

## CHAPTER A-11

### SPECIFICATIONS

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## CHAPTER A-11

### SPECIFICATIONS

**11.1 GENERAL.** The Engineering Support Services Section (EN-ES) coordinates the activities related to the preparation and issuance of the bid document for formally advertised projects. The section assists the A-E with the format and administrative requirements involved with preparing the technical provisions of the contract specifications and reviews these specifications for continuity of bid documents.

This chapter has been prepared to assist the A-E in preparing the contract technical specifications. Questions relating to this chapter or any facet of specification writing or preparation shall be directed to the Savannah District Project Manager. The Engineering Support Services Section will promptly respond to the Project Manager's inquiry.

#### **11.2 APPLICABLE PUBLICATIONS.**

ER 1110-345-100 Design Policy for Military Construction

ER 1110-1-8155 Specifications

ER 415-1-10 Contractor Submittal Procedures

Federal Acquisition Requirements

Part 6, Competitive Requirements

Part 7, Acquisition Planning

Part 10, Specification, Standards and Other Purchase Descriptions

Part 36, Construction and Architect-Engineer Contracts

**11.3 PRECONCEPT SUBMITTAL REQUIREMENTS.** Outline specification will be provided at this stage. As a minimum, provide a listing of the specification sections that will be required for the project.

**11.4 CONCEPT, CODE 3 DESIGN REQUIREMENTS AND EARLY PRELIMINARY (35 PERCENT) DESIGN SUBMITTAL REQUIREMENTS.** The A-E shall submit an outline specification listing the proposed guide specifications and A-E prepared sections that will be required for the project. The proposed specification sections shall be shown on the outline specification using the UFGS number and title. Sections shall be arranged within their respective divisions, in numerical order. New specification sections developed by the A-E shall be numbered to fall in the respective division at a logical location for the job.

**11.5 PRELIMINARY (60 PERCENT) SUBMITTAL REQUIREMENTS.** No specifications will be required at this submittal.

**11.6 PRELIMINARY (60 PERCENT) DESIGN SUBMITTAL REQUIREMENTS.** No specifications will be required at this submittal.

**11.7 FINAL (100 PERCENT) DESIGN SUBMITTAL REQUIREMENTS.**

11.7.1 Final Specifications. The A-E shall provide one hard copy of the final project specifications, in order and an electronic copy on CD in SPECSINTACT format. The original technical sections shall have been prepared in accordance with the specific requirements and instructions contained in this chapter and printed on letter quality or laser printer on bond paper.

11.7.2 Aids to Advertising. The A-E shall submit the following as part of the final design submittal package to aid in the preparation of the solicitation package.

11.7.2.1 Scope of Work. The A-E shall submit a Scope of Work. The scope will be a brief written description of the work involved and will include a listing of approximate quantities, such as "the work includes the construction of a 250,000 square foot administrative building...." The project site shall be located by including the name of the county and state in which the work is done. Also, the appropriate cost range shall be selected by the A-E from the ranges listed below and included at the end of the resume:

- less than \$25,000
- between \$25,000 and \$100,000
- between \$100,000 and \$250,000
- between \$250,000 and \$500,000
- between \$500,000 and \$1,000,000
- between \$1,000,000 and \$5,000,000
- between \$5,000,000 and \$10,000,000
- between \$10,000,000 and \$25,000,000
- between \$25,000,000 and \$50,000,000
- between \$50,000,000 and \$100,000,000
- over \$100,000,000

See Exhibit A-11-5.

11.7.2.2 Construction Time Estimate. The A-E shall submit a Construction Time Estimate and the rationale used to develop the estimate. When preparing the estimate, consideration shall be given to procurement of materials, sequence of construction, climatic conditions to be encountered during construction, etc.

11.7.2.3 List of Drawings. The A-E shall submit a list of drawings. The list of drawings consists of sheet numbers, drawing titles, revision number (if applicable) and latest date, and electronic file name. The file number is placed at the top of the sheet number column of each page of the list of drawings. File numbers shall be obtained by the A-E from the Project Manager. The latest date shall consist of the day, month, and year and shall match the date entered in the drawing title block. Drawing titles entered on the list of drawings shall match exactly the titles on the individual drawings. List of drawings for civil projects includes one additional column entitled Drawing No.

11.7.2.4 Schedule (Section 00010). The A-E shall submit a proposed Schedule for bidding purposes. The Schedule shall set up all lump sum and unit price items for work to be accomplished under the contract. The Schedule shall be carefully coordinated with the

payment paragraphs (if required) included in the technical specifications. In instances where extremely small quantities are involved in the exterior items of work, payment will be on a "job lump sum basis" (see Exhibit A-11-2). When large quantities are involved in exterior items of work, payment will be made on a "unit price basis" (see Exhibit A-11-3). A list of quantities for each item of outside work--site preparation, drainage, paving and utilities--will be submitted with the quantity takeoff regardless of whether the item is paid for on a lump sum or unit price basis (see Exhibit A-11-4).

