

NOT FOR BIDDING



**TENNESSEE DEPARTMENT OF TRANSPORTATION**

**Request for Proposals  
Construction Manager/General Contractor  
(CM/GC) Services**

**Rehabilitation of the I-40 Inner Loop  
Bridges in Downtown Nashville**

**At Charlotte Ave, Johnson Street, Herman Street,  
and Clinton Ave. Davidson County- TENNESSEE**

**Project Identification Number (PIN): 117847.00  
Project State Number: 19005-4160-04.**

July 18, 2014

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## SECTION 1 – INTRODUCTION AND GENERAL INFORMATION

### 1.1. CM/GC INTRODUCTION

Construction Manager/General Contractor (CM/GC) is a contracting method that involves a Contractor in the design and construction phases of the project. The intent is to form a partnership with TDOT, the Design Consultant, and the Contractor.

The goals of this partnership are to mitigate risk, improve the construction schedule, streamline the design process, and develop a project that adheres to the budget. An important role of the Contractor is to evaluate the constructability of the design plans to reduce risk in all phases with innovative approaches to meet budget goals. We anticipate the involvement of the Contractor will help reduce errors in design and improve the overall constructability of the project.

The Integrated Project Team (TDOT, Design Consultant, and the Contractor) collaborates to deliver the project in less time, at a lower total cost, and meet the project goals. The Project Team offers:

- Provision of information on constructability, phasing, and other design input.

- The skills and knowledge to estimate the quantities of materials, labor, and equipment needed for construction.

- The skills and knowledge to determine the tasks (work breakdown structure) needed to complete the project and estimate the costs, duration, and sequence of these tasks.

- An understanding of the availability, cost, and capacities of materials, labor, and equipment.

- The skills and knowledge to identify potential risks (including financial risks) and methods to mitigate them during the design process.

- A Contractor who shall provide TDOT with a preliminary estimating model for estimating project costs. The accepted estimating model will serve as a basis for all Opinion of Probable Construction Cost (OPCC) estimates in the program and the development of the proposed Guaranteed Maximum Price (GMP) at agreed upon design milestones.

During the design process the Contractor works with the Design Consultant and the TDOT Project Management Team to:

- Implement the risk management strategy, and develop and monitor Risk Register.

- Continually update, at regular intervals, the project estimate and construction schedule.

- Lead the development of a cost model for the Engineer's Estimator and Independent Cost Estimator (ICE) so that assumptions, contingency, and approach to the estimate are similar.

- Participate in up to three formal reviews of the design at designated design milestones for each phase of the construction package.

- Participate in risk assessment and mitigation workshops at agreed upon milestones.

- Provide up to three progressively refined Opinion of Probable Construction Cost estimates (OPCC) at designated design milestones.

Continually provide informal input on constructability, value engineering, and cost as requested.

Provide open-book examination of cost model by TDOT, the program manager, and the Design Consultant.

Prepare Guaranteed Maximum Price (GMP) Proposals to TDOT with appropriate backup documentation for all construction, early work, and procurement Plans, Specifications, and Estimates (PS&E) packages.

Develop, propose, and track innovations for project construction.

If the Contractor is awarded the fixed-price construction contract, their role will be to construct the project within the GMP and propose solutions that will help achieve the goal of staying within the budget. If the project cannot be delivered within the allocated budget, TDOT retains the option to cancel the project, reduce the scope, or deliver the project by other means.

Early procurement or construction work may be considered for acquisition of long lead items or to complete early construction tasks that can be completed and turned over to another Contractor, should negotiations for final construction cease. Early utility or construction work may be considered with the understanding that early phases are not a guarantee of selection for final construction. Early phases must be independent and severable from the final construction package, with a well-defined end point. Construction will not begin until a GMP has been accepted for a substantially complete PS&E package.

## **1.2. SCOPE OF THIS RFP FOR CM/GC SERVICES SELECTION**

This RFP is a one-phase procurement that includes a Statement of Interest/Proposal. At the interview, Proposers will be required to submit a CM/GC Management Price Proposal.

TDOT is soliciting written Statements of Interest and Proposals from pre-qualified general contractors to provide CM/GC Services for the replacement of the existing structurally deficient bridges on I40 in Davidson County, Tennessee. The work includes but is not limited to design and construction of the bridge deck replacement for the existing bridge on I40 over Charlotte Avenue, bridge deck or superstructure replacement on I40 over Jo Johnson St, and bridge superstructure replacements on I40 over Herman St & N&W RR and Clinton St. & CSX RR. The project will also include milling all of the asphalt, pave a 2" layer of HiMA SMA on top of the concrete tacked with UltraFuse, then overlay with a 1.25" layer of HiMA OGFC., using Accelerated Bridge Construction (ABC), earthwork, pavement, erosion control, water quality, signing, striping, seeding, and coordination with private utilities relocations. In addition, the Contractor will be involved in the design development by providing input to TDOT and the Design Consultant (Gresham Smith & Partners) concerning various design elements and constructability throughout the CM/GC process.

Contractors interested in submitting Proposal packages to TDOT are requested to submit one package that is inclusive of pre-construction CM/GC services, with the option of construction if TDOT accepts construction GMP proposals. Selection will be on a best value basis in accordance with the evaluation criteria set forth in Section 3 Proposal Content and Evaluation Criteria.

Contractors or Joint Ventures from this point forward in the RFP will be referred to as the "Proposer or Proposers."

### 1.3. **PROJECT DESCRIPTION**

#### A. Project Background

I40 Bridges over Herman St and ICG R/R, LM 16.62; Clinton St and CSX R/R, LM 16.75; Jo Johnston Ave, LM 16.88; and Charlotte Ave, LM 17.09, Davidson Co.

The city of Nashville is where three of our nation's interstates (I65, I40, and I24) intersect and then proceed in their original direction. Around Nashville, the interstate loop collects and distributes traffic as it has since its construction in the early 1960's. Within this traffic corridor are four bridges in a row, one is a steel k-frame girder structure, another is a precast pre-stressed concrete girder structure, and the last two are steel I-girder bridges that are suffering from advanced stages of deck deterioration. Currently this section of the interstate loop carries over 131,000 ADT according to our 2012 records. There are several hospitals that utilize this corridor for quick access as well as a dense population of commercial/business properties. The bridge decks have deteriorated and have become an increasingly constant maintenance problem. Recently, the I40 over Charlotte Avenue Bridge required a portion of the deck to have emergency full depth deck repair during a weekend, directional, interstate closure. Repairing the bridges with conventional methods would cost millions of dollars in road user's cost due to roadway or lane closures and would be a financial hardship on businesses in the area that depend on the interstate for commerce. The goal of the accelerated bridge construction project is to reduce the timeframe of construction to minimize traffic impacts. The Charlotte Avenue Bridge will require precast prestressed full depth panels. The Jo Johnson Bridge will require precast prestressed full depth panels or superstructure replacement. The remaining bridges will consider replacing the superstructures with several prefabricated and precast units consisting of two or three steel girders and a precast concrete slab on top of girders. This method will enable quick demolition and reconstruction of each bridge. This method of construction will reduce the construction time from several months of complete closures to 11 weekend closures or less.

The major stakeholders in the area, which will require coordination include, but are not limited to, the Metropolitan Government of Nashville City and Davidson County (Metro), the Federal Highway Administration (FHWA), and local businesses.

This project is intended to achieve the following goals:

#### **1. Provide a well-publicized, highly successful Accelerated Bridge Construction project.**

Note: TDOT will be primarily responsible for public involvement and public relations. The Contractor will provide support for the public involvement and public relations effort.

