

RESOLUTION
ROCK COUNTY BOARD OF SUPERVISORS

Finance Committee
INITIATED BY



10/17/2022
DATE DRAFTED

Authorizing Purchase of A/V Upgrade for Courtrooms E, F, G & L

WHEREAS, the Rock County Information Technology Department is authorized to purchase Audio and Visual hardware on behalf of the County; and,

WHEREAS, the Information Technology Department would like to engage AVI Systems Inc. to implement audiovisual systems in Courtrooms E, F, G & L; and,

WHEREAS, the audiovisual upgrades to Courtrooms E, F, G & L will be similar in functionality to the existing audiovisual systems implemented in Courtrooms A, B, C and D which were implemented in 2019; and,

WHEREAS, this item was budgeted for in 2022 in account 07-1430-0000-62421. The total amount for the project is \$500,690.09

WHEREAS, Terms and Pricing for this project per UW Contract 22-5174.

NOW, THEREFORE, BE IT RESOLVED that the Rock County Board of Supervisors duly assembled this 27th day of October, 2022, does hereby authorize the purchase of the A/V Upgrade for Courtrooms E, F, G & L through AVI Systems Inc at a cost of \$500,690.09.

FISCAL NOTE:

Sales tax was included in the 2022 budget for this project.

Sherry Oja
Finance Director

LEGAL NOTE:

The County Board is authorized to take this action pursuant to §§ 59.01 and 59.51, Wis. Stats. In addition, § 59.52(29), Wis. Stats., requires the project to be let to the lowest responsible bidder.

Richard Greenlee
Corporation Counsel

ADMINISTRATIVE NOTE:

Recommended.

Josh Smith
County Administrator

Committee Action
Finance Committee

The Finance Committee recommended this resolution for approval by a unanimous voice vote.

Executive Summary Authorizing the Purchase of A/V Upgrade for Courtrooms E, F, G & L

Rock County is looking to implement audiovisual systems in Courtrooms E, F, G, and L that will be very similar in functionality to existing Courtrooms A, B, C, and D that were upgraded in 2019. These audiovisual systems will provide an end user in the courtroom with the same general functionality as the existing systems but using current equipment equivalents for a longer expected lifespan of support. These Courtrooms vary in size but should be very similar in functionality. Audio/Visual (AV) systems will be added to these courtrooms to expand the functionality and capabilities to include audio reinforcement, video display, and video conferencing. It is AVI's understanding that the existing audio system in Courtroom E supports the CCAP Digital Audio Recording (DAR) system only.

This project was budgeted for in account 07-1430-0000-62421 and pricing was accounted for in state contract UW Contract 22-5174.

Retail Sales Agreement



AVI Systems Inc., 5201 Femrite Drive Madison, WI, 53718 | Phone: (608)221-8888, Fax: (608)221-9252

Proposal Number: 1123333
Prepared For: County of Rock
Attn: James Sandvig

Proposal Date: October 04, 2022
**Rock County Court House - Courtrooms E, F, G,
and L AV Updates**

Prepared By: Nick Speaker
Phone: (608)807-1862
Email: nick.speaker@avisystems.com

BILL TO

Attn: James Sandvig
County of Rock
51 S Main Street
Janesville, WI, 53545
Phone: (608) 757-5515
Email: james.sandvig@co.rock.wi.us
Customer Number: 2512

SITE

Attn: Craig Hurda
Rock County Court House
51 S. Main Street
Janesville, WI, 53545
Phone: (608)757-5515
Email: craig.hurda@co.rock.wi.us

COMMENTS

Terms and Pricing per UW Contract 22-5174.

PRODUCTS AND SERVICES SUMMARY

Equipment	\$290,822.82
Integration	\$166,574.60
PRO Support	\$32,876.00
Shipping & Handling	\$10,416.67
Tax	\$0.00
Grand Total	\$500,690.09

Unless otherwise specified. The prices quoted reflect a discount for a cash payment (i.e., check, wire transfer) made by Customer in full within the time stated for payment on each invoice. Discount only applies to new items included on the invoice, and only applies if the balance on the invoice is paid in full.

All returned equipment is subject to a restocking charge. The prices are valid for 15 days and may be locked in by signing this Retail Sales Agreement.

Overdue balances are subject to a finance charge of 1.5% per month, or interest at the highest rate permitted by applicable law. In the event AVI must pursue collection of unpaid invoices, Customer agrees to pay all of AVI's costs of collection, including its attorneys' fees.

INVOICING AND PAYMENT TERMS

Per UW Contract 22-5174.

AVI uses progress billing, and invoices for equipment and services allocated to the contract on a monthly basis. Unless otherwise specified, all items quoted (goods and services) as well as applicable out of pocket expenses (permits, licenses, shipping, etc.) are invoiced in summary (including applicable sales taxes due for each category of invoiced items).

Customer is to make payments to the following "Remit to" address:

AVI Systems

NW8393 PO Box 1450
Minneapolis, MN 55485-8393

If Payment Method is ACH: Customer must make all payments in the form of bank wire transfers or electronic funds transfers through an automated clearinghouse with electronic remittance detail, in accordance with the payment instructions AVI Systems provides on its invoice to Customer.

A monthly summary of detailed equipment received is available upon request. Equipment received may be different than equipment billed based on agreed billing method.

TAXES AND DELIVERY

Per UW Contract 22-5174.

AGREEMENT TO QUOTE AND DOCUMENTS CONSTITUTING YOUR CONTRACT WITH AVI

Per UW Contract 22-5174.

AGREED AND ACCEPTED BY

<hr/>	AVI Systems, Inc.
Company	Company
<hr/>	<hr/>
Signature	Signature
<hr/>	<hr/>
Printed Name	Printed Name
<hr/>	<hr/>
Date	Date

CONFIDENTIAL INFORMATION

The company listed in the “Prepared For” line has requested this confidential price quotation, and shall be deemed “Confidential Information” as that term is defined in the T&Cs. This information and document is confidential and is intended solely for the private use of the customer identified above. Customer agrees it will not disseminate copies of this quote to any third party without the prior written consent of AVI. Sharing a copy of this quote, or any portion of the Agreement with any competitor of AVI is a violation of this confidentiality provision. If you are not the intended recipient of this quote (i.e., the customer), you are not properly in possession of this document and you should immediately destroy all copies of it.

SERVICES TO BE PROVIDED

INTEGRATION SERVICES

INTEGRATION SCOPE OF WORK

A. SUMMARY: Rock County is looking to implement audiovisual systems in Courtrooms E, F, G, and L that will be very similar in functionality to existing Courtrooms A, B, C, and D that were upgraded in 2019. These audiovisual systems will provide an end user in the courtroom with the same general functionality as the existing systems but using current equipment equivalents for a longer expected lifespan of support.

These Courtrooms vary in size but should be very similar in functionality.

Courtroom E – 4th Floor Large Courtroom

Courtroom F – 3rd Floor Small Courtroom

Courtroom G – 3rd Floor Small Courtroom

Courtroom L - 3rd Floor Small Courtroom/Hearing Room

B. SYSTEM DESCRIPTION:

Courtroom E

- Functionality Description: Audio/Visual (AV) systems will be added to these courtrooms to expand the functionality and capabilities to include audio reinforcement, video display, and video conferencing. It is AVI's understanding that the existing audio system in Courtroom E supports the CCAP Digital Audio Recording (DAR) system only. This system currently consists of gooseneck microphones at standard, prescribed locations, a flat boundary microphone for bench sidebar, and all microphone cabling is routed to head end audio processing that is specific to the DAR system, with no in-room reinforcement.