11.7.2.5 Table of Contents. The A-E shall prepare and submit a Table of Contents for technical specifications.

11.7.2.6 List of Government-Furnished Equipment. If applicable, the A-E shall submit a list of Government-furnished equipment, including the description, weight, size, quantities, and approximate value for inclusion in the contract clauses of the solicitation. This list is usually applicable in renovation or relocation projects when the user wishes to relocate existing equipment. This list shall be furnished in two categories, Government-Furnished, Contractor-Installed (GFCl) and Government-Furnished, Government-Installed (GFGI), if applicable.

11.7.2.7 Salvable Material. If applicable, the A-E shall submit information concerning any salvable material.

11.7.2.8 Special Situations. The A-E shall submit information covering any unusual situations, i.e., interface problems, outages, security and/or safety requirements, storage areas, construction sequences and phasing requirements, access to site, early completion dates, etc.

11.7.2.9 Additional Submittals. The complexity of some projects may require additional submittals, other than those previously listed. The A-E shall be advised of any additional submittal requirements and shall submit them as directed.

11.7.3 Questions. Any questions concerning the above listed submittal requirements should be directed to the Project Manager.

## 11.8 CORRECTED FINAL DESIGN SUBMITTAL REQUIREMENTS.

11.8.1 Notice. Corrected final submittals are not considered a normal design level and are required only when final submittals must be revised or corrected due to error or omission.

11.8.2 Corrected Submittal. When this submittal stage is required, the A-E shall submit the final project specification that has been corrected and/or revised in accordance with the Final Design Submittal review comments. The submittal shall include the A-E's annotated comments (see paragraph 11.14) indicating the action taken on each of the review comments.

11.9 REQUIREMENTS FOR DESIGN/BUILD RFP PACKAGES. To be provided by specific instructions to contract or delivery order.

## 11.10 TYPES OF SPECIFICATIONS.

11.10.1 Available Guide Specifications. All final project specifications shall be prepared using the guide specifications obtained from Techinfo web site [www.hnd.usace.army.mil/techinfo](http://www.hnd.usace.army.mil/techinfo) or furnished by the Savannah District, unless the A-E must prepare job specific specifications when guide specifications are not available. The guide specifications are to be edited and adapted by the designer to fit each individual project in accordance with the project requirements. The designer is to delete the inapplicable portions of the guide specifications and revise and/or supplement, as required, the applicable portions to provide a complete project specification. Deviations, except as authorized by ER 1110-1-8155, will not be allowed without prior approval through the Savannah District.

11.10.1.1 Unified Facilities Guide Specifications (UFGS). UFGS specifications are prepared by the Office, Chief of Engineers, and are available on Internet at [www.hnd.usace.army.mil/techinfo](http://www.hnd.usace.army.mil/techinfo). UFGS will be used in the preparation of project specifications in accordance with ER 1110-1-8155. UFGS will not be made a part of project specifications by reference; pertinent portions of UFGS will be copied verbatim into project specifications.

11.10.1.2 Savannah District Guide Specifications. Savannah District has developed guide specifications, based on corresponding UFGS guide specifications, to fit local conditions. Where Savannah District has prepared a guide specification, it shall be used in lieu of the UFGS guide specification. These specification sections are available at <http://en.sas.usace.army.mil> under Engineering Criteria.

NOTE: THESE GUIDE SPECIFICATIONS COVER THE USUAL AND PREFERRED TYPES OF CONSTRUCTION USED IN THE SAVANNAH DISTRICT AND ARE IN ACCORDANCE WITH THE REQUIREMENTS OF THE TECHNICAL MANUALS AND THE ARCHITECTURAL AND ENGINEERING INSTRUCTIONS AND AS REQUIRED BY LAW TO PROVIDE OPEN AND COMPETITIVE BIDDING WITHOUT PROPRIETARY EXCLUSION OF ACCEPTABLE PRODUCTS. THE GUIDE SPECIFICATIONS, INCLUDING "NOTES TO SPECIFICATION WRITER," SHALL BE REVIEWED BEFORE STARTING THE DRAWINGS AND AGAIN BEFORE WRITING THE SPECIFICATIONS. SEE ER 1110-1-8155 FOR CRITERIA, GUIDANCE, AND LIMITATIONS NOT COVERED BY THESE STANDARD PROCEDURES. YOU ARE SPECIFICALLY CAUTIONED ABOUT DEVIATIONS AS OUTLINED IN ER-1110-1-8155.

