315 Genset receptacle and integrated Generator Transfer Switch. This will allow for the cabinet to run off of a generator in the event of a power outage while isolating the utility power connection. This switch shall also allow for the seamless integration of a battery backup system with Line and Load terminals to allow for modification of cabinet wiring during the integration process. Schematics for this system shall be included in the plan set to be considered responsive.
- q. Cabinet General Component Specifications:

# i. <u>Controller Section</u>

- a) A Shelf shall be provided for shelf mount ATC controller positioned to allow for 12" of height for the controller
- b) The power cable shall be a small "A" style and allow for connection on both the front and rear of the controller.
- c) The SDLC cable shall allow for connection on both the front and backside of the cabinet.

# ii. **Input Assembly**

- a) Shall include one single 48-channel rack that has 2 SIUs that provide 8 optically isolated inputs for ped buttons (4 per SIU)
- b) Shall come equipped with one (1) four Channel DC Isolator.
- c) Detector cards shall be hot-swappable
- d) Dimensions shall be approximately 5.2" H x 9.7" D x 19" W

# iii. Output Assembly

- a) Shall be a 16-channel output assembly that has 1 SIU and 1 CMUip-2212 Cabinet Monitor.
- b) Shall have front panel Stop time, Flash, and CMU reset switches.
- c) Shall support 120 VAC field applications.
- d) Circuit breaker protection shall be provided for SIU's.
- e) Output assembly shall come equipped with eight (8) 2202-HV HDSP's and four (4) spare 2202- HV HDSP's.
- f) CMU shall use data key from programming rather than program card.
- g) Dimensions shall be approximately 5.2" H x 10.9" D x 19" W

# iv. **Auxiliary Display Unit**

- a) Shall provide a complete display of intersection indications
- b) Shall provide a LCD interface for CMU and a built in Diagnostic wizard.

# v. Field Output Termination Panel

- a) Shall support 16 channels of field indications with two removable touch safe locking connectors for each channel.
- b) Shall provide one HD hermetically sealed flash transfer relays with LED indicators for each channel
- c) Shall provide pluggable surge protection and a hinged design for easy access with integrated wire management.

# vi. **Test Input Panel**

- d) Shall provide twenty-four (24) 3-position micro switches for detectors 1 through 16 and pedestrian detectors 1 through 8.
- e) Each switch shall provide a constant on, constant off, and momentary on position.
- f) The panel shall have labeling designating individual switch channel designation.

# vii. Field Input Termination Panel

- g) Shall accommodate up to 24 loop termination points.
- h) Shall provide pluggable surge protection for each loop channel
- Shall provide removable connectors and a hinged design along with integrated wire management.
- j) Dimensions shall be approximately 7.8" H x 4.4" D x 19" W

# viii. **Auxiliary Input Termination Panel**

- a) Shall accommodate up to 24 auxiliary termination points.
- b) Shall provide removable connectors and a hinged design along with integrated wire management.

# ix. Power Supply

- a) Shall provide 175 watts of total power with 48 VDC Aux output and fully isolated 24 VDC and 12 VDC outputs.
- b) Shall provide Output protection for both overcurrent and transient voltages.

# x. Service Assembly

- a) Shall provide connection terminals for utility and generator or UPS power supplies.
- b) Shall contain a removable flasher to allow for flash operation during component replacement
- c) Shall contain a TEES compliant pluggable 40,000 volt transient voltage surge suppressor with health indicator LED
- d) Shall contain 20 amp Main breaker, 15 amp Clean breaker, 15 amp GFCI breaker, and 15 amp Output assembly breaker.

# xi. PDU Power Strip

- a) Single phase switched Automatic Transfer Switch PDU power strips hard wired into the cabinet clean AC circuit to provide outlets for equipment. One strip should be mounted in the front side of each rack of the cabinet
- b) Shall be networkable.

