

**Richmond VA Medical Center****A/E SCOPE OF WORK****Upgrade Fire Suppression and Annunciation System  
Project # 652-18-100**

Chief Engineering:	James W. Dudley, Jr.	_____ Signature/Date
Assistant Director:	Taquisa Simmons	_____ Signature/Date
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Associate Director:	Alan Lambardo	_____ Signature/Date
Chief of Staff:	Julie Beales, MD	_____ Signature/Date
Director:	John Brandecker	_____ Signature/Date

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**-- Services --**

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**PROVIDE:** professional Architect/Engineer (AE) and healthcare planning services necessary to replace existing fire pump with an n+1 fire pump system. Services shall include, but not limited to:

- **Part Ia – Preparation of Existing Conditions and Conceptual Design** –Investigative Services: Preparation of existing conditions plan and conceptual design which includes site investigation for civil, surveying, geotechnical, structural, architectural, equipment/ furnishings, mechanical, plumbing, fire protection, electrical, electronics/ security, telecommunications, and environmental (including but not limited to asbestos abatement, surveying and sampling, air emissions permits, and/or storm water management). Perform project site investigation in accordance with the ‘*Site Investigations*’ section of this scope of work
- **Part I– Preparation of Contract Drawings and Specifications** – Design Development: Preparation and submission of construction bid documents, interim design document packages for review and the final construction bid documents at the completion of the design development process in accordance with the ‘**Design Package Submission Schedule**’ section. Design document packages shall contain a complete set of documents as specified in the ‘**Design Requirements/Submissions**’ section of this scope of work. The AE shall develop a design necessary to meet the requirements in the ‘**Project Scope**’ section of this scope of work. Design shall include the following engineering services: civil, surveying, geotechnical, structural, architectural, equipment/ furnishings, mechanical, plumbing, fire protection, electrical, electronics/ security, telecommunications, healthcare technology systems and devices and environmental.

- **Part II - Construction Period Services:** Review and provide concise direction on all submittals, shop drawings, product data, samples, RFI's, change order proposals, etc. in accordance with 'Construction Period Services' section of this statement of work. Services shall include third party asbestos monitoring that will be performed during construction performed by a certified IH. Services shall include providing record drawings based on finalized contractor red-line as-builts. Services shall include commissioning of the Fire Suppression System, in lieu of a VA hired 3<sup>rd</sup> party agent.
- **Part III - Site Visits:** Visit the site at the request of the VA in accordance with section 'Site Visits' in this scope of work. The AE shall respond on site within a two-hour period when requested. A total of 30 site visits during construction shall be included. Each site visit shall be documented through a field report denoting the purpose and results of the site visit.

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## -- Project Scope --

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### **GENERAL:**

AE is responsible for providing all services necessary for design of this project – i.e. demolition, environmental, civil, surveying, geotechnical, architectural, equipment/furnishings, structural, mechanical, plumbing, fire protection, electrical, electronics/security, telecommunications and healthcare technology systems and devices.

AE will review needs and provide recommendations. A minimum of three options will be presented to the VA for review. In addition, the project shall be phased in order to provide the least impact to the Medical Center. Prior to submission of Schematic material, the AE shall meet with the VAMC's COR to discuss and outline phasing requirements for the project. These phasing requirements shall describe the general sequence of the project work, estimated project duration, and what Government constraints will exist that will influence the Contractor's approach to the construction project. The AE shall be responsible for recording the phasing requirements.

The AE shall provide an evaluation, cost estimate, and conceptual plans to determine the feasibility of completing the project within project budget for each of the three options submitted. Disadvantages and advantages of each option will be provided including impacts to patient care/medical center operations and order of magnitude cost estimates for each option (with cost of patient care factored into the economy/feasibility).

Design will have modern finishes selected in coordination with VA. Finishes shall incorporate recycled materials. Project will require contractor to recycle disposed of material such as carpet and ceiling tile. Documented quantities, disposal method and final certified documents noting that demolition materials have properly been recycled.