11.10.1.3 Editing of Guide Specifications. Each guide specification used in the preparation of project specifications will be edited to fit the requirements of the project. Where numbers, symbols, words, phrases, clauses, or sentences are enclosed in brackets [ ], a choice or modification must be made; exercise care in making the choice or modification. Where blank spaces are provided for the insertion of data or text, insert the appropriate information. Where entire paragraphs are not applicable they must be omitted. When necessary to add additional requirements, be sure they are consistent with the other requirements of the guide specifications and that they do not unnecessarily restrict products that can be furnished.

11.10.2 Other Specifications. When there is no appropriate UFGS or Savannah District guide specification for a particular topic, the A-E will prepare the required specification. The specification shall be arranged and typed using the UFGS format and coded in SPECSINTACT. The TechInfo website contains guide specifications from many Government agencies and is a good source for topics not covered by the UFGS. The specification shall not be written around materials, equipment or procedures which restrict competitive bidding unless a specific waiver has been obtained by the Project Manager. The A-E shall prepare the required section using one of the following procedures:

11.10.2.1 Functional or Descriptive Specifications. The A-E will normally be instructed to prepare "functional or descriptive specifications" using industry standards, manufacturer's data, and other available information. These specifications shall be prepared and developed by listing parameters, methods, techniques and other requirements that several manufacturers can satisfy. These specifications shall list the essential features, requirements, minimum functions, and other factors to clearly indicate the type and quality of item required. Specifications should not be developed around a single manufacturer. Questions concerning the preparation of specifications of this type should be directed to the Project Manager.

11.10.2.2 Sole Source Specifications. There may be instances when only one manufacturer's product will satisfy job conditions. For example, in rehabilitation work, updating a particular piece of existing mechanical equipment may require new parts from the manufacturer of that particular piece of equipment. A sole source type may be acceptable in this instance provided prior approval is received from higher authority. To receive approval, the A-E will be required to provide written sole source justification to the Project Manager. This justification should be prepared and presented as early in the design process as possible, since approval usually takes considerable time. The A-E should be aware that preparing proprietary type specifications based on trade, brand, manufacturer's name or adopting a manufacturer's description of a particular article or procedure are unacceptable and should be avoided if at all possible.

11.10.2.3 "Or Approved Equal" Specifications. In some instances, acceptable standards of quality may be listed by brand name or approved equal. In some cases, it is preferred that the names of at least three manufacturers (with current addresses and phone numbers) as well as model numbers be listed. Each of the listed items should be items exhibiting the functional characteristics required. Each brand name should be followed by the words "or approved equal." The intent of the "or approved equal" procedures is to offer bidders the opportunity to substitute items equal in functionality and quality. "Or approved equal" specifications should be avoided, in preference to "functional or descriptive specifications" as discussed in paragraph 11.9.2.1 above.

11.10.2.4 Other Federal Agency Specifications. Savannah District has access to guides specifications of other Federal agencies. Upon request, the Engineering Management and Support Section will assist in conducting a global search for key words or phrases on specific topics. Such special assistance is limited and requests for this assistance must be directed through the Project Manager.

11.10.3 Availability of Federal and Military Specifications, Standards and Descriptions. Guide specifications make numerous references to other publications. Access by the A-E to these publications is available on a CCB CD-ROM disk set available from the National Institute of Building Sciences or from:

11.10.3.1 Unclassified Federal, Military, and Other Specifications and Standards (Excluding Commercial), and Data Item Descriptions. Submit request on DD Form 1425 (Specifications and Standards Requisition) to:

Commanding Officer  
U.S. Naval Publications and Forms Center  
5801 Tabor Avenue  
Philadelphia, PA 19120

The Acquisition Management Systems and Data Requirements Control List, DOD Directive 5000.19L, Volume II, may be ordered on the DD Form 1425. The Department of Defense Index of Specifications and Standards (DODISS) may be purchased from the Superintendent of Documents, U.S. Government Printing Office, Washington, DC 20402. When requesting a specification or standard, the request shall indicate the title, number, date and any applicable amendment thereto by number and date. When requesting a data item description, the request shall cite the applicable data item number set forth in the solicitation. When DD Form 1425 is not available, the request may be submitted in letter form, giving the same information as listed above, and the solicitation or contract number involved. In case of urgency, such requests may also be made to the activity by telegram or telephone ((215) 697-3321).

11.10.3.2 Commercial Specifications, Standards and Description. These specifications, standards and descriptions are not available from Government sources. They may be obtained from the publishers.