#### **2. Replace and rehabilitate the existing poor bridges structure, and improve traffic operations and safety at the I-40 within the project budget.**

Note: TDOT and its Design Consultant will be primarily responsible for the design of the project to meet the goal of improving traffic operations and safety of the completed project.

- 3. Accelerate delivery of the construction schedule and obtain final project acceptance no later than October 15, 2015.**
- 4. Minimize inconvenience to the traveling public, and maximize safety of workers and the traveling public.**
- 5. Facilitate a collaborative partnership with all of the members of the project team and the stakeholders.**
  
- 6. Provide a high quality design and construction.**

**B. Project Information and Definition**

Project Location: Downtown Nashville Interstate Inner Loop (I40)

Project Limits: The limits are from the overhead bridge Jefferson St / I40 at L.M.15.33 to I65 split south at L.M.18.26 (2.93 Miles).

Specialty Work: Traffic, Survey, Roadway, Bridges, Utilities, ITS and Materials.

Current Level of Design: Conceptual design discussions are underway. Field 3D scan survey has been completed and started compiling data points. Preliminary design of structures, asphalt pavement, and maintenance of traffic is being held at a low level.

Project Schedule: The estimated schedule for this project includes a pre-construction phase that is anticipated to be completed by February, 2015 and a construction phase that is estimated to be completed by fall 2015.

The project includes but is not limited to design and construction of the bridge deck replacement for the existing bridge on I40 over Charlotte Avenue, bridge deck or superstructure replacement for the existing bridge on I40 over Jo Johnson St. and bridge superstructure replacements for the existing bridges on I-40 over Herman St & N&W RR, and Clinton St. & CSX RR. The project will also include milling all of the asphalt, pave a 2" layer of HiMA SMA on top of the concrete tacked with UltraFuse, then overlay with a 1.25" layer of HiMA OGFC.

The project will utilize ABC techniques.

Owner Furnished Materials: TDOT will provide all necessary survey and site investigations.

Existing Operations Critical to Project: Minimizing the maintenance of traffic (MOT) impact to the public during construction using weekend closures. All traffic lanes must be operational during the work week.

Existing Restrictions and Constraints: Interstate I40 complete closure on weekends and operational during work week.

Traffic Lane Closure Information: Additional lane closures and other MOT requirements will be developed through the CM/GC design process.

Existing Utilities: Existing utilities include but are not limited to overhead electric lines and underground ITS and electric (for roadway lighting) conduits.



1.4. **PROJECT FUNDING**

The sources of funding for this CM/GC contract are FHWA and TDOT.

1.5. **PROJECT ADMINISTRATION**

The Contract Administrator/ Project Manager and Primary Point of Contact for this project :

Lia Obaid  
Suite 700 James K. Polk Building  
505 Deaderick Street  
Nashville, TN 37243  
Phone: (615) 532-75

**1.6. PROJECT COORDINATION****A. Routine Working Contact**

The routine working contact will be between the TDOT Project Manager (TDOT/PM), the Design Consultant Project Manager (C/PM), and the Contractor Project Manager (CMGC/PM).

**B. Project Manager Requirements:**

Each Project Manager will provide the others with the following:

- A written synopsis or copy of their respective contacts (both by telephone and in person).
- Copies of pertinent written communications include, but are not limited to, email, memorandum, letters, meeting minutes, and phone logs.

**C. Coordination**

The Contractor shall partner with the Design Consultant and the TDOT Management Team as part of the design team. The following groups will be part of that partnership and will be required to coordinate with each other:

- TDOT Project Management Team
- Project Design Manager/ Design Consultant: TDOT Design Manger/ Gresham Smith & Partners
- Selected Project GM/GC Contractor and any Sub-contractors
- TDOT Specialty Groups: Staff Bridge, Utilities, Traffic, Hydraulics, Environmental
- Civil Rights Office
- Stakeholders or Stakeholder Groups:
  - A. Metropolitan Government of Nashville City and Davidson County (Metro)
  - B. Regional Transportation office
  - C. Federal Highway Administration (FHWA)
  - D. Utilities
  - E. Tennessee Department of Public Health and Environment
  - F. Other: Davidson Public Schools, and Davidson Parks and Recreation
  - G. Local Businesses

**1.7. PROJECT SCOPE OF WORK**

The Contractor's Scope of Work and the Pre-Construction Roles and Responsibilities Matrix is described in detail in Section 4 of this RFP.

**1.8. FIXED RANGE LIMIT OF CONSTRUCTION COST**

The Fixed Limit of Construction Cost is the total project budget allocated for the construction phase of the project. This includes the CM/GC Management Fee, the actual cost of construction, mobilization, force accounts, and all costs that are associated with the construction of all elements of the work designed or specified by the Design Consultant. The CM/GC Management Fee is defined in Section 2.

The Range Limit of Construction Cost for this project is preliminarily estimated between \$45-55 million.

**1.9. PROJECT CONSTRUCTION SCHEDULE**

The project includes the following goals:

- 1. Advance the knowledge, experience and cost efficiency of TDOT and the local construction industry in Accelerated Bridge Construction and CM/GC project delivery.**
- 2. Accelerate delivery of the construction schedule and obtain final project acceptance no later than October 15, 2015.**
- 3. Minimize inconvenience to the traveling public, and maximize safety of workers and the traveling public.**

In consideration of the project goals, there is a strong desire to use advanced ABC technology to construct the project in a manner that minimizes the impact of the construction schedule to the traveling public on I-40, and specifically to install the bridge superstructure within a 60-hour (or less) closure time on I-40. On that basis, the ABC superstructure "roll-in" or "slide-in" (or other advanced ABC techniques that minimize the exposure of construction to I-40 traffic) shall be considered for the project. I-40's complete road closures shall be restricted to weekends only, excluding holiday weekends and game day for Titans home football game. The contractor shall be allowed eleven (11) weekends or less for all bridges and roadway work. A weekend is defined as between Friday at 9:00 PM through Monday at 5:00 AM.

Accelerated construction techniques that minimize construction schedule impacts, and the exposure of construction to the traveling public on I-40 shall be considered for the project.

**1.10. REFERENCE ITEMS REQUIRED BY THE CONTRACTOR**

The standards, data, and reports in Appendix F are Contract Documents. These standards apply unless otherwise defined in the Plans, Specifications, and Estimate Packages. The Contractor shall obtain and utilize the most recent adopted references, including TDOT standards and specifications, manuals and software, or as directed by the TDOT/PM.

**1.11. PROJECT DEFINITIONS**

Project definitions for language and references in this RFP are described in Appendix G.

**1.12. PRELIMINARY DOCUMENTS AND DRAWINGS**

Reference documents and drawings are available on the project website at [http://www.tdot.state.tn.us/construction/CMGC\\_Services.htm](http://www.tdot.state.tn.us/construction/CMGC_Services.htm)

**1.13. SPECIFICATIONS**

The 2014 Standard Specifications for Road and Bridge Construction controls construction of this project. The Selected Design Consultants will develop the project special and standard provisions that will take precedence over the Standard Specifications and plans.

**1.14. OWNERSHIP OF THE DOCUMENTS**

All tracings, bids, plans, manuscripts, specifications, data, maps, etc., prepared by or obtained by the Contractor as a result of working on this contract shall be delivered to and become the property of TDOT.

**1.15. REQUIRED PERCENTAGE OF WORK**

The Proposer must perform work valued at not less than 30% of the total work, excluding specialized services, with its own staff. Specialized services are those services or items that are not usually furnished by a Contractor or Joint Venture performing the particular type of service contained in this RFP.

**1.16. PROJECT COMPUTER SOFTWARE REQUIREMENTS**

The Contractor shall utilize the most recent TDOT adopted software. The primary software used by TDOT is as follows:

Estimating: Microsoft Excel 2007 or other software that is compatible with providing pricing on the TDOT Schedule of Bid Items standard format using the most current TDOT Item Code Book.