An AV system will be added to the space to match the existing functionality of Courtroom A. The existing microphones and associated cabling will remain in use and be added to the room's functions while maintaining the requirements of the existing CCAP DAR system.

- Displays:
 - (2) large format flat panel displays on articulating arm wall mounts.
 - Expected to be 75" monitors
 - One monitor faces the bench and witness area
 - 2nd monitor is located to allow viewing by Jury and attorneys
 - It was noted that while it is important that the Gallery area be able to see the video being displayed, it is not as important that people in the Gallery be able to see a high level of detail.
- Source Devices:
 - HD video transmitters will be located at each attorney table and at the Judge's bench. Each transmitters allow the connection of either HDMI or VGA & audio from a personal device (i.e., laptop), for display on the large format displays and/or sharing content during a videoconference.
 - Transmitters are mounted to the underside of the table at each location with associated cable routed to above. It is assumed that cable pass thru is provided within the furniture. If cable pass thru boxes/devices are needed, AVI can add this to the scope if requested.
 - An adapter ring will be provided for USB-C and Display Port from the personal device to connect to the HDMI cable.
 - HDMI and VGA connections will be available on a wall plate near the Bench area for connection of a portable device.
 - Signals from these connections will be routed to an HD video transmitter located under a table/desk near the wall plate. This is assumed to be at the Clerk position.
 - A receptacle wall plate will be located near the Bench area for connection from a portable cart with an HD digital video document camera.
 - A single existing media cart with document camera to be shared between all courtrooms.

- The owner's requirement document included several items that are not in this quote. This includes a PC, touch panel for future annotation capability, and a Blu-ray player. The current existing cart for Courtroom A only has the document camera and a Blu-ray player and it is AVI's understanding that the Blu-ray player is not used.
- Poly G7500 Codec
 - A single output from the codec is routed to the system for display on the (2) monitors. When content is shared the camera view will be shown as a picture in picture view.
- Audio:
 - Existing room microphones are understood to be in proper working order. Microphones and existing cabling will be reused in this space. AVI will advise if it is determined that any of the existing equipment is not functioning properly.
 - New ceiling speakers will be mounted in the ceiling in 4 separate zones in the Courtroom
 - Bench area (to cover Judge, Clerk, and Witness)
 - Attorney area
 - Jury
 - Gallery
 - A new audio digital signal processor (DSP) with appropriate inputs and outputs and Acoustic Echo Cancellation will be provided to route signals as required.
 - It is AVI's understanding that the standard system design is that microphone signals are routed to the existing CCAP DAR system and then from the DAR system's DSP to the new DSP that is being provided as part of this scope. It is AVI's understanding that the correct/appropriate number of outputs are available from the existing DAR system.
 - New audio amplifiers will be provided for in room reinforcement of program audio, conferencing audio, and zoned microphone voice lift.
 - An ADA compliant Assistive Listening System (ALS) will be provided with an antenna mounted within the Courtroom.
- Conferencing:
 - (4) HD PTZ cameras will be mounted in the Courtroom to capture video of 4 separate locations.
 - Judge, Witness, (2) Attorney tables.
 - Cameras are routed through video window processor to combine the cameras to a single image as required. Image combination presets will match those established in Courtroom A.
 - (3) Cameras are expected to be wall mounted and (1) camera is expected to be ceiling mounted. Vibration isolation mounts are provided for each camera.
 - A new Poly G7500 codec will be provided for video conferencing. With coordination and collaboration of the Rock County Courts IT administrator/team, the codec will be configured to communicate through the County's existing Polycom VBP.
 - Rock County has existing Zoom CRC licenses which allow the Poly G7500 to join established Zoom meetings.
 - Any of the video sources may be selected to share content during a video conference.
 - The new audio DSP will be configured to function as an endpoint on the Owner's existing VoIP calling infrastructure (understood to be Mitel). It is AVI's understanding that the VoIP system is an on-premise structure (not a hosted service).
- Switching:
 - The system design makes use of a Video over IP backbone. This is consistent with the existing Courtrooms and allows for maximum flexibility and expansion capability.
- Controls:
 - An AV control system will be provided. The system allows for users to control all functions of the AV system within the room.
 - A10" touch panel will be provided at the Judge's bench and the Clerk. The touch panels will have identical functionality.
 - Touch panels will match the look, navigation, and functionality of the existing touch panels in Courtroom A. (except Blu-ray player functions)

- AVI programmer will visit the site to observe and note all of the functions and navigation of the existing touch panels. During this meeting, the programmer will also discuss which buttons/functions of the existing touch panel have presented problems or confusion and establish a plan to provide a more intuitive flow of control.
- Controls will include:
 - System on/off
 - Source selection to be displayed
 - Audio in room volume up/down, mute.
 - Any microphone may be muted, or all microphones muted
 - A bench sidebar microphone may be selected by the Judge or Clerk. The audio from this microphone is not routed to the room nor the ALS.
 - Video conferencing:
 - Existing Rock County locations with videoconferencing will be available for quick selection to connect
 - Conferences can be manually dialed
 - These functions are the same as currently exists in Courtroom A
 - Select camera preset
 - Select to share content, which in-room source
 - Audio conferencing dialing functions via the VoIP phone system
 - Advanced pages and options/setting pages to match those of the existing system in Courtroom A.
- Equipment Location:
 - A new full height floor standing equipment rack will be provided to house all head-end processing and distribution equipment. The rack is assumed to be located in a room immediately adjacent to the Courtroom in Corridor A333.
 - The rack will include a 20A UPS and vertical mount power strip
 - It is AVI's understanding that the existing CCAP DAR equipment and equipment rack is in the same adjacent room and will be set on the floor adjacent to the new AV equipment rack
 - AVI will provide infrastructure drawings to assist the County's electrical and network designers/contractors with providing appropriate infrastructure required to support the AV systems. This includes conduit, wall/floor boxes, cable raceway, power, and network which are not provided by AVI and not included in this scope.
 - Note – it is assumed that the existing wood ceiling panels are removable to allow access to above the ceiling for routing AV cabling and mounted devices as needed. Due to the custom nature of the ceiling, it is AVI's assumption that ceiling tiles will be removed by Owner as required for this work.

Courtrooms F, G

- Functionality Description: Audio/Visual (AV) systems will be added to these courtrooms to match the functionality and capability described for Courtroom E. Neither Courtroom has any existing AV and no existing CCAP DAR.

A new DAR will be provided, installed, and programmed/configured by CCAP. Microphones and audio cabling supporting the DAR are provided and installed by AVI

- Displays (each Courtroom):
 - (2) large format flat panel displays on articulating arm wall mounts.
 - Expected to be 75" monitors
 - One monitor faces the bench and witness area
 - 2nd monitor is located to allow viewing by Jury and attorneys
 - It was noted that while it is important that the Gallery area be able to see the video being displayed, it is not as important that people in the Gallery be able to see a high level of detail.
- Source Devices (each Courtroom):
 - HD video transmitters will be located at each attorney table and at the Judge's bench. Each transmitters allow the connection of either HDMI or VGA & audio from a personal device (i.e., laptop), for display on the large format displays and/or sharing content during a videoconference.