11.10.3.3 Engineering Manuals and Concrete Research Division Publications may be obtained from the addresses given below. Requests for these manuals and publications should give the title, number, date and any applicable amendment or revision thereto by number and date.

Engineering Manuals:

Chief of Engineers  
ATTN: DAEN-ASP-D  
Department of the Army  
890 South Pickett Street  
Alexandria, VA 22304

Concrete Research Division Publications:

U.S. Army Engineer Waterways Experiment Station  
ATTN: Publications Distribution Unit  
P.O. Box 631  
Vicksburg, MS 39180

**11.11 SPECIFICATION PREPARATION METHODS.** The Savannah District accepts only specifications prepared in SPECSINTACT format.

11.11.1 SPECSINTACT. The web site contains a word processing software specifically tailored for specification editing of UFCS specification. This software is called SPECSINTACT. Information regarding SPECSINTACT is available at TechInfo web site.

11.11.2 Using SPECSINTACT. Refer to SPECSINTACT User Manual. Training is available on preparing specifications using SPECSINTACT through your Corps of Engineers Project Engineer.

11.11.3 Guide Specifications. UFGS Guide Specifications are available from Huntsville District at Internet address <http://www.hnd.usace.army.mil/techinfo/>. Additionally Savannah District has a small collection of District specific guide specifications at <http://en.sas.usace.army.mil> that have been coded in SPECSINTACT format.

11.11.4 Developing Unique Project Specifications. When there is no suitable industry standard, federal specification, or other impartial standard for specifying a specific item or material, "trade name or equal" material requirement may be used in Part 2, PRODUCTS of a specification section. This should be avoided in most projects. When sole source (only one acceptable product) requirements are included in the specifications, for each such requirement the designer will develop the items described at FAR 6.303-2. The format of unique specifications shall follow the same format as the UFGS specifications.

**11.12 FINAL SPECIFICATION PREPARATION.** Provide the following with the final submittal.

Concise scope of work for the project.

Construction time estimate.

Drawing list. The A-E will provide a drawing list, listing sheet number and title, and electronic CAD file name. This list shall be provided in electronic format.

Proposed schedule.

Table of Contents for technical specification sections.

List of Government-furnished equipment.

Salvageable materials.

Contractor's submittal requirements on ENG FORM 4288.

Hard copy originals and electronic copy of edited specifications.

Special situations which affect construction schedules.

11.12.1 Technical Specification Scope. The technical specifications shall include performance and specific tasks type specifications for all work required to complete the project.

11.12.1.1 The A-E will be responsible for the accurate preparation of the technical specifications. The A-E will also be required to prepare a drawing list and a list of "Contractor Submittal Requirements." The A-E will also have considerable input in preparation of the "Schedule." Generally speaking, when requested by the Project Manager, the A-E will provide additional information as necessary for inclusion in the nontechnical portion of the specifications.

11.12.1.2 The A-E will delay preparation of the project specifications until after the preliminary review stage. Generally, guide specifications must be edited by the A-E to satisfy the requirements of the particular project being designed. The Contractor submittal register must be edited to include all those submittals required. The drawings and specifications must complement each other. All extraneous and irrelevant information contained in the guide specifications must be eliminated. Likewise, information not originally contained in the guide specifications must be added to ensure a complete specification. Furthermore, functional or descriptive specifications must be developed as necessary to fully specify the requirements of the project being designed.

11.12.2 Quality of Work. In accordance with the "Responsibility of the Architect-Engineer" clause of the Contract Clauses of the Architect-Engineer contract, the A-E is totally responsible for the content of the technical specifications and for material shown on the drawings which has been inadvertently omitted from the specifications. The specifications shall be complete, accurate, clear and precise and shall not be subject to interpretation. They shall be specific and free of ambiguities.

11.12.2.1 The A-E shall coordinate the specifications with the drawings and cross check all references within the specification for agreement with the drawings and other sections of the specifications.

11.12.3 Specification Format. The final project specifications shall be prepared in SPECSINTACT format.

11.12.3.1 A Table of Contents to the technical provisions shall be furnished.

11.12.3.2 Provide complete ENG Form 4288, Submittal Register.

11.12.3 Checklist. A checklist for final specification preparation is included as Exhibit A-11-1 and should be used to ensure that specifications are acceptable. If any of the

questions are answered "NO," that portion of the work is unacceptable. Any questions resulting from answering the checklist should be referred to the Project Manager.