#### xii. Medeco XT Square Lock

a) Shall be compatible with the current Medeco XT client application

# xiii. Cabinet Fan

- a) Shall allow for toolless replacement.
- b) Shall have a pluggable connection for power connection.
- c) Shall be serviceable without removing other components

# xiv. Cabinet Door

a) All Doors shall be full sized door with a vent in the door for air circulation.

# xv. Cabinet Lighting

- a) Adjustable LED lights shall be provided above each door.
- b) Additional lighting shall be provided along the inside side and center rails of the cabinet.

# xvi. Pull Out Document Drawer/ Shelf

- a) Shall be positioned immediately under the controller section of the cabinet rack.
- b) One shall be positioned immediately above the UPS side PDU.

# 3) Cabinet Assemblies

#### a. CABINET A – Standard Cabinet

- i. Dimensions 67 "H x 45" W x 26" D
- ii. This cabinet shall come with a cabinet riser that includes a galvanized ¾" connecting bolt kit. The riser dimensions shall be 6" H x 45" W x 26" D and the bolt pattern shall match the cabinet. The risers exterior finish shall match that of the cabinet.
- iii. This Cabinet shall be able to handle 16 channels of outputs and 48 detector inputs.
- The layout of the traffic signal control cabinet assembly shall conform to the ATC 5301 V02 Advanced Transportation Controller Cabinet Standard.
- v. The front right of the controller cabinet shall contain the controller and all input and output assemblies.
- vi. The front left of the controller cabinet shall contain the power strip listed below and shall be reserved for rack mount UPS equipment. The bottom half of this section shall contain (3) shelves spaced approximately 12 inches apart for Battery and component storage.
- vii. The rear right section of the cabinet shall be reserved for County network and ITS equipment.
- viii. The rear left section of the cabinet shall contain the field termination panel(s).
- ix. Each cabinet door shall have two switches. One switch shall activate the cabinet lighting and the other shall be wired directly to the aux IO panel for auxiliary functions.
- x. The door switches shall be wired accordingly: front right- test A, front left test B, rear right test C, rear left test D.
- xi. Cabinet General Component List with Quantities:

| List                              | Quantity |
|-----------------------------------|----------|
| Controller Section                | 1        |
| Input Assembly                    | 2        |
| Output Assembly                   | 2        |
| Auxillary Display Unit            | 1        |
| Field Output Termination Panel    | 1        |
| Test Input Panel                  | 1        |
| Field Input Termination Panel     | 1        |
| Auxillary Input Termination Panel | 1        |
| Power Supply                      | 1        |
| Service Assembly                  | 1        |
| PDU Power Strip                   | 2        |
| Medeco XT Square Lock             | 4        |
| Cabinet Fan                       | 2        |
| Cabinet Door                      | 4        |
| Cabinet Lighting                  | 4        |
| Pull Out Document Drawer/Shelf    | 2        |

# b. CABINET B - 32 Channel Cabinet

- i. Dimensions 67 "H x 45" W x 26" D
- ii. This cabinet shall come with a cabinet riser that includes a galvanized ¾" connecting bolt kit. The riser dimensions shall be 6" H x 45" W x 26" D and the bolt pattern shall match the cabinet. The risers exterior finish shall match that of the cabinet.
- iii. This cabinet shall be able to handle 32 channels of outputs and 48 detector inputs.
- The layout of the traffic signal control cabinet assembly shall conform to the ATC 5301 V02 Advanced Transportation Controller Cabinet Standard.
- v. The front right of the controller cabinet shall contain the controller and all input and output assemblies.
- vi. The front left of the controller cabinet shall contain the power strip listed below and shall be reserved for rack mount UPS equipment. The bottom half of this section shall contain (3) shelves spaced approximately 12 inches apart for Battery and component storage.