- Transmitters are mounted to the underside of the table at each location with associated cable routed to above. It is assumed that cable pass thru is provided within the furniture. If cable pass thru boxes/devices are needed, AVI can add this to the scope if requested.
 - An adapter ring will be provided for USB-C and Display Port from the personal device to connect to the HDMI cable.
- HDMI and VGA connections will be available on a wall plate near the Bench area for connection of a portable device.
 - Signals from these connections will be routed to an HD video transmitter located under a table/desk near the wall plate. This is assumed to be at the Clerk position.
- A receptacle wall plate will be located near the Bench area for connection from a portable cart with an HD digital video document camera.
 - A single existing media cart with document camera to be shared between all courtrooms.
 - The owner's requirement document included several items that are not in this quote. This includes a PC, touch panel for future annotation capability, and a Blu-ray player. The current existing cart for Courtroom A only has the document camera and a Blu-ray player and it is AVI's understanding that the Blu-ray player is not used.
- Poly G7500 Codec
 - A single output from the codec is routed to the system for display on the (2) monitors. When content is shared the camera view will be shown as a picture in picture view.
- Audio (each Courtroom):
 - New microphones will be provided, matching the general type and functionality of the microphones in Courtroom A. This includes:
 - 15" gooseneck microphones with desktop base
 - Judge
 - Witness
 - Clerk
 - Plaintiff table (qty 2)
 - Defense table (qty 2)
 - Jury
 - Bailiff
 - Reporter
 - Gallery
 - (1) tabletop boundary microphone for bench sidebar user
 - New ceiling speakers will be mounted in the ceiling in 4 separate zones in the Courtroom
 - Bench area (to cover Judge, Clerk, and Witness)
 - Attorney area
 - Jury
 - Gallery
 - A new audio digital signal processor (DSP) with appropriate inputs and outputs and Acoustic Echo Cancellation will be provided to route signals as required.
 - It is AVI's understanding that the standard system design is that microphone signals are routed to the existing CCAP DAR system and then from the DAR system's DSP to the new DSP that is being provided as part of this scope. It is AVI's understanding that the correct/appropriate number of outputs will be made available from the DAR system.
 - New audio amplifiers will be provided for in room reinforcement of program audio, conferencing audio, and zoned microphone voice lift.
 - An ADA compliant Assistive Listening System (ALS) will be provided with an antenna mounted within the Courtroom.
- Conferencing:
 - (4) HD PTZ cameras will be mounted in the Courtroom to capture video of 4 separate locations.
 - Judge, Witness, (2) Attorney tables.
 - Cameras are routed through video window processor to combine the cameras to a single image as required. Image combination presets will match those established in Courtroom A.

- (3) Cameras are expected to be wall mounted and (1) camera is expected to be ceiling mounted. Vibration isolation mounts are provided for each camera.
- A new Poly G7500 codec will be provided for video conferencing. With coordination and collaboration of the Rock County Courts IT administrator/team, the codec will be configured to communicate through the County's existing Polycom VBP.
 - Rock County has existing Zoom CRC licenses which allow the Poly G7500 to join established Zoom meetings.
 - Any of the video sources may be selected to share content during a video conference.
- The new audio DSP will be configured to function as an endpoint on the Owner's existing VoIP calling infrastructure (understood to be Mitel). It is AVI's understanding that the VoIP system is an on-premise structure (not a hosted service).
- Switching:
 - The system design makes use of a Video over IP backbone. This is consistent with the existing Courtrooms and allows for maximum flexibility and expansion capability.
- Controls:
 - An AV control system will be provided. The system allows for users to control all functions of the AV system within the room.
 - A10" touch panel will be provided at the Judge's bench and the Clerk. The touch panels will have identical functionality.
 - Touch panels will match the look, navigation, and functionality of the existing touch panels in Courtroom A. (except Blu-ray player functions)
 - AVI programmer will visit the site to observe and note all of the functions and navigation of the existing touch panels. During this meeting, the programmer will also discuss which buttons/functions of the existing touch panel have presented problems or confusion and establish a plan to provide a more intuitive flow of control.
 - Controls will include:
 - System on/off
 - Source selection to be displayed
 - Audio in room volume up/down, mute.
 - Any microphone may be muted, or all microphones muted
 - A bench sidebar microphone may be selected by the Judge or Clerk. The audio from this microphone is not routed to the room nor the ALS.
 - Video conferencing:
 - Existing Rock County locations with videoconferencing will be available for quick selection to connect
 - Conferences can be manually dialed
 - These functions are the same as currently exists in Courtroom A
 - Select camera preset
 - Select to share content, which in-room source
 - Audio conferencing dialing functions via the VoIP phone system
 - Advanced pages and options/setting pages to match those of the existing system in Courtroom A.
- Equipment Location:
 - A new full height floor standing equipment rack will be provided to house all head-end processing and distribution equipment. Racks for F and G will be housed in a room immediately adjacent to Courtroom F, in Court Reporter Room 278.
 - The rack will include a 20A UPS and vertical mount power strip
 - It is AVI's understanding that the CCAP DAR equipment and equipment rack are housed in the rooms adjacent to the north of courtroom F and G (271 and 268).
 - An audio feed from each DAR system to the new AV Racks will be required.
 - AVI will provide infrastructure drawings to assist the County's electrical and network designers/contractors with providing appropriate infrastructure required to support the AV systems. This includes conduit, wall/floor boxes, cable raceway, power, and network which are not provided by AVI and not included in this scope.

- Note – it is assumed that the existing wood ceiling panels are removable to allow access to above the ceiling for routing AV cabling and mounted devices as needed. Due to the custom nature of the ceiling, it is AVI's assumption that ceiling tiles will be removed by Owner as required for this work.

Courtroom/Hearing Room L

- Functionality Description: This is a smaller Hearing Room which does not have the same AV system requirements as the larger courtrooms. This space has 2 attorney tables, a Judge and Clerk Bench and Witness stand. AV systems will be added to this Hearing Room to expand the functionality and capabilities to include video conferencing with audio reinforcement and video display. It is AVI's understanding that the existing audio system in Hearing Room L supports the CCAP Digital Audio Recording (DAR) system only. This system currently consists of (5) gooseneck microphones at standard, prescribed locations, and a flat boundary microphone for bench sidebar, and all microphone cabling is routed to head end audio processing that is specific to the DAR system, with no in-room reinforcement.

An AV system will be added to the space to match the videoconferencing functionality of the larger courtrooms. The existing microphones and associated cabling will remain in use and be added to the room's functions while maintaining the requirements of the existing CCAP DAR system.