11.12.5 Notes to the Specification Writer. Specific "NOTES TO THE SPECIFICATION WRITER" are included in the body of technical guide specifications. These notes are denoted by a row of asterisks above and below the notes. These notes form an important part of Corps of Engineers technical requirements and offer direction to the specification writer. They should be carefully followed not only in preparing the specification but particularly in preparation of drawings. In many instances, reference is made to items not included in the main body of the specification. It is required that the A-E read the notes and comply with the instructions contained therein. It is very important to provide drawing details referenced in the specification. At the final design submittal stage, the A-E will submit the finished hard copy of the project specifications.

11.12.6 Contractor Submittal Requirements. The specifications shall require the Contractor to submit shop drawings, samples, manufacturer's data, certificates, test reports, etc. as appropriate. The A-E will be required to furnish a listing of the Contractor's submittal requirements on ENG Form 4288. SPECSINTACT prepares this form automatically.

11.12.6.1 For an A-E prepared specification section, the A-E shall properly code the SPECSINTACT document so that submittals will be included in ENG Form 4288.

11.12.7 Payment Paragraphs. No payment paragraphs will be required when bid items on the Schedule are all job, lump sum. Payment paragraphs are required for those sections which cover miscellaneous utilities, roadways, site development and other outside facilities set up for separate payment at a unit price. Each section of specifications which sets items of work for separate payment shall have a paragraph entitled "PAYMENT." This paragraph shall be so worded as to conclusively indicate the method of payment and shall be fully coordinated with the applicable item listed in the Schedule.

11.12.8 Paragraph Numbers. When editing a guide specification in preparing the final project specification, the A-E shall verify that all paragraph numbers in a section are properly connected in sequence.

11.12.9 Omitted Paragraphs. When editing a guide specification in preparing the final project specifications, the A-E shall indicate omitted paragraphs that are required to connect paragraph numbering as follows:

11.12.9.1 Omitted main paragraphs shall be shown in the section text as OMITTED using all capital letters.

11.12.9.2 Omitted subparagraphs shall be shown in the section text as Omitted using initial caps.

11.12.9.3 Omitted paragraphs that are not required to connect the paragraph numbers shall be deleted entirely and not shown in the final specifications.

11.12.9.4 All consecutively numbered omitted paragraphs shall be shown single spaced.

11.12.10 SPECSINTACT Verification Reports. Verification reports for brackets, sections and references will be run before submission of final specifications. Any errors found with these reports will be corrected before submission.

**11.13 PREPARING A-E DEVELOPED SPECIFICATIONS.** When the A-E is required to prepare a specification section for a unique product or procedure, the section shall be prepared using SPECSINTACT.

**11.14 PROJECT REVIEW COMMENTS.** The A-E shall annotate the action taken on each concept/preliminary, final or corrected final review comment and shall include the annotated comments with the appropriate submittal package. If the A-E feels that any comment is inappropriate or in error, he shall contact the Project Manager to resolve the conflict. If the comment is modified or omitted as a result of this coordination, then a brief record of the conversation shall be included with the annotated comments.

**11.15 CONTRACT PLANS AND SPECIFICATIONS.**

11.15.1 Handling Bidder Inquiries. Plans and specifications are furnished to the A-E's for those projects they have designed at the same time they are furnished to bidders. Questions from contractors or suppliers to the A-E requiring interpretation should be referred to the Savannah District. An example of this reasoning would be an occurrence wherein a supplier queried an A-E as to whether a certain insulation would meet requirements of the specifications. He reputedly was told that it would, and based his bid accordingly. Criteria requirements had been changed subsequent to design completion by the A-E. The Savannah District had changed the specifications to conform to the new criteria. The insulation proposed would not meet the new requirements.

11.15.2 Clarification Inquiries. The above guidance is not intended to discourage A-E's from following through on requests for clarification, etc., received from bidders. In many cases such requests require clarification or correction. In such cases, the A-E should notify the Project Manager in the Savannah District by the most expeditious means of communication available of the nature of the discrepancy and his recommendations for correction. This action permits correction by amendment to the solicitation rather than by a more expensive contract modification.

**11.16 AMENDMENTS.** During the advertisement period as discrepancies, oversights, omissions, and other changes surface, the A-E will be required to prepare affected drawings and specifications for amendment. All questions involving the amendment procedure should be addressed to the Project Manager. Federal regulations require that bidders be given ample time for the necessary assimilation of the materials contained in the amendment, and that the material is received at least 14 days prior to bid opening date. (This date is shown on page 00010-1 of the SOLICITATION, OFFER, AND AWARD form.) When required, the A-E will furnish to Savannah District, no later than 3 weeks prior to date of bid opening, a CD reflecting revised specifications and drawings incorporating all amendment changes.

11.16.1 Amended Specifications. The A-E is required to furnish revised sections electronically including all changes made by amendment. The A-E is required to send in paper copy of the revised pages. Revised text will be indicated by underlining; deleted text will be struck out (this is a feature of SPECINTACT). Each revision will be indicated by placing an asterisk and the amendment number (e.g. \*1, \*2, etc.) in the space above each paragraph that is revised.