Scheduling: Primavera Project Manager (v 5.0).

Specifications: Microsoft Word 2007

Survey and DTM: Microstation V8i

**1.17. PROJECT DESIGN DATA AND STANDARDS****A. General:**

Appendix F and G are lists of technical definitions and references applicable to TDOT work. This is not a full list and other national standards and references could apply. TDOT projects shall be in general conformance with TDOT and FHWA design criteria.

Conflicts in criteria shall be resolved by the TDOT/PM.

**B. Construction Materials/Methods:**

The materials and methods specified for construction will be selected to minimize the initial construction and long-term maintenance cost to the State of Tennessee. Non-typical construction materials and methods must be approved in writing by TDOT.

**1.18. RFP DATES**

Proposers are required to meet the dates set for the SOI/Proposal submission, the oral interviews, and negotiation meeting. Contractors are also required to meet the information submittal dates outlined in the summary sheet. Failure to meet these dates will result in the Proposal being considered non-responsive.

**1.19. REQUIRED AVAILABILITY OF KEY PERSONNEL**

Listed personnel in the Project Management Team/Capability of the Proposer section of the Proposal constitutes an agreement by the Proposer to make the personnel available to complete work on the contract at whatever level the project requires. Modifications to the Proposer's Team or Key Individuals and other personnel listed in the Proposer Statement of Qualifications are discouraged. TDOT will not approve requests for modification without justification. Examples of justification include death of a team member, changes in employment status, bankruptcy, inability to perform, organizational conflict of interest, or other such significant cause. In order to secure TDOT's approval prior to the award of the contract, a written request shall be forwarded to the person and address as shown in Section 1.5 of this RFP. The request shall include: a) the nature of the desired change, b) the reason for the desired change, and c) a statement of how the desired change will meet the required qualifications for the position/responsibility. No such modification will be made without prior TDOT approval.

**1.20. APPLICABLE FEDERAL AND STATE REGULATIONS**

The Proposer shall conform to all applicable State and Federal regulations and recognized industry, safety, environmental, and design standards.

**1.21. NONDISCRIMINATION IN CONTRACTING**

The Proposer shall adhere to the nondiscrimination provisions of all Federal and Tennessee civil rights statutes. These include, but are not limited to, the following:

1. Title VI of the Civil Rights Act of 1964, which prohibits discrimination on the basis of race, color, and national origin. The FHWA has expanded the nondiscrimination requirements to include age, disability, and gender. Title VI requires that TDOT and its contractors provide methods to communicate effectively with persons who have limited English proficiency.
2. Title II of the Americans with Disabilities Act and its implementing regulations, including related standards and procedures that have been adopted by TDOT.

#### **1.22. DISADVANTAGED BUSINESS ENTERPRISE (DBE) PROGRAM REQUIREMENTS**

Due to the nature of the Contractor's role in the pre-construction design phase, TDOT has determined that there are insufficient subcontracting opportunities to justify a DBE goal on the Contractor's pre-construction design phase contract. DBE participation in the design phase of this project shall be achieved through the commitments of the Design Consultant selected to participate on the Integrated Project Team.

A DBE goal will be set for all early construction and procurement contracts as well as for the final construction contract. A commitment to meet the contract goal or a good faith effort to do so shall be a condition of award of all such contracts.

At this phase, TDOT will evaluate the Proposer's approach and commitment to generating DBE participation. As detailed in Section 3.2 Proposal Content and Evaluation of this RFP, the Proposer must demonstrate within the subcontracting plan that it has considered the eventual mandatory inclusion of DBEs on the construction phase of the contract and has determined avenues for generating quality DBE participation.

#### **1.23. ORGANIZATIONAL CONFLICTS AND INELIGIBLE FIRMS**

The Proposer will include a full disclosure of all potential organizational conflicts of interest in the Proposal. By submitting its Proposal, each Proposer agrees that, if an organizational conflict of interest is thereafter discovered, the Proposer will make an immediate and full written disclosure to TDOT that includes a description of the action that the Proposer has taken or proposes to take to avoid or mitigate such conflicts. If an organizational conflict of interest is determined to exist, TDOT may, at its discretion, cancel the contract. If the Proposer was aware of an organizational conflict of interest prior to the award of the contract and did not disclose the conflict to TDOT, TDOT may terminate the contract for default. No firm that is ineligible for State contracts may be part of any Proposer. Each Proposer is responsible for determining eligibility of its team members.

**1.24. PREQUALIFICATION**

- (a) Each Proposer is required to file a document entitled "Prequalification Questionnaire." This submittal is required by the State of Tennessee, Department of Transportation under the provisions of Tennessee Code Annotated Section 54-5-117 and Tennessee Department of Transportation Rule 1680-5-3, Prequalification.
- (b) Each Proposer must be listed as prequalified by the Construction Division at <http://www.tdot.state.tn.us/construction/prequal/prequal.pdf>

**1.25. CONSTRUCTION CONTRACT BONDS**

Provide a letter from a surety company indicating that the Proposer is capable of obtaining Payment and Performance Bonds covering Project No. 19005-4160-04 I40 Bridges Rehabilitation, for at least \$60.0 million. The surety submitting the letter must be a surety company or companies licensed by the State of Tennessee and listed in the current United States Department of the Treasury Circular 570 as acceptable sureties for the bond amount on Federal Bonds. Letters indicating "unlimited" bonding/security capability are not acceptable.

Performance and Payment Bonds will be required at the time the Guaranteed Maximum Price is accepted. The final value of the Bonds will equal the negotiated amount of the negotiated GMP.

**1.26. INSURANCE REQUIREMENTS**

The selected Proposer is required to provide TDOT with Certificates of Insurance meeting the current requirements within 14 days after notification of the selection. The Contactor or Joint Venture is not required to provide Professional Liability insurance certificates.

**1.27. SELECTION OF A CM/GC**

The selection of a CM/GC Contractor is being conducted early in this project to provide TDOT, the project stakeholders, and the design team with the expertise and experience that will provide needed assistance.

**1.28. REQUIRED PROPOSAL CONTENTS**

Instructions on preparing a Statement of Interest (SOI)/Proposal for this project are found in Section 2 of this RFP. The SOI/Proposal from the Proposer should contain the information identified in Section 3 of this RFP.

**1.29. PROPOSAL EVALUATION PROCEDURES**

The Proposal shall be evaluated by a TDOT Selection Panel. See also Appendix D.

**1.30. COST OF PROPOSAL PREPARATION**

No reimbursement will be made by TDOT for any costs related to the preparation of the SOI/Proposal, required documentation, interviews, presentations, discussions, and/or any related activities. These costs are the sole responsibility of the Proposer or Joint Venture.

**1.31. DISPOSITION OF PROPOSALS**

Proposals become the property of TDOT, are treated as privileged documents, and are disposed of according to TDOT policies, including the right to reject all Proposals.

**1.32. AWARD OF CONTRACT**

TDOT intends to evaluate, select, and award one CM/GC contract to the top ranked Proposer based on a Best Value Selection with Chief Engineer Approval.

The selected CM/GC Contractor will be awarded a contract for Pre-Construction CM/GC Services. Once design of construction package(s) is sufficient to prepare, negotiate, and accept a Guaranteed Maximum Price (GMP) proposal, a TDOT Construction Contract will be drafted, signed, and executed.

All negotiations shall be open book. TDOT shall have access to all GMP proposal documents, quotations, takeoffs, and other construction cost estimates during negotiations. Issuance of the Construction Contract will be subject to the Proposer posting 100% performance and payment bonds and being compliant with TDOT procurement policies. The CM/GC Contractor will competitively procure and award subcontractors in accordance with their proposed subcontracting plan, as described in Section 2 and Section 3 of this RFP.