At the 95% design submission, the AE shall finalize a construction plan showing temporary conditions for construction, per phase, to ensure general conditions, life safety and infection control requirements are designed, identified and specified including:

- Infection Control Risk Assessment (ICRA) classification sheet on construction plan, denoting:
  - requirements for how negative the space must be maintained (in inches of water)
  - requirements for negative air monitoring and alarming
  - negative air achievement during construction by capping all HVAC ducts in the area
- denote all existing rated barriers (vertical and horizontal) and identify requirements for demolition of existing systems and installation of new systems in or through these barriers (patch and fill requirements and timeframes after demo)
- denote temporary construction barrier wall and construction entry door/frame types and ratings for separation of construction areas to other areas (all barriers between construction areas and other areas shall be maintained with a minimum of a 1 hour barrier until final installation of ceiling and sprinkler system). All temporary construction barriers shall be finished immediately upon installation and the finishes shall mirror and be cohesive with surrounding areas.
- identify requirements for all fire protection systems during construction:
  - will sprinklers, smoke detectors, pull stations, etc. remain active? fire watch required?
  - will a heat detection system be installed due to a compromised fire protection system?
  - will construction barriers re-route egress or necessitate egress signage change outside of construction space?
- identify contractor laydown area, trash, delivery and pedestrian/construction routes.

- identify temporary utilities for contractors use as necessary
- identify utilities/systems passing through construction space or that require bypass during construction to be maintained/bypassed to ensure continuity of services in adjacent areas
- denote legionella water concerns through construction (temporary water temperature ranges maintained, no stagnant water, no dead legs, flushing/heating of the system prior to tie-ins and before turnover to VA, etc.)

The following items shall be addressed with the design:

- Fully sprinklered and fire protection systems integrated into existing system
- All rooms shall be ADA compliant and meet VA Guidelines for Accessibility
- HVAC integrated with existing Johnson Controls DDC System. Each room shall have separate controls.

AE shall retain the services of a registered Fire Protection Engineer to design and review the entire project for code compliance. Guidance on Fire Protection Engineer Consultant Services can be found at the following links:

- [http://www.cfm.va.gov/til/ae/fp\\_engr.doc](http://www.cfm.va.gov/til/ae/fp_engr.doc)
- <http://www.cfm.va.gov/til/aeDesSubReq.asp>

At the 95% design submission phase, the VA will retain the services of a 3<sup>rd</sup> party registered Fire Protection Engineer to review the design for fire and life safety code compliance in accordance with the latest edition of VHA Directive 7712 Fire Protection Code Reviews of Delegated Construction Projects. The AE shall incorporate all comments into the design prior to finalizing the design. [https://www.va.gov/vhapublications/ViewPublication.asp?pub\\_ID=5331](https://www.va.gov/vhapublications/ViewPublication.asp?pub_ID=5331)

### **SPECIFICS:**

Develop construction documents to replace existing fire pump with a two-pump system (n+1 configuration). The AE shall design for an automatic transfer switch, UPS backup, emergency generator power and a normal power feed for one of the pumps. The other pump shall be operated on diesel fuel. The new pump location(s) may require a separate standalone building to be built. The systems shall comply with all applicable building codes and regulations, providing full suppression for the building served. The existing pump is located in building 501, on the grounds of the VAMC, Richmond, Virginia. Ideally, the diesel fuel operated pump will be located in a separate building while the electric pump would be placed in the location of the existing pump. A separate water feed from the local utility municipality may be required and should be included in the design as required to meet applicable codes.

The existing pump is no longer capable of meeting the department's needs and demands. This project will provide a new and more reliable system and thereby improve functionality to meet the hospitals future needs.

The following specific items will be addressed:

- AE shall design the project based on a construction budget of \$715,000.

A/E is responsible for conducting all necessary test confirming the current facilities static and residual pressure and flow rates of the water distribution system and providing any certified services to perform survey investigations, bulk sampling, development of specifications and drawings, and construction period services.

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## -- Site Investigations --

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**EXPECTATION:** *AE will make site visits as necessary to survey and document existing conditions.*

Make site visits as required to determine existing as-built conditions affecting this project. **Note:** Information, including drawings and other documentation, provided to the AE shall be used as reference only. All additional references and specifications are available in VHA's Technical Information Library at address <http://www.cfm.va.gov/til/index.asp>. Coordinate visits with the COR as assigned at the NTP. The AE shall arrange for and oversee the performance of such investigations necessary for the proper design of the project. AutoCAD background drawings will be provided by the VA upon request and shall be used as reference only. **The AE shall field verify every aspect that relates to the project.**

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## -- Design / Drawing Submission Schedule --

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**EXPECTATION:** Submit review package so they are received on the noted day.