11.16.2 Amendment Narrative. Paragraph A of the sample amendment (Exhibit A-11-6) shows the tabulation by which revised, added and/or deleted pages are made a part of the documents. Each revised or added section will carry the statement "(Revised by Amendment No. 000\_)" or "(Added by Amendment No. 000\_)" to the right of the page number.

11.16.3 Deleted Paragraphs. In preparing the original specifications, omitted paragraphs and subparagraphs were shown as "Omitted." In revising the specifications by amendments, the paragraphs being removed are shown as "Deleted."

11.16.4 Deleted Specifications. When an entire specification section is deleted, list the section in the "Deleted Sections" column of paragraph A.

**11.17 MODIFICATIONS.** Modifications to construction contracts are high priority items and shall be acted upon without delay. Timely preparation of contract documents (see Exhibit A-11-7) to accompany the modification package will prevent undue delay in construction schedules. Upon receipt of design requirements for a proposed modification, the A-E will proceed with preparation of the necessary changes or additions. The completed package will be forwarded to the Project Manager for finalization and subsequent implementation by Construction Division. Modifications to the construction contract may be accomplished by application of one or more methods available to the A-E. Formulating a clear, concise, and accurate modification package cannot be overemphasized.

11.17.1 Scope of Work. One of the most important items the A-E must furnish for a modification is a clear concise scope of work for all major aspects of the modification.

11.17.2 Specifications. When revisions or additions to the specifications are necessary, the changes will be underlined and deletions will be struck out. The applicable note will be typed indicating an addition or revision to the specifications "(Revised by MCB-\_\_-)" or "(Added by MCB-\_\_-)" to the right of the page number.

11.17.3 Modification Drawings or Sketches. Refer to Chapter A-10 for discussion of modifying contract drawings.

11.17.4 Modification Estimate. Cost estimates should be prepared in detail as required for final design documents as described in Chapter A-9, COST ESTIMATES, of this manual. The cost estimate must accompany the finished modification package.

## **CHAPTER A-11**

### **SPECIFICATIONS**

#### **EXHIBITS**

- A-11-1. Checklist for Final Specification Preparation
- A-11-2 Sample Bidding Schedule Suggested for Small Projects and Projects with Site Work and Utilities Minor
- A-11-3 Sample Bidding Schedule Suggested for Larger Projects
- A-11-4 Sample Bidding Schedule Suggested for Larger Projects with Multiple Additives
- A-11-5 Scope of Work
- A-11-6 Amendment Preparation - Electronic Bid Sets (EBS)
- A-11-7 Modification Preparation

CHECKLIST FOR FINAL SPECIFICATION PREPARATION

	YES	NO
a. Have all "gaps" been eliminated where material has been omitted from text?	_____	_____
b. Have verification reports been run and errors corrected?	_____	_____
c. Are omitted main paragraphs indicated as "OMITTED" and omitted subparagraphs indicated as "Omitted"?	_____	_____
d. Are consecutively omitted paragraphs single spaced?	_____	_____
e. Are all paragraph numbers connected?	_____	_____
f. Has ENG Form 4288 SUBMITTAL REGISTER been printed?	_____	_____

SAMPLE BIDDING SCHEDULE SUGGESTED FOR SMALL PROJECTS AND  
PROJECTS WITH MINOR SITE WORK AND UTILITIES

SECTION 00010  
SUPPLIES OR SERVICES AND PRICES/COSTS

SCHEDULE

MUNITION STORAGE FACILITY  
POPE AIR FORCE BASE, NORTH CAROLINA

TOTAL BASE BID (ITEMS 0001 AND 0002) ----- \$ \_\_\_\_\_

TOTAL BASE BID PLUS ADDITIVE NO. I  
(ITEMS 1 THROUGH 3) ----- \$ \_\_\_\_\_

ITEM	DESCRIPTION	QUANTITY	U/M	U/P	AMOUNT
0001	BASE BID - Construction of Storage Igloos (1 and 2) to the 5-Foot Building Line, Complete	1	LS	XXXXX	_____.
0002	BASE BID - Site Preparation and Development, Including Utilities, Complete	1	LS	XXXXX	_____.
0003	ADDITIVE NO. I - Construction of Flammable Storage Building to the 5-Foot Line, Complete	1	LS	XXXXX	_____.