- vii. The rear right section of the cabinet shall be reserved for county network and ITS equipment.
- viii. The rear left section of the cabinet shall contain the field termination panel(s).
- ix. Each cabinet door shall have two switches. One switch shall activate the cabinet lighting and the other shall be wired directly to the aux IO panel for auxiliary functions.
- x. The door switches shall be wired accordingly: front right- test A, front left test B, rear right test C, rear left test D.
- xi. Cabinet General Component List with Quantities:

| List                              | Quantity |
|-----------------------------------|----------|
| Controller Section                | 1        |
| Input Assembly                    | 2        |
| Output Assembly                   | 2        |
| Auxiliary Display Unit            | 1        |
| Field Output Termination Panel    | 2        |
| Test Input Panel                  | 1        |
| Field Input Termination Panel     | 2        |
| Auxiliary Input Termination Panel | 1        |
| Power Supply                      | 1        |
| Service Assembly                  | 1        |
| PDU Power Strip                   | 2        |
| Medeco XT Square Lock             | 4        |
| Cabinet Fan                       | 2        |
| Cabinet Door                      | 4        |
| Cabinet Lighting                  | 4        |
| Pull Out Document Drawer/Shelf    | 2        |
| Network Switch Bracket            | 1        |
| ITS Bracket                       | 1        |

# c. CABINET C – Compact Cabinet

- i. Dimensions 67 "H x 24" W x 30" D
- ii. This cabinet shall come with a cabinet riser that includes a galvanized  $\frac{3}{4}$ " connecting bolt kit. The riser dimensions shall be 6"H x 24" W x 30" D and the bolt pattern shall match the cabinet. The risers exterior finish shall match that of the cabinet.
- iii. This cabinet shall be able to handle 32 channels of outputs and 48 detector inputs.

- iv. The layout of the traffic signal control cabinet assembly shall conform to the ATC 5301 V02 Advanced Transportation Controller Cabinet Standard.
- v. The front right of the controller cabinet shall contain the controller and all input and output assemblies.
- vi. The front left of the controller cabinet shall contain the power strip listed below and shall be reserved for rack mount UPS equipment. The bottom half of this section shall contain three (3) shelves spaced approximately 12 inches apart for Battery and component storage.
- vii. The rear right section of the cabinet shall be reserved for county network and ITS equipment.
- viii. The rear left section of the cabinet shall contain the field termination panel(s).
- ix. Each cabinet door shall have two switches. One switch shall activate the cabinet lighting and the other shall be wired directly to the aux IO panel for auxiliary functions.
- x. The door switches shall be wired accordingly: front test A, rear test D.
- xi. Cabinet General Component List with Quantities:

| List                                     | Quantity |
|--|----------|
| Controller Section                       | 1        |
| Input Assembly                           | 1        |
| Output Assembly                          | 1        |
| Auxiliary Display Unit                   | 1        |
| Final Output Termination Panel           | 1        |
| Test Input Panel                         | 1        |
| Field Input Termination Panel            | 1        |
| <b>Auxiliary Input Termination Panel</b> | 1        |
| Power Supply                             | 1        |
| Service Assembly                         | 1        |
| PDU Power Strip                          | 1        |
| Medeco XT Square Lock                    | 2        |
| Cabinet Fan                              | 1        |
| Cabinet Door                             | 2        |
| Cabinet Lighting                         | 2        |
| Pull Out Document Drawer/Shelf           | 1        |