### Calendar Days after NTP

Initial Integrated Project Team (IPT) meeting	on or before	28 days
Schematic Design/15% design (3 options)	on or before	49 days
IPT Review	on or before	77 days
Design Development/35% design	on or before	105 days
IPT Review	on or before	126 days
Design Development/65% design	on or before	154 days
IPT Review	on or before	175 days
Construction Documents/95% design	on or before	203 days
IPT Review	on or before	224 days
Construction Documents/100% design	on or before	252 days
IPT Review	on or before	266 days
FINAL Construction Bid Documents	on or before	280 days

**Note:** The issuance of the NTP may be performed virtually and will be an introduction of the AE team to the IPT. The IPT will consist of members of the impacted clinical and administrative services, engineering (safety, biomed and M&O), IT and other members of the medical center who have vested interests in the design, compliance and accreditation for the medical center. The period between the NTP and the initial IPT meeting shall be used for the AE to gather data/information to be well prepared to discuss their design intent and to ensure project requirement/restraints are understood to make a highly productive meeting at the initial IPT meeting. This time shall also be used to gather as-builts and begin investigative services. AE will be required to attend and take minutes at each IPT meeting. Minutes will be submitted electronically to the COR and Contracting Officer within five (5) calendar days of each meeting. AE is responsible for documenting through meeting minutes all comments received at the IPT on-site reviews including but not limited to written, typed, drawing mark-ups, verbal etc.

The first five working days of the IPT review time will be for the VA to determine minimum acceptability of the design submission. If the VA finds the design submission to be unacceptable, the AE will be required to resubmit the submission. The VA review time will not be impacted and shall remain the same number of allotted days with the first five working days for the VA to determine acceptability of the design submission. The AE will be responsible for maintaining the overall design completion date and is responsible for making up lost time due to unacceptable design submissions. An incomplete submission is defined as a submission lacking any piece of information outlined in Attachments A – F of this SOW, or failure of submission to include a required item as outlined by [PG-18-15](#), Volume C.

All documents submitted shall comply with the [VA Building Information Model Standards](#).

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## -- Design Requirements/Submissions --

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**EXPECTATIONS:** *Submit complete review package in accordance with the following requirements and guidelines outlined in <http://www.cfm.va.gov/til/ae/aesubmin.doc>. Please pay specific attention to the schematic, design and construction submission requirements. As appropriate depending upon the complexity of the design, the AE may elect to delete individual submissions where not required (i.e. Do not address A. Site Development, Landscaping for interior renovation projects)*

Deliver all design packages in person directly to the COR on the established dates to allow the VA IPT to meet as scheduled. A transmittal letter is required to go to the Contracting Officer on the same day as delivery.

Include all information required for each submittal as outlined in Program Guide PG-18-15, Volume C and as outlined in the attachments A – F. The program guide is available at the following address: <http://www.cfm.va.gov/til/ae/aesubmin.doc>. AE shall provide a checklist of all submittals, certifications, tests, and inspections required per drawing and specification section.

All designs shall be accomplished in accordance with VA guidelines and specifications, which are available on the Internet at <http://www.cfm.va.gov/til/>. As a minimum, design shall comply with the applicable sections from the following VA standards and guidelines found at the web site above:

- [PG-18-1](#) Master Construction Specifications
- [PG-18-3](#) Design & Construction Procedures
- [PG-18-4](#) Standard Details and CAD Standards
- [PG-18-5](#) Equipment Guide List
- [H-18-8](#) Seismic Design Handbook (Seismicity = Low, Risk Category = IV, Site Class = D, Seismic Design Category = C, Component Importance Factor,  $I_p = 1.5$ )
- [PG-18-9](#) Space Planning Criteria, and VA-Space & Equipment Planning System (VA-SEPS)
- [PG-18-10](#) Design Manuals
- [PG 18-12](#) Design Guides
- [PG-18-13](#) Barrier Free Design Guide
- [PG-18-15](#) Minimum Requirements for A/E Submissions
- [PG-18-17](#) Environmental Planning Guide
- [Special Design Requirements](#) (includes asbestos, commissioning, fire/life safety and physical security)
- [Sustainable Design Requirements](#)
- [Cost Estimating Requirements](#)
- [AE Quality Alerts](#)
- [AE Design Alerts](#)
- Design shall comply with 20013 ASHRAE 90.1 Standards, as well as:
  - [VA Directive 0055 VA Energy and Water Management Program](#)
  - [VA Directive 0056 VA Sustainable Buildings Program](#)
  - [VA Handbook 0056 VA Sustainable Buildings Program](#)
  - [VA Directive 0065 Climate Change Adaptation Planning](#)
  - [VA Directive 0066 VA Sustainable Locations Program](#)
  - [VA Directive 1061 Prevention of Healthcare-Associated Legionella Disease and Scald Injury from Potable Water Distribution Systems](#)
  - [VA Directive 1116 Sterile Processing Services](#)
  - [VHA Directive 1129 Radiation Protection for Machine Sources of Ionizing Radiation](#)