END OF SECTION 00010

SAMPLE BIDDING SCHEDULE SUGGESTED FOR LARGER PROJECTS

SECTION 00010  
SUPPLIES OR SERVICES AND PRICES/COSTS

SCHEDULE

PAVING OF EXISTING ROADS AND PARKING AREAS  
CLARKS HILL DAM AND LAKE  
SAVANNAH RIVER  
GEORGIA AND SOUTH CAROLINA

TOTAL BID (ITEMS 0001 THROUGH 0002E) ----- \$ \_\_\_\_\_

ITEM	DESCRIPTION	QUANTITY	U/M	U/P	AMOUNT
0001	Paving of Existing Roads and Parking Areas - Petersburg Recreation Area:				
0001A	1-1/2 Inch Thick Bituminous Course	13,000	SY	____.____	____.____
0001B	6-Inch Thick Graded Crushed Aggregate Base Course	13,000	SY	____.____	____.____
0001C	Lower Subgrade 6 Inches	6,240	SY	____.____	____.____
0002	Paving of Existing Roads and Parking Areas - Winfield Recreation Area:				
0002A	Bituminous Pavement Leveling	17,920	SY	____.____	____.____
0002B	1-1/2 Inch Thick Bituminous Pavement Overlay	17,920	SY	____.____	____.____
0002C	1-1-1 Inch Thick Bituminous Pavement on Completed Base Course	1,680	SY	____.____	____.____
0002D	6-Inch Thick Graded Crushed Aggregate Base Course	6,240	SY	____.____	____.____
0002E	Remove and Repair Existing Pavement	1	LS	XXXXX	____.____

END OF SECTION 00010

SAMPLE BIDDING SCHEDULE SUGGESTED FOR LARGER PROJECTS  
WITH MULTIPLE ADDITIVES

SECTION B  
SUPPLIES OR SERVICES AND PRICES/COSTS

SCHEDULE

GENERAL INSTRUCTION FACILITIES  
U.S. ARMY SOLDIER SUPPORT INSTITUTE AND  
MARION AVENUE WIDENING  
FORT JACKSON, SOUTH CAROLINA

TOTAL BASE BID - ITEMS 0001 THROUGH 0004 -----\$ \_\_\_\_\_

TOTAL BASE BID PLUS ADDITIVE NO. 0001  
ITEMS 0001 THROUGH 0005 ----- \$ \_\_\_\_\_

TOTAL BASE BID PLUS ADDITIVES NOS. 0001 AND 0002  
ITEMS 0001 THROUGH 0006 ----- \$ \_\_\_\_\_

TOTAL BASE BID PLUS ADDITIVES NOS. 0001 THROUGH 0003  
ITEMS 0001 THROUGH 0007 ----- \$ \_\_\_\_\_

ITEM	DESCRIPTION	QUANTITY	U/M	U/P	AMOUNT
0001	BASE BID - U.S. Army Soldier Support Institute Facility with Metal Roof, Complete to the 5-Foot Building Line	1	LS	XXXXX	_____.
0002	BASE BID - Site Preparation and Development, Utilities and Parking Lots for the Soldier Support Institute Facility, Complete	1	LS	XXXXX	_____.
0003	BASE BID - Marion Avenue Widening Including Landscaping and Utilities, Complete	1	LS	XXXXX	_____.
0004	BASE BID - Install Government-Furnished Interior Furnishings, Complete	1	LS	XXXXX	_____.

ITEM	DESCRIPTION	QUANTITY	U/M	U/P	AMOUNT
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0005	ADDITIVE NO. I - Changing Room, Complete	1	LS	XXXXX	_____.
0006	ADDITIVE NO. II - Auditorium Roof Deck, Complete	1	LS	XXXXX	_____.
0007	ADDITIVE NO. III - Sodding, Complete	1	LS	XXXXX	_____.

END OF SECTION 00010

## SCOPE OF WORK

The site of work is located in Houston County, Georgia, at Robins Air Force Base and includes the following principal features and approximate quantities:

(a) Construction of a gymnasium containing approximately 10,000 square feet of floor space, consisting of concrete floor slabs, concrete frame, concrete masonry unit walls, open web steel joists, steel deck and built-up roofing. Interior work includes plumbing, heating, air conditioning, and electrical work. Gymnasium to be furnished with miscellaneous gymnasium equipment.

(b) Gas line - 500 feet of 1-1/2 inch pipe.

(c) Water line - 400 feet of 3-inch pipe; 3-inch gate valve; connection to existing 10-inch line.

(d) Sanitary sewer - 285 feet of 6-inch pipe; 1 manhole.

(e) Sprigging - 1.6 acres.

(f) Landscaping for the gymnasium building.

(g) Exterior electrical work.

(h) Clearing and grubbing, including removal of portable wooden bleachers (16' x 74') - 2.9 acres.