**1.33. COMPENSATION FOR CMGC PRECONSTRUCTION SERVICES**

The selected Proposer will be paid a total lump sum amount of \$ 275,000 for CMGC services during the Preconstruction Phase. Monthly payments will be paid as work progresses.



**1.34. EXPLANATION OF GUARANTEED MAXIMUM PRICE (GMP)**

The Guaranteed Maximum Price (GMP) amount that will be incorporated into the standard Construction Project Contract for Construction Services will be negotiated between TDOT and the Contractor. A GMP is the sum of the Total Cost of Construction with the applied CM/GC Management Fee Percentage for a sufficient Plans, Specifications, and Estimates construction package. The Total Cost of Construction will be negotiated with pay items and assumptions. Payment for the construction of the project will be paid through a Schedule of Bid items.

TDOT anticipates initiating negotiations for a GMP based on 80% complete contract documents and intends to establish a GMP for the complete project no later than February 2015. TDOT reserves the right not to award any part(s) or all of the Construction Services, and bid/award some or all of the construction work separately. The selected Proposer shall deliver to TDOT a proposed GMP and GMP Supporting Documents at any appropriate milestones identified at the Project Scoping Workshop.

Except for change orders approved by TDOT, the GMP will not be increased. The Contractor assumes all risk with performance of the work, including management of its subcontractors, suppliers, and any associated cost impacts over and above the GMP.

A GMP proposal can be offered and negotiated three times. After the third and final attempt at a GMP negotiation, TDOT reserves the right to prepare the PS&E package for advertisement.

TDOT is considering establishing a contingency risk-sharing pool with the Contractor that will be discussed during the pre-construction phase that, if adopted, would be incorporated into the negotiated GMP. The purpose of the contingency risk-sharing pool is to develop a budget for items foreseen at the GMP, but not detailed enough for itemized pricing. Any and all items fitting this category will be identified separately in the GMP and will be monitored for progress and cost. The actual process will be negotiated as part of the Construction contract.

In developing this shared risk contingency pool, TDOT agrees to share equally (50%) any cost savings in construction (not attributed to any reduction in the scope of work or reduction in operating performance for the corridor) that may occur after the GMP has been negotiated with the Contractor

## SECTION 2 – CM/GC REQUIREMENTS AND SOI/PROPOSAL INSTRUCTIONS

### 2.1. MINIMUM SOI/PROPOSAL REQUIREMENTS

As indicated in the advertisements, notice is hereby given to all interested parties that all Proposers will be required to meet minimum requirements to be considered for these projects. To be considered as qualified, interested Proposers shall have, as a minimum:

- A. Attended the mandatory Pre-Proposal meeting on August 4, 2014. Sign-in and attendance at the Pre-Proposal meeting is **required** in order to submit a proposal.
- B. Demonstrated a bonding capability up to \$60.0 million for an individual project along with current and anticipated workloads. Provide a letter from a surety or insurance company stating that the Proposer is capable of obtaining a Performance and Payment Bond covering the Project. Letters indicating “unlimited” bonding capability are not acceptable. The surety or insurance company providing such letter must be licensed as surety and qualified to do business in the State of Tennessee.
- C. Be pre-qualified with the TDOT Contracts and satisfy all requirements of pre-qualification per the “TDOT rules for prequalification, debarment, bidding and work on Tennessee Department OF Transportation Road, Highway and Bridge Public Projects” within 14 days of the Proposal submittal deadline as shown in the Key Events Schedule below.

### 2.2. PROPOSAL GENERAL INFORMATION

All respondents accept the conditions of this RFP, including, but not limited to, the following:

- A. All submittals shall become the property of TDOT and will not be returned.
- B. Multiple proposals from a single Proposer will not be considered.
- C. Any proposal received by TDOT after the time specified in Section 2.3 shall be considered late and shall be returned unopened to the Proposer. No late proposals will be accepted for this project.
- D. Any restriction as to the use of submitted materials must be clearly indicated as proprietary. The requested limitation or prohibition of use or release shall be identified in writing on a cover sheet. Blanket claims of proprietary submittals will not be honored. CM/GC Fee Proposals will be considered proprietary.
- E. TDOT reserves the right to reject any or all proposals on the basis of being unresponsive to this RFP or for failure to disclose requested information.
- F. TDOT shall not be liable for any costs incurred by respondents in the preparation of submittals and proposals, nor in costs related to any element of the selection and contract negotiation process.
- G. The Proposer has reviewed Appendix A and by responding has agreed that the terms and conditions of the sample Construction Management/General Contractor Agreement are expressly workable without reservation.

- H. Although the selected Contractor will be contracted for both the design review and construction services of this project through this selection process, the selected Contractor is not guaranteed to receive a Notice to Proceed to perform any construction work if services are terminated at the completion of the design phase.
- H. The Proposer will include a full disclosure of all potential organizational conflicts of interest in the Proposal, as per Section 1.23.

If TDOT chooses to advertise this project, the selected Contractor **will not** be permitted to submit a bid.

### 2.3. **KEY EVENTS SCHEDULE**

<b>Public Notice Phase</b>	<b>Date</b>
First Advertisement of RFP	July 18, 2014
Mandatory Pre-Proposal Meeting	August 4, 2014

<b>Selection Phase</b>	<b>Date</b>
Submittal of Statement of Interest (SOI)/Proposal	August 25, 2014
Selection Panel Meetings (Interviews)	September 8, 2014
Cost and Bid Proposals Opening	September 9, 2014
Contractor Notification of Selection	September 15, 2014
Contract Approval/Execution	October 10, 2014

### 2.4. **MANDATORY PRE-PROPOSAL MEETING**

The mandatory Pre-Proposal meeting will be held on August 4, 2014, at TDOT Region 3 Auditorium Conference Room, 6601 Centennial Boulevard Nashville, Tennessee 37243-0360, at 1:00 pm. This meeting will introduce all contractors to the CM/GC contract delivery method, give an overall introduction to the project as scoped, and enable TDOT to answer questions about the project and process. The TDOT Project Management team for the project will be present. This meeting will be approximately 2 hours long.

**2.5. QUESTIONS AND CHANGES TO THE RFP**

- A. TDOT reserves the right to make changes to the RFP. Changes to the RFP generally consist of Clarifications, Scope Changes, or Time and/or Date Changes. All changes to the RFP prior to the receipt of proposals shall be made by an addendum to the RFP, which shall be made available to all Proposers on the TDOT webpage. Following receipt of proposals, any changes to the RFP will be conveyed in writing to those Proposers determined to have met the minimum qualifications.
- B. Proposers may submit questions, request clarification, or request a change to the RFP by submitting by either e-mail or a written request on Form provided in the proposal to the address set forth above. The request shall specify the provision and section of the RFP in question, and, if a change is requested, contain an explanation for the requested change. TDOT will not respond to questions or change requests received less than ten (10) business days before the date set for receipt of the proposals. If the requested change is to "Section 4 – Scope of Work and CM/GC Services," the request must be RECEIVED by TDOT no later than August 8, 2014, as per Section 2.3.
- C. TDOT will evaluate any questions or requests submitted, but reserve the right to determine whether to respond or accept the requested change.
- D. Proposers shall not rely on oral or written instructions regarding this RFP, unless issued in writing as an addendum by TDOT.
- E. Proposers must acknowledge all issued addenda in their submittal and proposal.

**2.6. STATEMENTS OF INTEREST (SOI)/PROPOSAL SUBMITTAL – STEP 1**

Respondent must comply with the following items, A through H. TDOT retains the right to waive any minor irregularity or requirement should it be judged to be in the best interest of TDOT.