- [VHA Handbook 1330.01 Health Care Services for Woman Veterans](#)
- [VA Directive 7545 Cultural Resource Management](#)
- [VA Handbook 7545 Cultural Resource Management Procedures](#).

### **COST ESTIMATING:**

*Philosophy* - Cost management is the task – the cost estimate is the tool. The AE shall manage the execution of the project within the VA programmed construction budget. The VA programmed construction budget will not be made known until after design award. The entire AE design team will take ownership of the project construction budget and be an advocate for successful execution of the project within the available funding. The cost estimator's role must be viewed as a critical element of project cost management. Rather than limiting responsibilities to simply reporting costs, the estimator must be an integral part of the design team, continually interacting and providing input to design decisions at every stage of development.

*Objective* - Cost estimates for the base bid shall be within  $\pm 5\%$  of the VA programed construction budget. If the cost estimate is outside of  $\pm 5\%$  of the construction budget, the AE is responsible for notifying the VA of potential budget issues, providing non-scope impacting recommendations to get estimate with  $\pm 5\%$  of budgeted construction cost and providing a design documents that correspond accordingly. Design submissions with cost estimates outside of the  $\pm 5\%$  window are grounds for rejecting a design submission. The final construction document submission estimate shall not be greater than the VA programed construction budget and not less the  $-5\%$  of the VA programed construction budget.

*Recapitulation* - Provide a recapitulation sheet of the total project (phase by phase as appropriate) listing site work, each new building, each new building addition and each renovated building separately. This document shall precede the summary sheets. A recapitulation sheet will be required for each bid packages (deductive alternates).

*Detail* - The level of detail an estimate shall be consistent with the degree of completeness of the drawings being submitted. If a construction element is shown, it must be priced; if it is shown in detail, it must be priced in detail. For detailed elements, "lump sum" or "allowance" figures will not be acceptable. Project estimates will include all elements within the contractor's bid such as insurance, bonds, hazardous abatement and any other such items.

*Timing of Submission* - Responsible decisions cannot be made without knowing the associated cost. **Cost documentation must be delivered at the same time as other design submissions.** The AE is responsible for managing workflow and communications to ensure that this can be accomplished. It is understood that some details may change in the final days preceding a submission. Cost data shall be submitted on the most up to date design information possible, with a narrative of any late developments that will affect cost.



**DEDUCTIVE ALTERNATES, AND EQUIPMENT/SYSTEM DECISION TREE:**

The AE shall provide a design identifying 10% of the construction budget as deductive alternates. Each alternate shall be progressively deductive in nature and shall be non-scope impacting. The VA and AE shall work collaboratively to ensure project remains viable for medical center operations within the allotted budget. The VA will have the final determination on the AE recommended bid deducts. Items removed as bid deducts shall be evaluated to determine impacts to the remainder of the design. Certain bid deducts could require a separate design to keep the design intent viable. Items identified as 'yes' in question 1 of the below decision tree shall not be removed as bid deductive alternates. Items identified as 'yes' in question 2, 3, or 4 of the below decision tree shall not be removed as bid deductive alternates without explicit consent from the Contracting Officer through the facility Chief Engineer. Items identified as 'no' in question 4 shall not be included as part of the construction project, however, utilities and site prep for such equipment (or future equipment) is permissible.

**Decision Tree**

1. Is the item necessary to meet requirements for an occupied building? This includes all code required items, such as fire alarm. If yes, the item is to be funded within the construction project. If no, proceed to question 2.
2. Is the item covered by OCFM's Master Construction Specifications PG-18-1, Divisions 1 through 10, 13 through 26, or 28 through 48? If yes, the item is to be funded within the construction project. If no, proceed to question 3.
3. Is the item covered in OCFM's Master Construction Specifications PG-18-1, Division 27 and not IT equipment\*? If yes, the item is to be funded within the construction project. If no, proceed to question 4.
4. Is the item covered in OCFM's Master Construction Specifications PG-18-1, Number 12 31 00, 12 32 00, 12 34 00, or 12 36 00? If yes, the item is to be funded within the construction project. If no, then the equipment must be funded by the facility's respective equipment fund from medical care appropriations.