#### d. CABINET D – Pole Mount Cabinet

- i. Dimensions 55" H x 24" W x 20" D
- ii. This Cabinet shall be able to handle 8 channels of outputs and 14 detector inputs.
- iii. The layout of the traffic signal control cabinet assembly shall conform to the ATC 5301 V02 Advanced Transportation Controller Cabinet Standard.
- iv. This Cabinet is intended to be Pole mounted. The cabinet shall be manufactured in such a way that provides switchable mounting brackets on either side of the cabinet.
- v. Lifting ears shall be provided that can be turned down or removed after installation.
- vi. The Cabinet shall contain a Combo I/O Assembly with 4 fixed input slots (4 inputs per detection module), 4 fixed output slots (2 channels, CMU, and the front panel Stop time, Flash, and CMU reset switches.
- vii. The Combo I/O Assembly shall come with a total of six (6) 2202-HV HDSP's (4 in use and 2 Spares)
- viii. Shall support 120 VAC field applications.
- ix. The front of the controller cabinet shall contain the controller and all input and output assemblies.
- x. The rear of the cabinet shall contain the field termination panel(s).
- xi. Each cabinet door shall have two switches. One switch shall activate the cabinet lighting and the other shall be wired directly to the aux IO panel for auxiliary functions.
- xii. The door switches shall be wired accordingly: front test A, rear test D.
- xiii. Cabinet General Component List with Quantities:

| List                                     | Quantity |
|--|----------|
| Controller Section                       | 1        |
| Input Assembly                           | 1        |
| Auxiliary Display Unit                   | 1        |
| 8 Channel Field Output Termination Panel | 1        |
| Test Input Panel                         | 1        |
| 16 Channel Field Input Termination       | 1        |

| Auxiliary Input Termination Panel | 1 |
|-----------------------------------|---|
| Power Supply                      | 1 |
| Service Assembly                  | 1 |
| PDU Power Strip                   | 1 |
| Medeco XT Square Lock             | 2 |
| Cabinet Fan                       | 1 |
| Cabinet Door                      | 2 |
| Cabinet Lighting                  | 2 |
| Pull Out Document Drawer/Shelf    | 1 |

# e. ATC Cabinet Conflict Monitor Tester

- i. The Tester shall be capable of automated testing of Conflict Monitor Units as defined by ATC Cabinet Standards.
- ii. The Tester shall include all required hardware and software to perform testing of these CMUs.
- iii. The Tester shall require a Microsoft Windows-based computer (PC) to process the supervisory software during testing process.
- iv. The PC operating system must be Windows 10 or newer and include a HTML browser and a PDF reader.
  - a) The supervisory software running on the PC shall provide the user interface for the Tester, allowing test setup, data entry, test report storage, retrieval, and review.
  - b) The supervisory software shall automatically sequence the Tester through the selected tests, accumulate results and assemble the test report. The testing process shall proceed automatically after the initial test setup.
  - c) The user interface shall provide for selection of CMU manufacturer, model, and other information pertinent to the test via menus that list the available options for each selection.
  - d) The supervisory software shall automatically sense the USB port used by the Tester hardware.
  - e) The supervisory software shall be capable of creating and storing a test report detailing the nature and number of tests applied to the monitor.

- f) The test report shall include; the start/stop time and date of the test, a listing of each test performed and the test result (PASS, FAIL).
- g) The report shall include operator entered text for the name of the jurisdiction, agency, or firm that is responsible for the testing; the CMU under test by Manufacturer, Model, and Serial Number; the person performing the test, and the location where the tests were performed. Additional text fields for comments or notes will be available.
- h) The test report shall form a self-sufficient, easily understood document that can be interpreted without the use of separate instruction sets or code explanation tables.
- The test reports shall be capable of being saved in terse and/or verbose formats by the user. In addition, during the test sequence the view can be toggled between terse and verbose formats.
- j) The test report may be saved on the PC that is running the software as an Adobe Acrobat PDF file at the conclusion of the test sequence.
- k) The available test modes shall include Certification testing,
   Diagnostic testing, Single and Multiple-lap testing.
- v. The tester shall be packaged in a 6U rack-mount chassis.
- vi. The tester dimensions shall be 19" W x 13" D x 10.5" H.
- vii. The tester shall be powered with 120VAC.
- viii. An optional Tester carrying case shall be provided for CMU field-testing.
  - a) The carrying case WILL include a pullout handle and wheels.
- ix. Multiple testers running simultaneous but independent tests shall be able to be controlled by one computer.
- x. The tester will run a series of comprehensive tests on the CMU to verify that it is functioning in compliance with the ATC standard.
  - a) The ATC standard that defines CMU operation is a joint publication of NEMA, AASHTO and ITE.
- xi. During actual testing, the controlling PC's display shall show the following information pertinent to the test in progress:

- a) The make, model, type, and serial number of the monitor being tested. The date and time of the beginning of the test.
- b) The Tester serial number and firmware version number.
- c) The test results of completed tests and title of the current test.
- d) The number of laps completed in the continuous testing mode.
- e) The number of tests failed.
- xii. The Tester shall perform the following pre-testing measures:
  - a) Test that a Data Key programmed appropriately for testing is inserted in the CMU.
  - b) Voltage self-test and timing self-test of the Tester to assure the accuracy of the test conditions and response measurement.
  - c) Pre-test the CMU for the presence of incorrect return voltages that could damage the Tester.
  - d) If these tests are not passed, the Tester shall alert the operator and halt the testing process.
  - e) The Tester shall include a User's Manual describing all steps in the setup of the Tester as well as unlimited telephone technical support for the purchasing agency or firm.
  - f) The Tester shall provide extensive on-screen prompting and Help files.

# f. Cabinet High Density Switch Pack Tester

- i. The Tester shall provide field output drivers and monitor voltage and current of the field outputs.
- ii. The Tester shall test for proper functioning of Serial Bus #3.
- iii. The Tester shall test for proper functioning in both switch pack mode and flasher mode.
- iv. The Tester shall ensure accurate voltage measurement for all tests within (± 2%, ref: ATC-5301, 6.2.2.2, 6.2.2.3)
- v. The tester shall be compatible with both a USB and Wireless connection
- vi. The Tester shall be capable of barcode scanning for accurate and quick entering of device serial numbers.

# 4) SHIPMENT AND DELIVERY

- a. The Contractor's price shall include all freight on board charges for delivery and unloading of the equipment and materials. Shipments shall be delivered to the County's Transportation Engineering and Operations Bureau at either location listed below designated at the time of order.
  - i. Trades Facility

Transportation Engineering and Operations Traffic Signal Section 4300 29th Street South Arlington, VA 22206

ii. Quincy Facility

Transportation Engineering and Operations
Traffic Signal Section
1435 N. Quincy St
Arlington, Va 22207

- **b.** Upon receiving the signed Call Order Form, the Contractor shall assign a unique shipment number (range to be decided by the County) and shall place labels on every package or parcel in the shipment for easy identification.
  - These labels containing shipment numbers shall be standalone labels not to be combined with or obscured by any other labels that may be placed on the package.
- **c.** Detailed instructions regarding shipment numbers and label sizes will be provided at the time of Contract Award.
- **d.** Upon shipment of orders and/or at least three (3) business days in advance of the expected delivery, Contractor shall provide the County with an Email notification that includes:
  - i. Copy of the packing slip (to include order number and PO number)
  - ii. Shipment number
  - iii. Tracking number (assigned by the Carrier)
  - iv. Expected date of Delivery
  - v. Arlington County reserves the right to refuse an entire shipment if the advance notice is not received.

# 5) LEAD TIMES

- a. The County will provide a Call Order form (Attachment E) with each order. The transmittal of the Call Order form to the Contractor will serve as Notice to Proceed (NTP) for each order and will be accompanied by the official PO.
  - i. The Contractor must receive a Call Order form and an official PO in order to release the order for production.
  - ii. The Contractor shall acknowledge receipt of the order by signing the Call Order form and returning to the County via email.
- **b.** Equipment lead time shall be no more than ninety (90) calendar days from the placement of the order (NTP date).
- **c.** Upon shipment of the materials, written shipping notification shall be provided to the Project Officer. Said shipment notification shall serve as the completion date for the lead time.