**(Note that the primary focus of the evaluation will be the firm(s)' capabilities).**

- A. Deliver **eight (8)** hard copies along with **one (1)** electronic copy PDF file on a CD or flash drive of the SOI/Proposal to the Tennessee Department of Transportation Contract Office, Lia Obaid, Suite 700 James K. Polk Building, 505 Deaderick Street Nashville, TN 37243  
Phone: (615) 532-7522
- B. **Statement of Interest (SOI)/Proposal Format:**
1. Submittals shall be formatted and tabbed in the exact form and alphanumeric sequence of the Evaluation Form, Appendix D.
  2. All narratives shall use minimum font size of 11 point Times Roman. Limited use of smaller font sizes for charts, diagrams, graphs, and tables are allowed.
  3. Cover or Introductory Letter (2-page limit - 8-1/2 x 11 paper)
  4. Proposal Section (20-page limit, 8-1/2 x 11 paper)
  5. An Optional Section (5-page limit – 8-1/2 x 11 paper, and up to 3 of the 5 pages can be on 11 x 17 paper)
  6. The Commendation Section for awards or letters of recommendations from past clients (5 page limit – 8-1/2 x 11 paper) (optional)
  7. Appendix Section (no page limit but see H, I and J.)
- C. In TDOT's continued environmental efforts in "Going Green", Proposers are encouraged to submit their SOI/Proposal using a 2-sided format, rather than using only one side.
- D. Submittals shall be evaluated in accordance with criteria as indicated in Section 3.2 Statement of Interest (SOI)/Proposal Evaluation Criteria and ranked on the corresponding evaluation form in Appendix D.
- E. Responses to all items shall be complete.
- F. All references shall be current and relevant.
- G. Complete and execute the appropriate Acknowledgment and Attestation Form, as provided in Appendix C, and submit with the SOI/Proposal Package.
- H. The optional section should include supplemental materials for risk assessments, cost models examples, processes, and additional photos, exhibits, or schedules.
- I. An appendix section may be included in the proposal. This section will include resumes, references, Surety Letters, and Acknowledgement and Attestation Form. Resumes and references for team members should be limited to the Key Personnel of the Proposer's team.
- J. Tabs, covers, and tables of content pages DO NOT count against the page count.

**2.7. ORAL INTERVIEWS – STEP 2**A. Oral Interview

Mandatory oral interviews shall be conducted for the Proposers. Interview times and location will be arranged by TDOT and all Proposers will be notified in advance. Oral interviews will be evaluated on the enclosed CM/GC Oral Interview Evaluation Form in Appendix D.

**2.8. SEALED CM/GC FEE - STEP 3**

All Proposers shall submit sealed CM/GC Fee Proposals. All Proposers will submit sealed CM/GC Fee Proposals at their scheduled interviews. Only one copy of Forms C is required on the scheduled submission date. The CM/GC Management Price Proposal will remain sealed until after the qualitative scoring and will then be opened after the Selection Panel Interview Meetings.

The CM/GC Management Price Proposal will then be converted into points in accordance with Section 3.4. CM/GC Management Price Proposals shall be submitted on the Forms C provided in Appendix D without modification.

The CM/GC Management Price Proposal shall include a summary of components used in establishing the CMGC Management Price Percentage.

The CM/GC Management Price Percentage is a percentage which will be applied to all Construction Phase GMP Proposals based on the Fixed Limit of Construction Cost. The CM/GC Management Fee percentage shall include all profit, general and administrative (“G & A”) costs, and home office overhead as defined in Appendix E. Summaries must include the line items detailed in Appendix D

CM/GC Management Price Proposal Format:

A. Submittals shall be formatted and tabbed in the exact form and alphanumeric sequence to include the following:

1. CMGC Management Price Percentage Proposal Form C ( **Appendix D**)
2. CMGC Management Price Percentage Summary Information (2 page limit – summary page)

Paper must be 8 1/2 X 11 paper, and all submittals shall use a minimum font size of 11 Times Roman.

- A. In TDOT's continued environmental efforts in "Going Green," Contractors are encouraged to submit their CMGC Management Price Percentage Proposal using a two-sided format, rather than using only one side.
- B. CMGC Management Price Percentage Proposal Form C from **Appendix D** must be filled out in its entirety.
- C. All content, as required in **Section 3.4 Evaluation Criteria for CMGC Management Price Percentage Proposal**, must be integrated into a narrative and into sheets as instructed. These items can be found on the CMGC Management Price Percentage Proposal Form in **Appendix D**. The evaluation criteria for the CMGC Management Price Percentage Proposal can be found in **Section 3.4 Evaluation Criteria for CMGC Management Price Percentage Proposal** of this RFP.
- D. The CMGC Management Price Percentage cannot be zero.
- E. The CMGC Management Price Percentage Proposal will be scored separately, as described in **Section 3.4 Evaluation Criteria for CMGC Management Price Percentage Proposal** and will be scored according to the scoring forms in **Appendix D**.

### SECTION 3 – SOI/PROPOSAL CONTENT AND EVALUATION CRITERIA

#### 3.1. **METHOD OF SELECTION AND AWARD**

All Proposers shall be invited to Oral Interview meetings with the Selection Panel and further evaluated based on criteria in Section 3.3. At the Oral Interview meeting, All Proposers shall be required to submit a sealed CM/GC Fee Proposal that will be evaluated based on criteria in Section 3.4.

Numerical ranking and selection of the most qualified Proposer (including fee) will then occur on the corresponding evaluation forms in Appendix D. The final CM/GC Pre-Construction Fee and scope of work may be negotiated at TDOT’s discretion. Award and contract will be contingent on availability of key proposed Project Management Team staff.

Each separate section will be ranked with a maximum score of 100 points. Each section will then have the appropriate overall weighted multiplier applied to it for final ranking.

**Weighted Multipliers:**

SOI/Proposal:	50% Total Overall Weight
Interviews:	30% Total Overall Weight
CM/GC Fee:	20% Total Overall Weight

#### 3.2. **EVALUATION CRITERIA FOR PROPOSALS** **(100 Points Total, 50% Overall Weight)**

**Statement of Interest (SOI)/Proposal Evaluation Criteria**

Note that the primary focus of the evaluation will be the firm(s)’ ability, as a member of the project team, to maximize the project goals as are provided in Section 1 of the RFP.

A. Statement of Interest (SOI)/Proposals should contain the following:

1. Introductory Letter and Statement of Interest

Address the cover or Introductory Letter to:

Tennessee Department of Transportation  
Lia Obaid, Construction Division  
Suite 700 James K. Polk Building  
505 Deaderick Street  
Nashville, TN 37243

In **up to two pages**, express your interest in the project, state qualifications for doing the work, and recount any summary information on the project team or your company that may be useful or informative to TDOT. Include the **mailing and e-mail addresses and phone number** of the **primary contact person** for this Contractor selection process in the Introductory Letter. Please acknowledge receipt of any addenda to the RFP. **No evaluation points are assigned to this section.**



Include the following elements of information in the letter as a minimum and highlight these items in bold letters.

- i. Project number and project location for project specific contracts.
- ii. Statement that the Contractor is pre-qualified with TDOT and the Contractor's pre-qualification expiration date.
- iii. Certification that the information and data submitted is true and complete to the best knowledge of the individual signing the letter.
- iv. Name, telephone number, e-mail address, and fax number of the individual to contact regarding their SOI/Proposal submittal.
- v. TDOT **requires** an original signature signed in ink, by an authorized principal, partner, or officer of the firm.