\*IT equipment includes: computers, monitors, keyboards, docking stations, phones, printers, scanners, etc. Cabling and raceways for IT equipment is not included as part of IT equipment.

Other Non-IT equipment includes: physical access control systems, data closet racks, WI-FI (both patient and medical), temp track, testing and punch down of the information systems etc.

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## -- Construction Period Services --

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**Expectations:** *Respond to submittals and other requests in a timely manner.*

The AE shall provide the following services:

- Assist in answering bid questions during solicitation and issuing any addendums, drawings, etc. necessary to address questions.
- Assist the VA to determine whether the contractor or subcontractor meets qualification requirements, support by written recommendations of any problems or litigation encountered in past based on first-hand knowledge.
- Review all submissions and provide concise direction to the VA within 5 days upon request to include all submittals, shop drawings, product data, installation instructions, samples, RFI's, change order proposals, etc. Changes to contract documents based on errors and omissions in design will be at no cost to the VA to include cost estimates for the change. Contracting officer shall make final determination on what is or is not an error or omission.
- Provide certified industrial hygiene services to perform asbestos abatement 3<sup>rd</sup> party monitoring during construction period services.
- Provide Commissioning for HVAC systems in lieu of a VA hired 3<sup>rd</sup> party agent.
- Prepare record drawings based on contractor red-line as-built drawings with correspondence performed during construction. The AE shall provide a set of updated drawings and specifications on CD within 30 days of construction contract completion to the COR.
- The AE fee shall include all costs for printing and miscellaneous reimbursable costs.
- Invoice payments for construction period services shall be directly correlated to the construction project progress percent complete. This amount will be coordinated with the COR throughout construction (i.e. if the construction is 20% complete, construction period services shall be billed at 20% complete).

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## -- Site Visits --

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The AE shall:

- Make site visits on requests of the VA and prepare documented field reports denoting the purpose and results of the site visit to include agreed upon changes in design as determined necessary during the construction. Visits made based on errors and omissions in design will be at no cost to the VA.
- Participate in partial/final acceptance inspections (in-wall, above ceiling and final) as scheduled and generate punch list items for completion. Inspections shall cover quality of installations and locations/placement of items in accordance with the contract documents. The punch list shall reference the contract documents for specific deficiencies (i.e. specification section, drawing detail, etc.).
- Attend the pre-bid and pre-construction conference to review and confirm project scope.
- During construction, allow for a minimum of 30 site visits as directed and scheduled by the COR.

## Attachment A

### Schematic Design Submission Requirements (SD–15%)

**Deliver** the following (labeled with Schematic Design) and **include** this attachment as a checklist with your submission:

- ☐ **3 copies** evaluation narrative addressing items listed in the design requirements and any additional AE recommendations for each of the three proposed layouts.
- ☐ **3 half size sets** of architectural floor layouts for each of the three proposed layouts being considered based on space required and VA space criteria. Make a recommendation on the most efficient and effective floor layout and the reasons for the preference. Show equipment to be used in each room/area.
- ☐ **1 copy** of the preliminary cost estimate for each option being considered.
- ☐ **1 CD containing**
  - ☐ All drawings in AutoCAD 2016 and pdf format
  - ☐ Narrative report in pdf format
  - ☐ Electronic copy of preliminary cost estimate
  - ☐ PG-18-15, Volume C checklists, completed and signed
  - ☐ Design review checklists, completed and signed.