- Displays:
 - (2) large format flat panel displays on articulating arm wall mounts.
 - Expected to be 75" monitors
 - Sizes will be finalized prior to ordering equipment
 - One monitor faces the bench and witness area
 - 2nd monitor is located to allow viewing by attorneys
- Source Devices:
 - Poly G7500 Codec
 - A single output from the codec is routed to the system for display on the (2) monitors. When content is shared the camera view will be shown as a picture in picture view.
- Audio:
 - Existing room microphones are understood to be in proper working order. Microphones and existing cabling will be reused in this space. AVI will advise if it is determined that any of the existing equipment is not functioning properly.
 - New ceiling speakers will be mounted in the ceiling in 2 separate zones in the Hearing Room
 - Bench area (to cover Judge, Clerk, and Witness)
 - Attorney area
 - A new audio digital signal processor (DSP) with appropriate inputs and outputs and Acoustic Echo Cancellation will be provided to route signals as required.
 - It is AVI's understanding that the standard system design is that microphone signals are routed to the existing CCAP DAR system and then from the DAR system's DSP to the new DSP that is being provided as part of this scope. It is AVI's understanding that the correct/appropriate number of outputs are available from the existing DAR system.
 - New audio amplifiers will be provided for in room reinforcement of program audio, conferencing audio, and zoned microphone voice lift.
 - An ADA compliant Assistive Listening System (ALS) will be provided with an antenna mounted within the Hearing Room.
- Conferencing:
 - (4) HD PTZ cameras will be mounted in the Courtroom to capture video of 4 separate locations.
 - Judge, Witness, (2) Attorney tables.
 - Cameras are routed through video window processor to combine the cameras to a single image as required. Image combination presets will match those established in Courtroom A.
 - Cameras are expected to be wall mounted. Vibration isolation mounts are provided for each camera.

- A new Poly G7500 codec will be provided for video conferencing. With coordination and collaboration of the Rock County Courts IT administrator/team, the codec will be configured to communicate through the County's existing Polycom VBP.
 - Rock County has existing Zoom CRC licenses which allow the Poly G7500 to join established Zoom meetings.
- The new audio DSP will be configured to function as an endpoint on the Owner's existing VoIP calling infrastructure (understood to be Mitel). It is AVI's understanding that the VoIP system is an on-premise structure (not a hosted service).
- **Switching:**
 - The system design makes use of a Video over IP backbone. This is consistent with the existing Courtrooms and allows for maximum flexibility and expansion capability.
- **Controls:**
 - An AV control system will be provided. The system allows for users to control all functions of the AV system within the room.
 - A10" touch panel will be provided at the Judge's bench and the Clerk. The touch panels will have identical functionality.
 - Touch panels will match the look, navigation, and functionality of the existing touch panels in Courtroom A. (except Blu-ray player functions)
 - AVI programmer will visit the site to observe and note all of the functions and navigation of the existing touch panels. During this meeting, the programmer will also discuss which buttons/functions of the existing touch panel have presented problems or confusion and establish a plan to provide a more intuitive flow of control.
 - Controls will include:
 - System on/off
 - Audio in room volume up/down, mute.
 - Any microphone may be muted, or all microphones muted
 - A bench sidebar microphone may be selected by the Judge or Clerk. The audio from this microphone is not routed to the room nor the ALS.
 - Video conferencing:
 - Existing Rock County locations with videoconferencing will be available for quick selection to connect
 - Conferences can be manually dialed
 - These functions are the same as currently exists in Courtroom A
 - Select camera preset
 - Audio conferencing dialing functions via the VoIP phone system
 - Advanced pages and options/setting pages to match those of the existing system in Courtroom A (as required for this smaller space)
- **Equipment Location:**
 - A new full height floor standing equipment rack will be provided to house all head-end processing and distribution equipment. The rack is assumed to be located in a room immediately adjacent to the Courtroom in Attorney Conference 257.
 - The rack will include a 20A UPS and vertical mount power strip
 - It is AVI's understanding that the existing CCAP DAR equipment and equipment rack is in the same adjacent room and will be set on the floor adjacent to the new AV equipment rack
 - AVI will provide infrastructure drawings to assist the County's electrical and network designers/contractors with providing appropriate infrastructure required to support the AV systems. This includes conduit, wall/floor boxes, cable raceway, power, and network which are not provided by AVI and not included in this scope.

User Orientation Scope

Included in every Project is our standard User Orientation. Specifically geared to the end-user, its purpose is to provide the necessary knowledge to confidently and comfortably operate the integrated system.

At AVI Systems, this is a critical element to the overall success of any project.

Our Orientation includes:

- **System Overview**
- **Basic User Operation**
 - Includes a one-page laminated Quick Start guide
 - Paper copies for all attendees
- **Review of Selected Pro Support Plan**
 - How to contact AVI Support
- **A USB drive with electronic versions of:**
 - Final User Orientation Guide
 - All equipment manuals
 - As-builts CAD drawings
 - Manufacturer training documents or videos
 - Delivered after training with any revisions noted

Our User Orientation will be scheduled approximately one week after final commissioning. Our **Client Advocate** will contact you to set a time and review the details. Training will be approximately one hour at your location. The Client Advocate will also contact you 30 – 45 days after Orientation to check progress and develop an action plan if needed.

C. EXCLUSIONS: The following work is **not included** in our Scope of Work:

- All conduits, high voltage, wiring panels, breakers, relays, boxes, receptacles, etc.
- Concrete saw cutting and/or core drilling
- Fire wall, ceiling, roof and floor penetration
- Necessary gypsum board replacement and/or repair
- Necessary ceiling tile or T-bar modifications, replacements and/or repair
- Structural support of equipment *AVI Systems not responsible for building related vibrations
- All millwork (moldings, trim, cut outs, etc.)
- Patching and Painting
- Permits (unless specifically provided for and identified within the contract)
- Unless otherwise stated the pricing in this agreement does not include prevailing wage or union labor
- Unless specifically noted lifts and scaffolding are not included

D. CONSTRUCTION CONSIDERATIONS:

In order to accomplish the outlined goals of this project, the Customer will be responsible for contracting with an outside entity to make the necessary modifications to the space as directed by AVI Systems. The costs associated with these modifications are not included in this proposal.

E. NOTICE: THIS SCOPE OF WORK IS DELIVERED ON THE BASIS OF THE FOLLOWING ASSUMPTIONS:

- The room(s) match(es) the drawings provided.
- Site preparation by the Customer and their contractors includes electrical and data placement per AVI Systems specification.
- Site preparation will be verified by AVI Systems project manager or representative before scheduling of the installation. All work areas should be clean and dust free prior to the beginning of on-site integration of electronic equipment.
- Customer communication of readiness will be considered accurate and executable by AVI Systems project manager.
- In the event of any arrival to site that AVI Systems is not able to execute work efficiently and definably progress, the Customer will be charged a fee to reimburse AVI Systems for all lost time and inefficiencies. At this time, the Customer will be presented a Contract Change Order and will/may halt work until acceptance by the Customer and rescheduling of the integration effort is agreed upon.
- Rescheduling and redeployment of AVI Systems technicians due to unacceptable site preparation may cause scheduling delays of up to 10 business days.
- There is ready access to the building / facility and the room(s) for equipment and materials.
- There is secure storage for equipment during a multi-day integration.