# <u>Arlington County Government</u> ATTACHMENT A: REVISED PRICE SCHEDULE

| NAME OF OFFEROR OR CONTRACTOR | SOLICITATION NAME | PAGE |
|-------------------------------|-------------------|------|
| Econolite Control Products    | 22-DES-ITB-300    | 1    |
| SCOPE OF WORK                 |                   |      |

The Manufacturer shall design equipment to meet county specifications, furnish cabinets and components for intersection retrofits, provide the intersection may be a component of the county will install these cabinets at signalized intersections to operate the intersection more efficiently and in a safer manner.

| ITEM<br>NO.        | SUPPLIES/SERVICES  | EST<br>QTY | UNIT    | U  | NIT PRICE | AMOUNT         |           | TEM PRICE /<br>ADJUSTED<br>PRICE |    | EM TOTAL PRICE<br>OTAL ADJUSTED<br>PRICE | Percent increase |
|--------------------|--|------------|---------|----|-----------|----------------|-----------|----------------------------------|----|--|------------------|
| Cabinets & Options |  |            |         |    |           |                |           |                                  |    |  |                  |
| 1                  | Cabinet A- 16 Channel 4 Door ATC Cabinet                     | 50         | ea      |    | 19,866.10 | \$993,305.00   |           | 21,813.00                        |    | 1,090,650.00                             | 10%              |
| 2                  | Cabinet B- 32 Channel 4 Door ATC Cabinet                     | 2          | ea      |    | 25,756.46 | \$51,512.92    |           | 28,281.00                        |    | 56,562.00                                | 10%              |
| 3                  | Cabinet C- 16 Channel 2 Door ATC Cabinet                     | 20         | ea      |    | 17,358.74 | \$347,174.80   |           | 18,001.01                        |    | 360,020.27                               | 3.7%             |
| 4                  | Cabinet D- 8 Channel 2 Door Temp Pole Mount Cabinet          | 2          | ea      |    | 12,818.55 | \$25,637.10    |           | 14,075.00                        | \$ | 28,150.00                                | 10%              |
| 5                  | Black Exterior with Heat Shields Option for 4 Door Cabinets  | 10         | ea      | \$ | 841.54    | \$8,415.40     |           | 872.68                           | \$ | 8,726.77                                 | 3.7%             |
| 6                  | Black Exterior with Heat Shields Option for 2 Door Cabinets  | 1          | ea      | \$ | 815.56    | \$815.56       |           | 845.74                           | \$ | 845.74                                   | 3.7%             |
| 7                  | 6" H x 45" W x 26" D Cabinet Riser - ( 4 Door)               | 12         | ea      | \$ | 360.71    | \$4,328.52     |           | 374.06                           | \$ | 4,488.68                                 | 3.7%             |
| 8                  | 6" H x 24" W x 30" D Cabinet Riser - ( 2 Door)               | 12         | ea      | \$ | 289.29    | \$3,471.48     | \$        | 299.99                           | \$ | 3,599.92                                 | 3.7%             |
|                    |  |            | t Compo |    |           |                |           |                                  |    |  |                  |
| 9                  | Input Assembly with Cables                                   | 10         | ea      | \$ | 550.00    | \$5,500.00     |           | 570.35                           | \$ | 5,703.50                                 | 3.7%             |
| 10                 | Output Assembly with Cables                                  | 10         | ea      | \$ | 616.99    | \$6,169.90     |           | 639.82                           | \$ | 6,398.19                                 | 3.7%             |
| 11                 | Auxiliary Display Unit                                       | 10         | ea      | \$ | 587.70    | \$5,877.00     |           | 609.44                           | \$ | 6,094.45                                 | 3.7%             |
| 12                 | Field Ouput Termination Panel                                | 10         | ea      | \$ | 832.98    | \$8,329.80     | \$        | 863.80                           | \$ | 8,638.00                                 | 3.7%             |
| 13                 | Auxiliary Input Termination Panel                            | 10         | ea      | \$ | 457.14    | \$4,571.40     |           | 474.05                           | \$ | 4,740.54                                 | 3.7%             |