(i) Unclassified excavation - 1,500 cubic yards.

(j) Unclassified borrow - 500 cubic yards.

(k) 1-1/2 inch flexible pavement, including tack and prime coats and 7-1/2 inch stabilized aggregate base course - 700 square feet.

(l) 4-inch concrete sidewalk - 500 square yards.

(m) 6-inch asphalt concrete curb - 50 linear feet.

(n) Precast concrete bumper curbs - 13 each.

(o) 4-inch printed stripes - 150 linear feet.

(p) Storm drainage system - 6-inch pipe - 72 linear feet  
8-inch pipe - 202 linear feet  
10-inch pipe - 58 linear feet

The cost of this work is estimated to be between \$1,000,000 and \$5,000,000. Construction duration for this project is estimated to be 360 days.

AMENDMENT PREPARATION - ELECTRONIC BID SET

Solicitation Number DAC\_21-99-B-0\_\_\_, Bid Opening [1100] [1400] [1500] hours Local Time at Place of Bid Opening \_\_/\_\_/99 for \_\_\_\_\_

\_\_\_\_\_, is modified in the following respects:

A. SPECIFICATIONS: The revised and added sections listed below (Revised and Added by Amendment No. 0000) are hereby added to and made a part of the solicitation. In the technical provisions, revised or added information is underlined and deleted information is struck out. Deleted sections are also listed.

Revised Sections                      Added Sections                      Deleted Sections

(THIS PORTION IS FILLED OUT BY A-E)

THE FOLLOWING IS FILLED OUT BY THE A-E TO INDICATE DRAWING CHANGES.

B. DRAWING FILE NO. \_\_\_\_\_:

(1) CIVIL: Sheets \_\_, \_\_, \_\_, \_\_, \_\_, and \_\_ dated \_\_\_\_\_ are hereby added to and made a part of the contract drawings.

(a) Sheets \_\_, \_\_, \_\_, \_\_, \_\_, and \_\_ with Revision No. 1 dated \_\_\_\_\_ are hereby added to and made a part of the contract drawings.

(b) Sheets \_\_, \_\_, \_\_, \_\_, \_\_, and \_\_ are hereby reissued for clarity.

(c) Delete Sheets \_\_\_\_\_ in their entireties.

(2) BUILDING/DISCIPLINE:

(a) Sheets \_\_, \_\_, \_\_, \_\_, \_\_, and \_\_ dated \_\_\_\_\_ are hereby added to and made a part of the contract drawings.

(b) Sheets \_\_, \_\_, \_\_, \_\_, \_\_, and \_\_ with Revision No. 1 dated \_\_\_\_\_ are hereby added to and made a part of the contract drawings.

(c) Sheets \_\_, \_\_, \_\_, \_\_, \_\_, and \_\_ are hereby reissued for clarity.

(d) Delete Sheets \_\_\_\_\_ in their entireties.

[B. DRAWINGS: There are no drawing revisions issued with this amendment.]

**NOTE:**

**CONTACT YOUR PROJECT MANAGER FOR AMENDMENT NUMBERS AND DATE FOR REVISION BLOCK.**

**THE EXAMPLES SHOWN ABOVE SHOULD COVER ANY SITUATION THE AMENDMENT WILL REQUIRE. IF ADDITIONAL INFORMATION OR CLARIFICATION IS REQUIRED PLEASE CONTACT YOUR PROJECT MANAGER.**

EXAMPLE MODIFICATION SCOPE OF WORK

Modification of Specifications  
Solicitation Number DACA21-95-B-0110  
Contract No. DACA21-96-C-0029  
Modification No. MCB96-29-D

U.S. ARMY ENGINEER DISTRICT, SAVANNAH  
CORPS OF ENGINEERS  
100 WEST OGLETHORPE AVENUE  
SAVANNAH, GEORGIA 31402-0889  
10/23/95

The Specifications and Drawings for Construction of EM Barracks Complex - Fort Gordon, Georgia, under Contract Number DACA21-95-C-0029, are modified as follows:

A. SPECIFICATIONS:

The new and revised pages listed below (Revised and Added by Modification 96-29-D are hereby added to and made a part of the Contract Specifications. An asterisk in the right margin of revised pages indicates each line in which a revision was made.

Section	Revised Pages	Added Pages
08700		1a
09510	2	

B. DRAWING NO. 71-08-09:

Sheet 53 with Revision No. 1 and new Sheets 53A, 53B, 53C and 53D (Added by MCB 96-29-D) all dated 23 October 1995 are hereby added to and made a part of the contract drawings.

Encls  
Specs (2 pages)  
Dwgs as listed in Para B above  
(Revised and Added by MCB 96-29-D)