- If Customer furnished equipment and existing cabling is to be used, AVI Systems assumes that these items are in good working condition at this time and will integrate into the designed solution. Any repair, replacement and/or configuration of these items that may be necessary will be made at an additional cost.
- All Network configurations including IP addresses are to be provided, operational and functional before AVI Systems integration begins. AVI Systems will not be responsible for testing the LAN connections.
- Cable or Satellite drops must be in place with converter boxes operational before the completion of integration. Any delay resulting in extra work caused by late arrival of these items will result in a change order for time and materials.
- Document review / feedback on drawings / correspondence will be completed by the Customer within two business days (unless otherwise noted).
- The documented Change Control process will be used to the maximum extent possible – the Customer will have an assigned person with the authority to communicate/approve project Field Directed Change Orders and Contract Change Orders (see Appendix).
- In developing a comprehensive proposal for equipment and integration services AVI Systems' Sales Representatives and Engineering teams must make some assumptions regarding the physical construction of your facility, the availability of technical infrastructure and site conditions for installation. If any of the conditions we have indicated in the site survey form are incorrect or have changed for your particular project or project site, please let your Sales representative know as soon as possible. Conditions of the site found during integration effort which are different from those documented may have an effect on the price of the system solution, integration or services. To ensure that you have an accurate proposal based on your facility and specific to the conditions of your project, please review all project documentation carefully.

F. INTEGRATION PROJECT MANAGEMENT PROCESSES

AVI Systems will follow a foundational project management process which may include the following actions/deliverables (based on the size/complexity/duration of the integration project):

- Site Survey – performed prior to Retail Sales Agreement and attached
- Project Welcome Notice – emailed upon receipt of Purchase Order
- Project Kick-Off meeting with Customer Representative(s) – either by phone or in-person
- Project Status reviews – informal or formal – either by phone or in-person (based on the size/complexity/duration of the project)
- Project Change Control – comprised of Field Directed Change Order and/or Contract Change Order submittals (see Appendix)
- Notice of Substantial Completion (see Appendix) – at Customer walk-through – prior to Service transition

G. KNOWLEDGE TRANSFER (TRAINING)

This is geared specifically towards the end-user / operator. The purpose of this knowledge transfer is to provide operators with the necessary knowledge to confidently and comfortably operate all aspects of the integrated system. Areas covered include the following:

- Equipment and system overview
- Equipment operation and function
- Equipment start up, stop, and shut down
- Equipment automatic and manual operation
- Discussion and documentation relating to control system operation
- Discussion and documentation relating to system processor and its control applications
- Powering up, powering down AV system via control system
- Manual operation of display systems, audio system and all other related components
- Use/operation of patch panels, when and where to be used
- Who to call when help is required

H. AVI SYSTEMS INTEGRATION SERVICES RESPONSIBILITIES

AVI Systems will provide services/work for the project as described above in the Scope of Work or per the attached separate Scope of Work document detailing the scope of work to be performed.

- Provide equipment, materials and service items per the contract products and services detail.
- Provide systems equipment integration and supervisory responsibility of the equipment integration.
- Provide systems configuration, checkout and testing.
- Provide project timeline schedules.
- Provide necessary information, as requested, to the owner or other parties involved with this project to ensure that proper AC electrical power and cableways and/or conduits are provided to properly integrate the equipment within the facilities.
- Provide manufacturer supplied equipment documentation.
- Provide final documentation and "as built" system drawings (CAD) - if purchased.
- Provide system training following integration to the designated project leader or team.

I. CUSTOMER INTEGRATION SERVICES RESPONSIBILITIES

- Provide for the construction or modification of the facilities for soundproofing, lighting, electrical, HVAC, structural support of equipment, and decorating as appropriate. Includes installation of ceiling mounted projection screen.
- Provide for the ordering, provisioning, installation, wiring and verification of any Data Network (LAN, WAN, T1, ISDN, etc.) and Telephone Line (Analog or Digital) equipment and services prior to on-site integration.
- Provide all necessary cableways and/or conduits required to facilitate AV systems wiring.
- Provide all necessary conduit, wiring and devices for technical power to the AV systems equipment.
- Provide reasonable accesses of AVI Systems personnel to the facilities during periods of integration, testing and training, including off hours and weekends.
- Provide a secure area to house all integration materials and equipment.
- Provide a project leader who will be available for consultation and meetings.
- Provide timely review and approval of all documentation (Technical Reports, Drawings, Contracts, etc.).

CUSTOMER CARE

CUSTOMER CARE SERVICES TO BE PROVIDED

Customer Care is the ongoing care and maintenance services delivered to keep your System(s) functioning as originally designed and installed. AVI Systems will perform the services below, as further described in Definitions, for covered Systems.

Customer Care Entitlement Matrix				
Entitlement	Definition	System Support	Unified Communications	Service Level
Incident Management	AVI Systems provides Priority Support to troubleshoot, remediate, and escalate all Incidents through to resolution.	Included	Included	Remote initiation within two (2) business hours, Monday through Friday during standard hours (8am-5pm local time, excluding holidays)
Remote Support	AVI Systems provides remote Priority Support for supported systems to diagnose and resolve incidents.	Included	Included	Remote response within (8) business hours, Monday through Friday during standard hours (8am-5pm local time, excluding holidays)
Onsite Support	AVI Systems provides Priority Support for technician dispatch to the client location to diagnose and resolve an Incident.	Included	Included	Onsite response within eight (8) business hours, Monday through Friday during standard hours (8am-5pm local time, excluding holidays)
Advanced Parts Replacement	AVI Systems provides advanced replacement of failed hardware components. Does not include consumables or obsolete equipment.	Included	Included	Repair and/or replacement is manufacturer dependent. Loaner Equipment on Best Effort basis
Software Update Assistance	AVI Systems provides labor to implement updates of existing software to correct software errors and/or resolve incidents	Included	Included	

System Training	AVI Systems conducts user training to cover operation of the system and how to contact AVI Systems for support. Technical, Administrative, or Product Specific training is available separate from this agreement.	Included	Included	Remote user training, scheduled at least one (1) week in advance
System Health Checks	AVI Systems personnel perform preventative maintenance. Includes cleaning, adjustments, functional tests, and replacement of parts to keep the system equipment in efficient operating condition.	Included	Included	Two (2) System Health Checks per year, each scheduled at least one (1) week in advance
Asset Management	AVI Systems tracks asset information for Systems.	Included	Included	

CUSTOMER CARE DEFINITIONS

System – Defined as the items listed in the Products and Services Detail section of this Agreement or listed on an attached Equipment List with the exception of Consumables, Owner Furnished Equipment, and Obsolete Equipment.

Priority Support – Means all work under AVI Systems support agreements with Customers is scheduled ahead of any other on-demand work.

Remote Support – Means a service whereby remote calls made to communications and terminal equipment via Customer provided IP connection to determine failures and remedies. Only available where equipment is capable and configured by AVI Systems to provide same.

Onsite Support - Service level response assumes client location is within 60 miles of an AVI Systems Service Center. Additional travel costs may apply if the client location is beyond 60 miles of an AVI Systems Service Center.

Consumables – Means parts such as recording media, batteries, projection lamps and bulbs, etc. Consumables are parts that are not included under this Agreement.

Obsolete Equipment – Defined as items (though possibly still in use) that are outdated with no manufacturer support or parts availability, or products with formal end of life as defined by their manufacturer. Obsolete Equipment are parts that are not included under this Agreement.

Loaner Equipment – Defined as tabletop LCD projectors and flat screen monitors under 50". Tabletop projectors are not integrated into a system. Flat screen monitors will be installed onto a wall if reasonably possible.