| 14                 | Cabinet Power Supply   | 10         | ea      | \$ | 722.64    | \$7,226.40     |           | 749.38                           | \$ | 7,493.78                                 | 3.7%             |
| 15                 | Cabinet Service Assembly                                     | 10         | ea      | \$ | 414.29    | \$4,142.90     |           | 429.62                           | \$ | 4,296.19                                 | 3.7%             |
| 16                 | PDU Power Strip  | 10         | ea      | \$ | 518.75    | \$5,187.50     | \$        | 537.94                           | \$ | 5,379.44                                 | 3.7%             |
| 17                 | Cabinet Fan with mounting kit.                               | 10         | ea      | \$ | 60.71     | \$607.10       | \$        | 62.96                            | \$ | 629.56                                   | 3.7%             |
| 18                 | Cabinet Thermostat   | 10         | ea      | \$ | 102.14    | \$1,021.40     | \$        | 105.92                           | \$ | 1,059.19                                 | 3.7%             |
| 19                 | Adjustable LED Lighting Fixture ( Above Door)                | 10         | ea      | \$ | 67.58     | \$675.80       | \$        | 70.08                            | \$ | 700.80                                   | 3.7%             |
| 20                 | LED Light Strip ( Side Rails)                                | 10         | ea      | \$ | 67.58     | \$675.80       | \$        | 70.08                            | \$ | 700.80                                   | 3.7%             |
| 21                 | Serial Interface Unit  | 10         | ea      | \$ | 293.94    | \$2,939.40     | \$        | 304.82                           | \$ | 3,048.16                                 | 3.7%             |
| 22                 | CMUip-2212 Cabinet Monitor                                   | 10         | ea      | \$ | 728.63    | \$7,286.30     | \$        | 755.59                           | \$ | 7,555.89                                 | 3.7%             |
| 23                 | High Density Switch Pack                                     | 10         | ea      | \$ | 231.47    | \$2,314.70     |           | 240.03                           | S  | 2.400.34                                 | 3.7%             |
| 24                 | Half Width 4 Channel Detector Card                           | 10         | ea      | \$ | 329.90    | \$3,299.00     |           | 342.11                           | \$ | 3,421.06                                 | 3.7%             |
| 25                 | 4 Channel Detector Card with LCD                             | 10         | ea      | \$ | 327.90    | \$3,279.00     |           | 340.03                           | S  | 3,400.32                                 | 3.7%             |
| 26                 | Pluggable Surge Arrestors ( Field Output )                   | 10         | ea      | \$ | 20.71     | \$207.10       |           | 21.48                            | \$ | 214.76                                   | 3.7%             |
| 27                 | Pluggable Surge Arrestors ( Field Input )                    | 10         | ea      | \$ | 15.00     | \$150.00       |           | 15.56                            | \$ | 155.55                                   | 3.7%             |
| 28                 | Monitor Key Programming Tool                                 | 10         | ea      | \$ | 467.65    | \$4.676.50     |           | 484.95                           | \$ | 4.849.53                                 | 3.7%             |
| 29                 | Monitor Key  | 10         | ea      | \$ | 32.11     | \$321.10       |           | 33.30                            | \$ | 332.98                                   | 3.7%             |
| 30                 | Transient Voltage Surge Supressor                            | 10         | ea      | \$ | 105.00    | \$1,050.00     |           | 108.89                           | \$ | 1.088.85                                 | 3.7%             |
| 31                 | Flash Transfer Relay   | 10         | ea      | \$ | 41.23     | \$412.30       |           | 42.76                            | Š  | 427.56                                   | 3.7%             |
| 32                 | Rack Mount DC Isolator                                       | 10         | ea      | \$ | 85.27     | \$852.70       |           | 88.42                            | \$ | 884.25                                   | 3.7%             |
| 33                 | ATC Cabinet Conflict Monitor Tester                          | 2          | ea      |    | 12,621.03 | \$25,242.06    |           | 13,088.01                        | \$ | 26,176.02                                | 3.7%             |