**\*\*\*Achieve a consensus on design approach before proceeding to 35% design\*\*\***

## Attachment B

### Design Development Submission Requirements (DD1-35%)

**Deliver** the following (labeled with 35% submission) and **include** this attachment as a checklist with your submission:

- ☐ **3 copies** of a narrative report forwarding the design developed 15% submission addressing items listed in the design requirements and any additional AE recommendations. The report should include identifying potential bid deduct alternatives, recommended construction phasing based upon discussions with COR, and any design calculations or analysis.
- ☐ **3 half size and 1 full size set** of all drawings (blueprint copies) required by project, produced on AutoCAD 2016 software.
- ☐ **2 copies** of updated cost estimate prepared in accordance with Cost Estimating Requirements.
- ☐ **2 copies** of custom edited VA Master Specification to be used for this project and a master submittal list identifying all the submittals required to be submitted by the contractor for review. The list shall be organized by division and specification and include submittals, certifications, shop drawings, tests, samples and inspections required per drawing and specification section.
- ☐ **2 copies** of completed Pre-TAB of existing impacted HVAC systems.
- ☐ **2 copies** of completed environmental sampling reports.
- ☐ **1 copy of each color board** showing the interior design scheme (fabrics, finishes, furniture layout and plans) for each area, east west and center, include an inventory of materials/manufactures recommended for use for approval and prepared for order by the VA Interior Designer. This information should also be submitted on a spreadsheet for use during submittals (color, manufacturer, item number, etc.). The color, name and all applicable identifying numbers shall be placed on the board and be easily read without removing the physical samples.
- ☐ **1 CD containing**
  - ☐ All drawings in AutoCAD 2016 and pdf format
  - ☐ All specifications in Microsoft Word and pdf format
  - ☐ Narrative report in pdf format
  - ☐ Electronic copy of cost estimate
  - ☐ PG-18-15, Volume C checklists, completed and signed
  - ☐ Design review checklists, completed and signed.
  - ☐ Checklist of all submittals, certifications, tests, and inspections in an Excel spreadsheet format
  - ☐ All design related calculations.
  - ☐ Completed Pre-TAB of existing impacted HVAC systems.
  - ☐ Completed environmental sampling reports.

## Attachment C

### Design Development Submission Requirements (DD2–65%)

**Deliver** the following (labeled with 35% submission) and **include** this attachment as a checklist with your submission:

- ☐ **3 copies** of a narrative report forwarding the design developed 35% submission addressing items listed in the design requirements and any additional AE recommendations. The report should include identifying potential bid deduct alternatives, recommended construction phasing based upon discussions with COR, and any design calculations or analysis.
- ☐ **3 half size and 1 full size set** of all drawings (blueprint copies) required by project, produced on AutoCAD 2016 software.
- ☐ **2 copies** of updated cost estimate prepared in accordance with Cost Estimating Requirements.
- ☐ **2 copies** of custom edited VA Master Specification to be used for this project and a master submittal list identifying all the submittals required to be submitted by the contractor for review. The list shall be organized by division and specification and include submittals, certifications, shop drawings, tests, samples and inspections required per drawing and specification section.
- ☐ **1 copy of each color board** showing the interior design scheme (fabrics, finishes, furniture layout and plans) for each area, east west and center, include an inventory of materials/manufactures recommended for use for approval and prepared for order by the VA Interior Designer. This information should also be submitted on a spreadsheet for use during submittals (color, manufacturer, item number, etc.). The color, name and all applicable identifying numbers shall be placed on the board and be easily read without removing the physical samples.
- ☐ **1 CD containing**
  - ☐ All drawings in AutoCAD 2016 and pdf format
  - ☐ All specifications in Microsoft Word and pdf format
  - ☐ Narrative report in pdf format
  - ☐ Electronic copy of cost estimate
  - ☐ PG-18-15, Volume C checklists, completed and signed
  - ☐ Design review checklists, completed and signed.
  - ☐ Checklist of all submittals, certifications, tests, and inspections in an Excel spreadsheet format
  - ☐ All design related calculations.

## Attachment D

### Construction Document Submission Requirements (CD1–95%)

**Deliver** the following (labeled with 35% submission) and **include** this attachment as a checklist with your submission:

- ☐ **3 copies** of a narrative report forwarding the design developed 65% submission addressing items listed in the design requirements and any additional AE recommendations. The report should include identifying potential bid deduct alternatives, recommended construction phasing based upon discussions with COR, and any design calculations or analysis.
- ☐ **3 half size and 1 full size set** of all drawings (blueprint copies) required by project, produced on AutoCAD 2016 software.
- ☐ **2 copies** of updated cost estimate prepared in accordance with Cost Estimating Requirements.
- ☐ **2 copies** of custom edited VA Master Specification to be used for this project and a master submittal list identifying all the submittals required to be submitted by the contractor for review. The list shall be organized by division and specification and include submittals, certifications, shop drawings, tests, samples and inspections required per drawing and specification section.
- ☐ **1 copy of each color board** showing the interior design scheme (fabrics, finishes, furniture layout and plans) for each area, east west and center, include an inventory of materials/manufactures recommended for use for approval and prepared for order by the VA Interior Designer. This information should also be submitted on a spreadsheet for use during submittals (color, manufacturer, item number, etc.). The color, name and all applicable identifying numbers shall be placed on the board and be easily read without removing the physical samples.
- ☐ **2 framed project renderings** to inform the public of the project intent to include drawings, color renderings and fact sheets.
- ☐ **1 copy of construction plan** showing temporary conditions for construction, per phase, to ensure general conditions, life safety and infection control requirements are designed, identified and specified
- ☐ **1 CD containing**
  - ☐ All drawings in AutoCAD 2016 and pdf format
  - ☐ All specifications in Microsoft Word and pdf format
  - ☐ Narrative report in pdf format
  - ☐ Electronic copy of cost estimate
  - ☐ PG-18-15, Volume C checklists, completed and signed
  - ☐ Design review checklists, completed and signed.
  - ☐ Checklist of all submittals, certifications, tests, and inspections in an Excel spreadsheet format
  - ☐ All design related calculations.

## Attachment E

### Construction Document Submission Requirement (CD2–100%)

**Expectation:** *Submit complete bid document for final review prior to solicitation*

**Deliver** the following (labeled with 35% submission) and **include** this attachment as a checklist with your submission:

- ☐ **3 copies** of a narrative report forwarding the design developed 95% submission addressing items listed in the design requirements and any additional AE recommendations. The report should include identifying potential bid deduct alternatives, recommended construction phasing based upon discussions with COR, and any design calculations or analysis.
- ☐ **3 half size and 1 full size set** of all drawings (blueline copies) required by project, produced on AutoCAD 2016 software.
- ☐ **2 copies** of updated cost estimate prepared in accordance with [Cost Estimating Requirements](#).
- ☐ **2 copies** of custom edited VA Master Specification to be used for this project and a master submittal list identifying all the submittals required to be submitted by the contractor for review. The list shall be organized by division and specification and include submittals, certifications, shop drawings, tests, samples and inspections required per drawing and specification section.
- ☐ **1 CD containing**
  - ☐ All drawings in AutoCAD 2016 and pdf format
  - ☐ All specifications in Microsoft Word and pdf format
  - ☐ Narrative report in pdf format
  - ☐ Electronic copy of cost estimate
  - ☐ PG-18-15, Volume C checklists, completed and signed
  - ☐ Design review checklists, completed and signed.
  - ☐ Checklist of all submittals, certifications, tests, and inspections in an Excel spreadsheet format
  - ☐ All design related calculations.
  - ☐ Interior Design finish summary containing the approved submittal information. This at a minimum will include sufficient information to order/make repairs, i.e. color, manufacturer, item number, etc.



## Attachment F

### Construction Bid Document Submission Requirements

**Expectation:** *Continue to submit until all changes are incorporated by the AE for final signature prior to solicitation. Upon approval, duplicate copies as required.*

**Continue to update and submit until approved. Final design documents shall be sealed and signed by the design professional responsible/liable for the design represented in the respective document. The seal and signature shall conform to laws and requirements for the application of seals and signatures for professionals in the state or region in which the person taking liability for the work is registered**

- ☐ **1 full size set** of all drawings required by project, produced on AutoCAD software for final markup of any changes prior to signature.
- ☐ **1 copy** (bound) of project specifications produced on Microsoft Word software.
- ☐ **1 CD containing**
  - ☐ All drawings in AutoCAD 2016 and pdf format
  - ☐ All specifications in Microsoft Word and pdf format
  - ☐ Narrative report in pdf format
  - ☐ Electronic copy of cost estimate
  - ☐ PG-18-15, Volume C checklists, completed and signed
  - ☐ Design review checklists, completed and signed.
  - ☐ Checklist of all submittals, certifications, tests, and inspections in an Excel spreadsheet format
  - ☐ All design related calculations.
  - ☐ Interior Design finish summary containing the approved submittal information. This at a minimum will include sufficient information to order/make repairs, i.e. color, manufacturer, item number, etc.
- ☐ **Upon final signature approval, provide**
  - ☐ **1 full size sets of final Contract Drawings (complete with VA signed Cover Sheet).**