Best Effort – Means AVI Systems strives to provide the Service or repair any Incident in an appropriate and generally accepted manner using the resources available but makes no promise in this reference.

Advanced Parts Replacement - Provides for recycling of equipment covered in a system or consumables with no additional fees. Includes coverage for shipping to/from manufacturer for equipment sent to for warranty diagnosis, repair or exchange

Software Update Assistance – Defined as revisions of existing software which provide maintenance to correct software errors. Assumes software is provided at no charge by the manufacturer or covered under a valid manufacturer maintenance contract. Cascading software dependencies may impact ability to issue updates. Software and features which require additional licensing are not included under this Agreement. Changes to custom templates or scripts after initial deployment are available separate from this agreement.

SYSTEM SUPPORT TERMS

Coverage Dates – Unless otherwise stated, the service coverage date will be effective as of substantial completion or System Support Agreement invoice date; whichever is applicable. Coverage will extend for the duration specified by the corresponding line item description found in the Product and Services Detail section of this Agreement. AVI Systems reserves the right to withhold services until the invoice is paid in full.

Exclusions – For situations where AVI Systems is providing service or support under this Agreement, no cost service, maintenance or repair shall not apply to the Equipment if any person other than an AVI Systems technician or other person authorized by AVI Systems, without AVI Systems prior written consent, improperly wires, integrates, repairs, modifies or adjusts the Equipment or performs any maintenance service on it during the term of this Agreement. Furthermore, any Equipment service, maintenance or repair shall not apply if AVI Systems determines, in its sole discretion, that the problems with the Equipment were caused by (a) Customer's negligence; or (b) theft, abuse, fire, flood, wind, lighting, unreasonable power line surges or brownouts, or acts of God or public enemy; or (c) use of any equipment for other than the ordinary use for which such equipment was designed or the purpose for which such equipment was intended, or (d) operation of equipment within an unsuitable operating environment, or (e) failure to provide a suitable operating environment as prescribed by equipment manufacturer specifications, including, without limitation, with respect to electrical power, air conditioning and humidity control.

Systems Support Terms are in addition to AVI Systems' General Terms and Conditions of Sale.

PRODUCTS AND SERVICES DETAIL

PRODUCTS:

<u>Model #</u>	<u>Mfg</u>	<u>Description</u> <u>Courtroom E</u>	<u>Qty</u>	<u>MSRP</u>	<u>Price</u>	<u>Extended</u>
QM75R-A	SAMSUNG	75IN TEMP COMMERCIAL 4K UHD MNTR LED LCD DISPLAY 500 NIT NO HDMI OUT	2	\$4,462.00	\$2,944.89	\$5,889.78
TS525TU	CHIEF	THIN SWING ARM (LARGE)	2	\$711.00	\$426.60	\$853.20
999-99400-000	VADDIO	ROBOSHOT 12E HDMI	4	\$3,240.00	\$2,592.00	\$10,368.00
NBAVCB	NIGEL B	Black Finish Anti-Vibration M	3	\$389.95	\$344.07	\$1,032.21
NB-UI-MCA	NIGEL B	Black Finish Anti-Vibration Mu	1	\$461.95	\$420.21	\$420.21
CORE 510I KIT	QSC	PROCESSOR,CORE 510i,100-240V,NON-CTO MODEL	1	\$9,200.00	\$6,440.00	\$6,440.00
CIML4	QSC	Four channels of microphone / line-level analog audio input with 48V phantom power.	4	\$420.00	\$294.00	\$1,176.00
COL4	QSC	Four channels of balanced, line-level analog output.	2	\$375.00	\$262.50	\$525.00
LS-53-072	LISTEN	Listen iDSP Prime Level I Stationary RF	1	\$1,849.00	\$1,442.22	\$1,442.22
LA-116	LISTEN	Coaxial Dipole Remote Antenna 72 MHz	1	\$183.60	\$143.21	\$143.21
DSP100-2-CV-D	STEWART AUDIO	100w x 2 @ 70 / 100v - Digital Matrix Processor - 2 Dante/AES67 channels in	2	\$1,267.00	\$886.90	\$1,773.80
AN-1000X+	ANCHOR AUDIO	Powered speaker monitor	1	\$450.00	\$323.53	\$323.53
HD-WP-4K-401-C	CRESTRON	4K Multi-Window Video Processor with HDBaseT® & HDMI® Outputs	1	\$7,700.00	\$4,620.00	\$4,620.00
DM-NVX-351	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder with Downmixing	4	\$2,200.00	\$1,320.00	\$5,280.00
DM-NVX-E30	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder	5	\$1,430.00	\$858.00	\$4,290.00
DM-NVX-360	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder	2	\$1,980.00	\$1,188.00	\$2,376.00

DM-NVX-360C	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV	6	\$1,980.00	\$1,188.00	\$7,128.00
DM-NVX-E30C	CRESTRON	Encoder/Decoder Card DM NVX® 4K60 4:4:4 HDR Network AV Encoder Card	1	\$1,430.00	\$858.00	\$858.00
DMF-CI-8	CRESTRON	DigitalMedia™ Card Chassis for DM-NVX-C & DMCF, 8 Slots	1	\$2,200.00	\$1,320.00	\$1,320.00
AR-VMU-HDF	LIBERTY AV	CABLE ADAPTER VGA+U - HD 8" BLK	4	\$64.22	\$38.53	\$154.12
60-1878-02	EXTRON	DSC 401 A	1	\$1,840.00	\$1,067.20	\$1,067.20
G7200-85860-001	POLY	TAA Compliant: Poly G7500 4k Base Unit: G7500 UHD 4k video codec and Wireless Presentation System, B	1	\$4,999.00	\$3,637.84	\$3,637.84
GSM4248P-100NAS	NETGEAR	M4250 40G8F POE plus MNGD SW	1	\$3,433.98	\$2,019.99	\$2,019.99
TS-1070-B-S	CRESTRON	10.1 in. Tabletop Touch Screen, Black Smooth	2	\$3,300.00	\$1,980.00	\$3,960.00
CP4N	CRESTRON	4-Series™ Control System	1	\$3,080.00	\$1,848.00	\$1,848.00
CONTROL 26CT	JBL	Control 26C with Transformer. For use on a 70.7V or 100V Distributed Line, Switchable Taps at 60W,	10	\$235.53	\$150.74	\$1,507.40
SM2200RMXL2UP	TRIPPLITE	2200VA 1920W UPS SMART RACKMOU	1	\$2,341.80	\$1,756.35	\$1,756.35
WRK-44-32LRD	MIDDLE ATLANTI	44SP/32D MULTIBAY WRK LRD	1	\$2,205.00	\$1,256.85	\$1,256.85
PDT-1615C-NS	MIDDLE ATLANTI	PD THIN,1-15A,16 OUT,CORD	1	\$280.00	\$159.60	\$159.60
QSC-TRANSIT-SURCHARGE	QSC	QSC Transit Surcharge	1	\$0.00	\$1,321.60	\$1,321.60
Sub-Total: Courtroom E						\$74,948.11
Courtroom F						
QM75R-A	SAMSUNG	75IN TEMP COMMERCIAL 4K UHD MNTR LED LCD DISPLAY 500 NIT NO HDMI OUT	2	\$4,462.00	\$2,944.89	\$5,889.78
TS525TU	CHIEF	THIN SWING ARM (LARGE)	2	\$711.00	\$426.60	\$853.20
999-99400-000	VADDIO	ROBOSHOT 12E HDMI	4	\$3,240.00	\$2,592.00	\$10,368.00
NBAVCB	NIGEL B	Black Finish Anti-Vibration M	3	\$389.95	\$344.07	\$1,032.21
NB-UI-MCA	NIGEL B	Black Finish Anti-Vibration Mu	1	\$461.95	\$420.21	\$420.21
CORE 510I KIT	QSC	PROCESSOR,CORE 510i,100-240V,NON-CTO MODEL	1	\$9,200.00	\$6,440.00	\$6,440.00
CIML4	QSC	Four channels of microphone / line-level analog audio input with 48V phantom power.	4	\$420.00	\$294.00	\$1,176.00
COL4	QSC	Four channels of balanced, line-level analog output.	2	\$375.00	\$262.50	\$525.00
LS-53-072	LISTEN	Listen iDSP Prime Level I Stationary RF	1	\$1,849.00	\$1,442.22	\$1,442.22
LA-116	LISTEN	Coaxial Dipole Remote Antenna 72 MHz	1	\$183.60	\$143.21	\$143.21
DSP100-2-CV-D	STEWART AUDIO	100w x 2 @ 70 / 100v - Digital Matrix Processor - 2 Dante/AES67 channels in	2	\$1,285.00	\$886.90	\$1,773.80
AN-1000X+	ANCHOR AUDIO	Powered speaker monitor	1	\$450.00	\$323.53	\$323.53