B. Proposal Section

**1. Project Management Team/Capability of the Proposer  
(40 Points Section Maximum)**

- i. Project Management Team
  - a. Provide a description of the composition of your project management team. If your team is a joint venture or association, indicate specific responsibilities of each member and firm of the team.
  - b. Provide job descriptions and responsibilities and authority for each working title. Identify and discuss the qualifications of the following Key Personnel:
    - Project Manager
    - Construction Manager
    - Cost Estimator
    - ABC Specialist
    - Up to two other persons that the Proposer considers as key to the success of the project
  - c. Present a brief discussion regarding how the team's qualifications and experience relate to this project. Include the following:
    - Qualifications and relevant individual experience of prime and subcontractor team members (if applicable).
    - Unique knowledge of team members related to the project.
    - Commitment of time and availability of key staff members.
    - Length of time with the firm for each key team member.
    - Experience on similar projects as a team.

- d. Provide a separate graphic organizational structure chart, complete with working titles for the project management team in both construction and design.
- e. Provide resumes and two references for the Key Personnel and alternates for key positions in an appendix to the Statement of Interest (SOI)/Proposal.
- f. Narrative describing how the proposed Key Personnel of the team will meet the stated project goals, including building a professional and collaborative Project Team.
- g. Narrative describing succession planning for team stability and planning for any member of the Project Team that leaves during design or construction.
- h. Identify all current office locations and the resident expertise intended to be provided under this RFP. Provide a description of the location of the staff for the performance of this contract, their expertise, and generic equipment that will be located in Tennessee that will act in support of the anticipated contract.
- i. Evidence of Risk and Safety Performance: Provide the following information for each entity involved, covering the last 4 years (2009-2013):
  - Experience Modification Rates (EMR);
  - List of any OSHA citations received and for what;
  - List of any incidents that resulted in significant injury, loss of life or major property damage.
- ii. Project Team Capability
  - a. Prior Experience/Performance/References

Provide a list and description of previous experience relevant to this project, with owner and if desired architect/engineer references for each. TDOT may at its discretion contact references and/or conduct independent performance analysis on projects on which the firm has worked.

All references submitted shall be current for projects listed. References will be considered current if the party's name and position/title held at the time for which the recommendation is being sought are provided; telephone numbers must be current as of the date of the submittal of the proposal.

Contractors may provide experience for subcontractors provided there is a commitment to use the subcontractor in a defined role(s) on the project (or to select from a specific list of qualified subcontractors). Project teams providing ABC experience will be scored favorably. ABC specialty subcontractors are not required to be exclusive to prime contractors.

b. Project Background and Success

Select your three most relevant projects/programs and provide, at a minimum, the following:

The project/contract name.

Description of services provided.

Overall construction cost of project, as applicable, including initial contract value and final contract value and reasons for the difference.

Key personnel that were assigned to the project and their roles.

Reference(s) for Owner and if applicable Design Consultants.

**2. Project Approach  
(20 Points Section Maximum)**

i. Project Goals

- a. Your firm's understanding of the project goals listed in the RFP and your approach to maximizing the project goals.

ii. Project Approach

Provide a strategic project approach summary. It should:

- a. Include discussion of your firm's approach in providing successful General Contracting services and how it applies to meeting TDOT's project goals. Consider discussing specific examples of your firm's processes such as estimates, progress reports, schedules, constructability reviews, value engineering studies, forms, cost savings, plan reviews, general conditions budgets, organizational structures, quality control, etc.

Provide a description of the construction work the Prime Contractor has the capability to self-perform, and work that will be done by subcontractors.

- b. Propose a construction approach and sequence that optimizes value to the project, with a realistic view of known constraints. Discuss factors that would affect schedule such as outside constraints, seasonal work, materials, equipment and labor availability and maintenance of traffic considerations, etc. Discuss the value of and types of multiple construction packages to expedite the project.
- c. Provide a discussion of the schedule aspects of ABC including fabrication construction, implementation and maintenance of traffic considerations and approaches to minimize exposure of construction to traffic on I-40.
- d. Provide a discussion of construction approaches to minimize exposure of construction to traffic on I-40.

- e. If desired, describe any additional unique resources and capabilities that your company will bring to the project and how these unique resources and capabilities will be beneficial in achieving the project goals.
- f. Discuss the potential project challenges. Describe any project challenges that are anticipated by your company and how you plan to mitigate the risk of these challenges.

#### Safety

- a. Provide a discussion of your approach to maximize the safety of workers and the traveling public.

### 3. **Project Innovations** **(20 Points Section Maximum)**

In conjunction with your team's Project Approach, your team may have some innovative ideas that may or may not meet the requirements of the RFP that could increase the likelihood for success. The Selection Team will consider how well your innovative ideas help balance the project goals. Please discuss these further as follows:

- i. Describe various types of Accelerated Bridge Construction (ABC) that may be applicable to the project and how they could be employed on the project and their respective advantages and disadvantages.
- ii. Describe any other specific technical or production innovations related to design or construction that may further improve reaching project goals.
- iii. Describe impacts of the innovation(s) on time, cost, and quality.

Any innovations proposed will be expected to be used in design unless TDOT determines they are not in the best interest of the project.

### 4. **CM/GC Design Process** **(20 Points Section Maximum)**

How you support the CM/GC process and the project goals is critical to the team's success. In the Project Approach you may have provided some response to this issue. This section is an opportunity to provide additional information related to the CM/GC Design Process.

- i. **Risk Management**  
The CM/GC process is intended to eliminate or reduce risk. Removing risk and adding innovation will reduce the cost of construction. Therefore, it is expected that bid items on CM/GC projects will be lower in cost than what is found in comparable design-bid-build projects.

In your response to the RFP, give an overall summary explanation on how you will identify, price, and mitigate risk through the formalized risk management

process that TDOT expects to use. How will you support the team during pre-construction and construction activities in achieving a cost at or below traditional projects? How will you provide input in assigning risk responsibility and developing the Risk Register? How will you track and document risk and its cost and schedule impacts?

Include a discussion of the impact of risk on price. Topics of discussion are listed in the bullets below.

In the format indicated below, identify risks that would increase cost and the anticipated cost of that risk. It is expected that your submitted bid prices will include innovative cost savings and not include the cost of risk.

Risk mitigation that you will apply to decrease the cost and the projected cost savings, including actions undertaken by your team during pre-construction to identify and minimize risk.

Communication of the schedule and cost risk to the project team.

Effect of schedule on costs.

Use the table below to create a Risk Mitigation Matrix to identify key risks that affect project costs and schedule. Explain risk mitigation with probable cost and schedule savings.

Identified Risk	Probable Cost	Risk Mitigation Plan	Cost Savings to Project	Scheduled Impacts to Project (Days)
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- ii. **Decision Analysis and Resolution:** The Contractor’s participation in the design effort should help to reduce errors and omissions, improve constructability, and reduce the cost of construction. Describe means and methods that will be used to support the design development and decision-making process in both the pre-construction and construction phases of the project. How will the proposed processes help TDOT decide which suggestions to use, and how will the benefits and cost savings of CM/GC be documented? How will you provide recommendations to achieve the CM/GC goal of zero unplanned change orders?
- iii. **Cost Estimating and Open Cost Modeling:** Project estimating on CM/GC projects is a collaborative process where team members discuss and negotiate assumptions. These assumptions and prices are communicated to the design consultant, TDOT, and the Independent Cost Estimator (ICE) over the course of the project to ensure that the project meets the budget. Cost Models and OPCC estimates should be open book and transparent.