| 34                 | ATC Cabinet High Density Switch Pack Tester                  | 2          | ea      |    | 10,290.38 | \$20,580.76    |           | 10,671.12                        | \$ | 21,342.25                                | 3.7%             |
| 35                 | Tester Case with pull-out handle and rolling wheels          | 2          | ea      | \$ | 757.18    | \$1,514.36     |           | 785.20                           | \$ | 1,570.39                                 | 3.7%             |
| 36                 | 50/50 IO Chassis with cables and jumpers                     | 10         | ea      | \$ | 1,561.00  | \$15,610.00    |           | 1,618.76                         | \$ | 16,187.57                                | 3.7%             |
| 37                 | 50/50 Field Termination Panel with cables and 6 jumpers each | 1 10       | ea      | \$ | 1,681.00  | \$16,810.00    |           | 1,743.20                         | \$ | 17.431.97                                | 3.7%             |
| 38                 | 50/50 Adapter Panel I/O Termination                          | 10         | ea      | \$ | 744.00    | \$7,440.00     |           | 771.53                           | \$ | 7,715.28                                 | 3.7%             |
| 39                 | ATC Cabinet Network Switch Bracket                           | 50         | ea      | \$ | 26.00     | \$1,300.00     |           | 26.96                            | \$ | 1.348.10                                 | 3.7%             |
| 40                 | ATC Network Equipment Bracket                                | 50         | ea      | \$ | 50.00     | \$2,500.00     |           | 51.85                            | \$ | 2,592.50                                 | 3.7%             |
| 41                 | Rack Mount Pull Out Drawer                                   | 10         | ea      | φ  | 30.00     | \$2,500.00     | S         | 300.00                           | S  | 3,000.00                                 | ITEM<br>ADDED    |
| 42                 | Rackmount ATC Touchscreen Controller                         | 10         | ea      |    |           |                | s         | 2,810.00                         | \$ | 28,100.00                                | ITEM<br>ADDED    |
| 43                 | Larger Cabinet D Enclosure with rack                         | 5          | ea      |    |           |                | s         | 4.044.00                         | s  | 20,220.00                                | ITEM<br>ADDED    |
| Support Services   |  |            |         |    |           |                |           |                                  |    |  |                  |
| 38                 | On Site Tech/ Turn On Support per hour                       | 40         | hr      | \$ | 150.00    | \$6,000.00     |           | 150                              | \$ | 6,000.00                                 | 0.0%             |
| 39                 | Equipment Training per hour                                  | 40         | hr      | \$ | 150.00    | \$6,000.00     |           | 150                              | \$ | 6,000.00                                 | 0.0%             |
|                    |  |            | Grand   |    |           | \$1,614,431.06 | AD.<br>GR | JUSTED<br>AND TOTAL              |    | \$1,770,121.15                           |                  |

includes brackets and drawers and configuration changes includes brackets and drawers and configuration changes

includes larger enclosure and configuration changes

\$156,226.98

NOTE: Every item of the Price Schedule must be completed or the proposal may be deemed non-conforming.

THE UNIT QUANTITIES ABOVE ARE ESTIMATED VALUES: This is a Fixed Unit-Price, Indefinite Quantity Contract and the quantities above are estimates only. The quantities may exceed or be less than the estimated amounts and will be determined upon actual services provided during the term of the contract.

COMMENCEMENT, PROSECUTION AND COMPLETION OF WORKS: The Contractor shall be required to (a) commence work under this contract within 10 calendar days after the date the Contractor receives Notice to Proceed; (b) prosecute the work diligently; (c) complete all work ready for use not later than the number of days specified in the contract.

REFERENCE TO DOCUMENTS: The Contractor shall refer to the special conditions, supplemental specifications, and minimum qualifications listed in the ITB. The section numbers under Reference column of this document are not all comprehensive and multiple sections of specifications and supplemental specifications may have to be consulted to complete a task.