HD-WP-4K-401-C	CRESTRON	4K Multi-Window Video Processor with HDBaseT® & HDMI® Outputs	1	\$7,700.00	\$4,620.00	\$4,620.00
DM-NVX-351	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder with Downmixing	4	\$2,200.00	\$1,320.00	\$5,280.00
DM-NVX-E30	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder	5	\$1,430.00	\$858.00	\$4,290.00
DM-NVX-360	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder	2	\$1,980.00	\$1,188.00	\$2,376.00
DM-NVX-360C	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder Card	6	\$1,980.00	\$1,188.00	\$7,128.00
DM-NVX-E30C	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder Card	1	\$1,430.00	\$858.00	\$858.00
DMF-CI-8	CRESTRON	DigitalMedia™ Card Chassis for DM-NVX-C & DMCf, 8 Slots	1	\$2,200.00	\$1,320.00	\$1,320.00
HD-WP-4K-401-C	CRESTRON	4K Multi-Window Video Processor with HDBaseT® & HDMI® Outputs	1	\$7,700.00	\$4,620.00	\$4,620.00
AR-VMU-HDF	LIBERTY AV	CABLE ADAPTER VGA+U - HD 8" BLK	4	\$64.22	\$38.53	\$154.12
60-1878-02	EXTRON	DSC 401 A	1	\$1,840.00	\$1,067.20	\$1,067.20
G7200-85860-001	POLY	TAA Compliant: Poly G7500 4k Base Unit: G7500 UHD 4k video codec and Wireless Presentation System, B M4250 40G8F POE plus MNGD SW	1	\$4,999.00	\$3,637.84	\$3,637.84
GSM4248P-100NAS	NETGEAR	10.1 in. Tabletop Touch Screen, Black Smooth	1	\$3,433.98	\$2,019.99	\$2,019.99
TS-1070-B-S	CRESTRON	4-Series™ Control System	2	\$3,300.00	\$1,980.00	\$3,960.00
CP4N	CRESTRON	Control 26C with Transformer. For use on a 70.7V or 100V Distributed Line, Switchable Taps at 60W,	1	\$3,080.00	\$1,848.00	\$1,848.00
CONTROL 26CT	JBL	2200VA 1920W UPS SMART RACKMOU	10	\$235.53	\$150.74	\$1,507.40
SM2200RMXL2UP	TRIPPLITE	44SP/32D MULTIBAY WRK LRD	1	\$2,341.80	\$1,756.35	\$1,756.35
WRK-44-32LRD	MIDDLE ATLANTI	PD THIN,1-15A,16 OUT,CORD	1	\$2,205.00	\$1,256.85	\$1,256.85
PDT-1615C-NS	MIDDLE ATLANTI		1	\$280.00	\$159.60	\$159.60
Sub-Total: Courtroom F						\$78,246.51
Courtroom G						
QM75R-A	SAMSUNG	75IN TEMP COMMERCIAL 4K UHD MNTR LED LCD DISPLAY 500 NIT NO HDMI OUT	2	\$4,462.00	\$2,944.89	\$5,889.78
TS525TU	CHIEF	THIN SWING ARM (LARGE)	2	\$711.00	\$426.60	\$853.20
999-99400-000	VADDIO	ROBOSHOT 12E HDMI	4	\$3,240.00	\$2,592.00	\$10,368.00
NBAVCB	NIGEL B	Black Finish Anti-Vibration M	3	\$389.95	\$344.07	\$1,032.21
NB-UIM-MCA	NIGEL B	Black Finish Anti-Vibration Mu	1	\$461.95	\$382.00	\$382.00
CORE 510I KIT	QSC	PROCESSOR,CORE 510i,100-240V,NON-CTO MODEL	1	\$9,200.00	\$6,440.00	\$6,440.00
CIML4	QSC	Four channels of microphone / line-level	4	\$420.00	\$294.00	\$1,176.00

COL4	QSC	analog audio input with 48V phantom power.	2	\$375.00	\$262.50	\$525.00
LS-53-072	LISTEN	Four channels of balanced, line-level analog output.	1	\$1,849.00	\$1,442.22	\$1,442.22
LA-116	LISTEN	Listen iDSP Prime Level I Stationary RF	1	\$183.60	\$143.21	\$143.21
DSP100-2-CV-D	STEWART AUDIO	Coaxial Dipole Remote Antenna 72 MHz	2	\$1,285.00	\$886.90	\$1,773.80
AN-1000X+ HD-WP-4K-401-C	ANCHOR AUDIO CRESTRON	100w x 2 @ 70 / 100v - Digital Matrix Processor - 2 Dante/AES67 channels in Powered speaker monitor	1	\$450.00	\$323.53	\$323.53
DM-NVX-351	CRESTRON	4K Multi-Window Video Processor with HDBaseT® & HDMI® Outputs	1	\$7,700.00	\$4,620.00	\$4,620.00
DM-NVX-E30	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder with Downmixing	4	\$2,200.00	\$1,320.00	\$5,280.00
DM-NVX-360	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder	5	\$1,430.00	\$858.00	\$4,290.00
DM-NVX-360C	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder	2	\$1,980.00	\$1,188.00	\$2,376.00
DM-NVX-E30C	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder Card	6	\$1,980.00	\$1,188.00	\$7,128.00
DMF-CI-8	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder Card	1	\$1,430.00	\$858.00	\$858.00
HD-WP-4K-401-C	CRESTRON	DigitalMedia™ Card Chassis for DM-NVX-C & DMCF, 8 Slots	1	\$2,200.00	\$1,320.00	\$1,320.00
AR-VMU-HDF	LIBERTY AV	4K Multi-Window Video Processor with HDBaseT® & HDMI® Outputs	1	\$7,700.00	\$4,620.00	\$4,620.00
60-1878-02	EXTRON	CABLE ADAPTER VGA+U - HD 8" BLK	4	\$64.22	\$38.53	\$154.12
G7200-85860-001	POLY	DSC 401 A	1	\$1,840.00	\$1,067.20	\$1,067.20
GSM4248P-100NAS	NETGEAR	TAA Compliant: Poly G7500 4k Base Unit: G7500 UHD 4k video codec and Wireless Presentation System, B	1	\$4,999.00	\$3,637.84	\$3,637.84
TS-1070-B-S	CRESTRON	M4250 40G8F POE plus MNGD SW	1	\$3,433.98	\$2,019.99	\$2,019.99
CP4N CONTROL 26CT	CRESTRON JBL	10.1 in. Tabletop Touch Screen, Black Smooth 4-Series™ Control System Control 26C with Transformer. For use on a 70.7V or 100V Distributed Line, Switchable Taps at 60W,	2	\$3,300.00	\$1,980.00	\$3,960.00
SM2200RMXL2UP	TRIPPLITE	2200VA 1920W UPS SMART RACKMOU	1	\$3,080.00	\$1,848.00	\$1,848.00
WRK-44-32LRD	MIDDLE ATLANTI	44SP/32D MULTIBAY WRK LRD	10	\$235.53	\$150.74	\$1,507.40
PDT-1615C-NS	MIDDLE ATLANTI	PD THIN,1-15A,16 OUT,CORD	1	\$280.00	\$159.60	\$159.60
Sub-Total: Courtroom G						\$78,208.30
Hearing Room L						
QM75R-A	SAMSUNG	75IN TEMP COMMERCIAL 4K UHD MNTR LED LCD DISPLAY 500 NIT NO HDMI OUT	2	\$4,462.00	\$2,944.89	\$5,889.78