Describe the estimating process you will use to communicate the cost of each bid item and the cost of any risk. Explain how you will compare your cost to market conditions. How will you communicate assumptions, risk, and innovation to the designer and the ICE? Can your system produce a Schedule of Bid Items with items

from the current TDOT Bid Item Book (TDOT Bid Prices located at:  
[http://www.tdot.state.tn.us/construction/Average\\_Bid\\_Prices.htm](http://www.tdot.state.tn.us/construction/Average_Bid_Prices.htm))

- a. Provide a discussion of a Cost Model that you could use to communicate design decision choices, design elements, and construction packages to the project team. This model may include early procurement for long lead time items, early phasing for material and other independent contracts that may be accomplished before project design completion. Use tasks as a basis for developing a project cost model. This model will be used as part of the open-book estimating and collaboration throughout the design process, used to developed the Opinion of Probable Construction Cost (OPCC) at each design milestone, and the Guaranteed Maximum Price (GMP) Proposals. Consider providing an example Cost Model (not necessarily prepared specifically for this project).
- b. In the discussion of the Cost Model, describe or provide an example of your approach to estimating project bid items with a Cost-Based or Force Account Analysis that includes labor, materials, and equipment.
- c. Use the most current TDOT Cost Data and Item Code Books as references. GMP proposals are required to be compatible with these references. Items used in developing estimates and the GMP will be used for tracking and payment during the construction phase of this project.
- iv. **Schedule Management:** Your contract will be with TDOT. The designer's contract is also with TDOT. Address how you will collaboratively integrate and optimize the construction schedule with the design schedule.
- v. **Subcontractor Plan:** Provide a subcontractor selection and integration plan that describes your process for:
  - i. Soliciting reliable bids and making a selection;
  - ii. Ensuring the selection of high quality subcontractors that are competitively bid;
  - iii. Bringing market competitive pricing into the project;
  - iv. Identifying and developing quality small business opportunities on the project;
  - v. Ensuring that you will meet DBE goal(s); and
  - vi. Providing timely payments to all subcontractors.

### 3.3. **EVALUATION CRITERIA FOR ORAL INTERVIEWS** **(100 Points Total, 30% Overall Weight)**

An oral interview will be a mandatory part of the selection process after the TDOT Selection Panel selects a short list of Proposers from their Statement of Interest (SOI)/Proposals.

The structure of the oral interview will be as follows:

- A. **Presentation (35 Points) (15 minutes)**: Summarize the Proposal and describe the Contractor's innovation ideas and unique resources. This is the part of the

interview where the Proposer needs to communicate to the Selection Panel why it should be chosen. What strategies and abilities does the Proposer bring to this CM/GC project that makes it the best candidate? Limit the presentation to the most critical points of the Proposal and focus on what your team can bring to the table and why.

- B. **Team Challenge (30 Points)**: The Proposer will be given project challenges to review and propose a course of action to address the elements in the problems. The Proposer will be given 15 minutes to prepare responses or solutions and 5 minutes to discuss responses and solutions to the Selection Panel. This challenge scoring will be determined by the following criteria:
- i. Challenge Understanding
  - ii. Recognition of Key Points and Ideas
  - iii. Team Collaboration
  - iv. Communication Skills.
  - v. Understanding of CMGC Delivery Method, CSS, and ABC method
  - vi. Understanding of Project Goals
- C. **Question and Answer Session with the Selection Panel (35 Points)**: The questions asked in this session will include both standard questions for all short listed Proposers and specific questions relative to the Proposer's proposal and presentation. The interview presentation and question/answer scoring will be based on the following criteria:
- i. Project Understanding.
  - ii. Project Approach.
  - iii. Project Innovation.
  - iv. Communication Skills.
  - v. Understanding of CMGC Delivery Method.

### **3.4. EVALUATION CRITERIA FOR CMGC MANAGEMENT PRICE PERCENTAGE PROPOSAL** **(100 Points Possible, 20% Overall Weight)**

#### **1. CM/GC Management Price Percentage – 100 Points**

Proposers shall state their proposal CM/GC Management Fee, identified as a percentage and carried out to four decimal points (e.g. 0.0000%), which will be applied to all Construction Phases. The CM/GC Management Fee percentage shall include all profit, general and administrative ("G & A") costs, regional and home office overhead, and non-reimbursable costs identified in Appendix E. The CM/GC Management Price Percentage will be based on the estimated Construction Cost. The CM/GC Price Percentage shall not change regardless of the final, negotiated amount of the GMP for the Early Construction and Construction Phases.

The CM/GC Management Price percentage breakdown shall show the breakdown of all components used in establishing the percentage. The intent of the CM/GC Management price is to define the cost and level of effort for the CM/GC to deliver the project within the GMP. The CM/GC Fee Percentage shall exclude all Proposer costs for risk related to

performance of the construction work. Risk will be priced into subcontracted amounts and negotiated into self-performed work, as part of the overall direct "Cost of the Work"

The CM/GC Management Price Percentage score will be determined by comparing each Proposer's sealed CM/GC Management Fee percentage with the lowest CM/GC Management Price percentage being equivalent to the maximum score of 100 points. To score each fee percentage, the Selection Panel will use the following example formula:

Scoring of the CM/GC Management Price Percentage:

Example: Assume the lowest CM/GC Fee Percentage was 10%.

$$\text{FIRM A: } \frac{10\%}{10\%} \times 100 \text{ points} = 100 \text{ points}$$

$$\text{FIRM B: } \frac{10\%}{12.5\%} \times 100 \text{ points} = 80 \text{ points}$$

$$\text{FIRM C: } \frac{10\%}{15\%} \times 100 \text{ points} = 67 \text{ points}$$

The resulting score will be added to the individual Proposer's CM/GC Fee Proposal Form C that will be included in the sealed submittal.



## SECTION 4 – SCOPE OF WORK AND CM/GC SERVICES

### 4.1. CM/GC SERVICES SCOPE OF WORK

#### A. Project Goals

This project is intended to achieve the following goals:

- 1. Advance the knowledge, experience and cost efficiency of TDOT and the local construction industry in Accelerated Bridge Construction and CM/GC project delivery.**
- 2. Provide a well-publicized, highly successful Accelerated Bridge Construction project.**

Note: TDOT will be primarily responsible for public involvement and public relations. The Contractor will provide support for the public involvement and public relations effort.

- 3. Replace the existing poor bridge structure, and improve traffic operations and safety at the I-40 within the project budget.**

Note: TDOT and its Design Consultant will be primarily responsible for the design of the project to meet the goal of improving traffic operations and safety of the completed project.

- 4. Accelerate delivery of the construction schedule and obtain final project acceptance no later than October 15, 2015.**
- 5. Minimize inconvenience to the traveling public, and maximize safety of workers and the traveling public.**
- 6. Facilitate a collaborative partnership with all of the members of the project team and the stakeholders.**
- 7. Provide a high quality design and construction.**

#### B. Work Duration

The time period for the work described in this scope is approximately 141 calendar days for design and 230 calendar days for construction.

#### C. Work Product and Work Product Completion

The Contractor shall provide the work product and deliverables as described in Section 4.1.E Scope of Work. All submittals, reports, and reviews must be accepted by the TDOT Contract Administrator or designee.

D. Additional Project Information

Additional information regarding this project is available from the documents provided on the project website at <http://www.tdot.state.tn.us/construction/>

E. Scope of Work

This draft scope of work has been reviewed by TDOT and reflects a plan of approach based on the known goals. One factor determining the selection of CM/GC is the ability of the Contractor to analyze the project goals, evaluate the work elements, and formulate a proposal. This process may produce new approaches or modification to the project work elements. Because of that, all Proposers should be aware that the final scope of work for a project will be produced with input from the selected Consultant and the selected Contractor.