TS525TU	CHIEF	THIN SWING ARM (LARGE)	2	\$711.00	\$426.60	\$853.20
999-99400-000	VADDIO	ROBOSHOT 12E HDMI	4	\$3,240.00	\$2,592.00	\$10,368.00
NBAVCB	NIGEL B	Black Finish Anti-Vibration M	4	\$389.95	\$344.07	\$1,376.28
CORE NANO	QSC	Network Core, 64x64 network I/O channels with 8x8 Software-based Dante license included, USB AV brid	1	\$1,960.00	\$1,372.00	\$1,372.00
QIO-ML4I	QSC	Q-SYS peripheral providing 4 mic/line inputs. Up to 4 devices daisy-chainable. 1U-1/4W, powered over	3	\$710.00	\$497.00	\$1,491.00
QIO-L4O	QSC	Q-SYS peripheral providing 4 line outputs. Up to 4 devices daisy-chainable. 1U-1/4W, powered over Et	2	\$545.00	\$381.50	\$763.00
LS-30-072	LISTEN	Listen iDSP Essentials Starter Stationar	1	\$899.00	\$701.22	\$701.22
LS-53-072	LISTEN	Listen iDSP Prime Level I Stationary RF	1	\$1,849.00	\$1,442.22	\$1,442.22
LA-116	LISTEN	Coaxial Dipole Remote Antenna 72 MHz	1	\$183.60	\$143.21	\$143.21
AV25-2	STEWART AUDIO	25w @ 8 Ohm / 35w @ 4 Ohm x 2	1	\$251.00	\$165.20	\$165.20
HD-WP-4K-401-C	CRESTRON	4K Multi-Window Video Processor with HDBaseT® & HDMI® Outputs	1	\$7,700.00	\$4,620.00	\$4,620.00
DM-NVX-E30	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder	4	\$1,430.00	\$858.00	\$3,432.00
DM-NVX-360	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder	2	\$1,980.00	\$1,188.00	\$2,376.00
DM-NVX-360C	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder/Decoder Card	5	\$1,980.00	\$1,188.00	\$5,940.00
DM-NVX-E30C	CRESTRON	DM NVX® 4K60 4:4:4 HDR Network AV Encoder Card	1	\$1,430.00	\$858.00	\$858.00
DMF-CI-8	CRESTRON	DigitalMedia™ Card Chassis for DM-NVX-C & DMCF, 8 Slots	1	\$2,200.00	\$1,320.00	\$1,320.00
60-1878-02	EXTRON	DSC 401 A	1	\$1,840.00	\$1,067.20	\$1,067.20
G7200-85860-001	POLY	TAA Compliant: Poly G7500 4k Base Unit: G7500 UHD 4k video codec and Wireless Presentation System, B	1	\$4,999.00	\$3,637.84	\$3,637.84
GSM4248P-100NAS	NETGEAR	M4250 40G8F POE plus MNGD SW	1	\$3,433.98	\$2,019.99	\$2,019.99
TS-1070-B-S	CRESTRON	10.1 in. Tabletop Touch Screen, Black Smooth	2	\$3,300.00	\$1,980.00	\$3,960.00
CP4N	CRESTRON	4-Series™ Control System	1	\$3,080.00	\$1,848.00	\$1,848.00
CONTROL 26CT	JBL	Control 26C with Transformer. For use on a 70.7V or 100V Distributed Line, Switchable Taps at 60W,	4	\$235.53	\$150.74	\$602.96
SM2200RMXL2UP	TRIPPLITE	2200VA 1920W UPS SMART RACKMOU	1	\$2,341.80	\$1,756.35	\$1,756.35
WRK-44-32LRD	MIDDLE ATLANTI	44SP/32D MULTIBAY WRK LRD	1	\$2,205.00	\$1,256.85	\$1,256.85
PDT-1615C-NS	MIDDLE ATLANTI	PD THIN,1-15A,16 OUT,CORD	1	\$280.00	\$159.60	\$159.60

Sub-Total: Hearing Room L

\$59,419.90

Integration

Engineering & Drawings	\$16,262.93
Project Management	\$18,200.00
Programming	\$12,900.00
In Shop Fabrication	\$11,500.00
On Site Integration	\$45,980.00
Testing & Acceptance	\$18,000.00
Training	\$4,560.00
Integration Cables & Connectors	\$39,171.67
Sub-Total: Integration	\$166,574.60
<u>Total:</u>	<u>\$457,397.42</u>

PRO SUPPORT:

<u>Model #</u>	<u>Mfg</u>	<u>Description</u>	<u>Qty</u>	<u>Price</u>	<u>Extended</u>
P1S14000	AVI SYSTEMS	G7500 4K Base Unit - One Year AVI UC Support Standard (8-5 M-F)	1.0000	\$719.00	\$719.00
P1S14000	AVI SYSTEMS	G7500 4K Base Unit - One Year AVI UC Support Standard (8-5 M-F)	1.0000	\$719.00	\$719.00
P1S14000	AVI SYSTEMS	G7500 4K Base Unit - One Year AVI UC Support Standard (8-5 M-F)	1.0000	\$719.00	\$719.00
P1S14000	AVI SYSTEMS	G7500 4K Base Unit - One Year AVI UC Support Standard (8-5 M-F)	1.0000	\$719.00	\$719.00
AVISSA1YR	AVI SYSTEMS	1 Year System Support Agreement	1.0000	\$30,000.00	\$30,000.00

Refer to Page 1 for the Grand Total that includes Taxes, and Shipping & Handling.