The Contractor will be part of the design team. As part of the design team, the Contractor will provide input on schedule, phasing, constructability, material availability, and cost throughout the design phase of the project. The Contractor tasks during the design phase include:

1. The Contractor shall attend the initial project workshop. The Contractor shall be introduced to the project, the stakeholders, specialty groups, the TDOT Project Team, and the Consultant Designer. This workshop includes the following tasks:

Task No.	Workshop Goals and Tasks
1	Introduction to the project, CM/GC, partnering session and the project stakeholders.
2	Project status, goals, objectives, funding, preliminary schedule, etc.
3	Presentation of project elements and scope.
4	Identifying project risks and developing an initial risk management plan.
5	Review of relevant plans, specifications, and reports.
6	Project site and equipment tour.
7	Scheduling of bi-weekly project, Field Inspection Review (FIR), and Final Office Review (FOR) meetings.
8	Establish Communication and Document Control Plan.
9	Question and Answer Session.

2. The Contractor will provide the following reporting and billing:

- i. Coordination:

- a. Coordination of all contract activities will be conducted by the TDOT/PM. The CMGC/PM shall keep regular contact with the C/PM and the TDOT/PM on a weekly basis.

- ii. Periodic Reports and Billings:

- a. Includes the periodic reports and billings required by TDOT Procedural Directive.

- iii. General Reports and Submittals:
  - a. In general, all reports and submittals must be approved by TDOT prior to their content being utilized in a follow-up work effort.
- 3. The Contractor shall partner with the Consultant Designer, and the TDOT Leadership Team, as part of the design team. As part of the design team, the Contractor will provide input on schedule, phasing, constructability, materials and equipment availability, cost, etc.
- 4. The Contractor shall be required to attend the meetings and produce the deliverables at the milestones described in the following table:

Task	Work Product Short Description	Unit	Total Estimated Quantity	Project Workshop	30% PS&E (FIR)	50% PS&E	70% PS&E	90% PS&E (FOR)	100% PS&E Or GMP	Misc.
1	As-Built, Current Design, and Site Conditions Review	EA	1	1						
2	Attend Project Scoping Workshop	EA	1	1						
3	Weekly Team Meetings	EA	18							
4	Milestone Meetings	EA	4		1		1	2		
5	GMP Negotiation Meetings	EA	3						3	
6	Project Action Team Meetings	EA								
7	Constructability Reports	EA	3				1	2		
8	Value Engineering Workshop, Review, and Report	EA								
9	Procurement Review	EA	1					1		
10	Contracting and Diversity Plan	EA	2						2	
11	Baseline Construction Schedule and Phasing	EA	3			1		1	1	
12	Risk Management Plan including Risk Register and Assessment Update	EA	4			1	1	2		
13	Innovation Tracking and Performance Report	EA	1						1	
14	Material Sourcing Plan	EA	2					2		
15	Quality Control Plan	EA	1					1	1	
16	Worker and Public Safety Plan	EA	1					1	1	
17	Site Specific Work Plans (MHT and Safety Critical)	EA	2					2	2	
18	Written Reviews and Redline Reviews of PS&E Packages	EA	2					2		
19	OPCC Cost Estimates	EA	4			1	1	2		
20	Construction GMP	EA	4			1	1		2	

Task Notes:

Task 18:

The Contractor shall be required to provide written reviews or reports and details/redlines of PS&E Packages. The Contractor shall thoroughly review all plans, specifications, reports, diagrams, shop drawings, and all other necessary project documentation. The Contractor shall independently calculate quantities of the construction package. The Design Consultant will also calculate quantities as part of the design process. Comments should be related to constructability, clarifications, design errors or omissions, effect on schedule, effect on cost, risk identification, or value engineer suggestions/recommendations.

Task 20:

The CM/GC will submit a GMP proposal when both the Contractor and TDOT agree the design has progressed to the appropriate level. If negotiations for a final construction price and the schedule are not successful, TDOT reserves the right to place the project for open bid. In this case, the Contractor shall be compensated for its pre-construction services and TDOT will have no further obligations to the Contractor. The Contractor shall submit GMP proposals and Electronic Bid Submittals (EBS) at the scheduled GMP proposal meetings.

5. TDOT may request the Contractor to submit a bid on early construction packages or for the acquisition of long lead items.
6. The Contractor shall ensure all environmental, safety, and permit commitments that are specified in the plans, specifications, and contract documents are implemented during construction if GMP proposals are accepted by TDOT.

#### **4.2. ROLES AND RESPONSIBILITIES MATRIX**

The matrix is intended to establish the roles and responsibilities for the pre-construction phase tasks listed below, in accordance with the forms and conditions contained herein, and the applicable TDOT standards.

The following activities of communication, consensus building, project team reviews, conceptual design, data gathering, documentation, and formal public notice should be planned by the appropriate responsible party and coordinated with all team members. The time of their accomplishment will overlap, and parallel paths of activity should be planned to finish the development phase in accordance with the shortest possible schedule. The type and number of meetings, documents, etc., will depend on the category and characteristics of the project work. A proposal shall be developed by the Contractor which satisfies the requirements of the project development. This plan must be approved by the Contract Administrator before starting the work.

**PRE-CONSTRUCTION ROLES AND RESPONSIBILITIES MATRIX**

CONSTRUCTION MANAGEMENT SERVICES	REQUIRED OF CONTRACTOR	REQUIRED OF DESIGN CONSULTANT	REQUIRED OF TDOT/OTHERS
<b>PHASE: PRE-CONSTRUCTION</b>			
<b><u>INITIAL PROJECT SCOPING MEETING (WORKSHOP)</u></b>			
A. CM/GC AND PARTNERING INTRO SESSION	C	C	C
B. PROJECT SITE VISIT AND INSPECTION	C	C	C
C. PROJECT STATUS, GOALS, ELEMENTS, OBJECTIVES, DESIGN SCHEDULE REVIEW	C	C	C
D. IDENTIFY PROJECT RISKS AND DEVELOP INITIAL RISK MANAGEMENT PLAN AND RISK REGISTER	1	2	2
E. REVIEW APPLICABLE ENVIRONMENTAL DOCUMENTS (ROD, FONSI, ETC.)		1	2
F. INDEPENDENT DESIGN AND AS-BUILT REVIEW	1	2	2
G. DEVELOP PROJECT SCHEDULE AND TASKS	C	C	C
H. SCHEDULE BI-WEEKLY PROGRESS, FIR, FOR, AND MILESTONES MEETINGS		2	1
I. IDENTIFY DESIGN CRITERIA		1	2
J. DISCUSSION OF POSSIBLE EARLY DELIVERY AND LONG LEAD TIME ITEMS	1		
K. ANALYSIS OF PROJECT PHASING AND MULTIPLE PS&E PACKAGES	1	2	2
L. DEVELOP DOCUMENT REVIEW AND NAMING CONVENTION STANDARDS			1
L. QUESTION AND ANSWER SESSION	C	C	C
<b>PROGRESS MEETINGS</b>			
A. TDOT/PM, C/PM, CMGC/PM	C	C	C
B. PROJECT MEETING MINUTES	2	1	2
<p>The managers and team members will meet periodically as required (typically at two-week intervals). These progress meetings will be used to coordinate and track the work effort and resolve problems. The meetings will review the following:</p> <ul style="list-style-type: none"> <li>Activities required to be complete since last meeting (Action Items)</li> <li>Problems and challenges encountered/anticipated and potential solutions</li> <li>Project Schedule Updates (Design and Construction)</li> <li>Action Items</li> <li>Coordination and communication required with: <ul style="list-style-type: none"> <li>▪ Team Members</li> <li>▪ TDOT Specialty Units</li> <li>▪ Other</li> </ul> </li> </ul> <p>The TDOT/PM will provide meeting minutes that include details discussed, notes, and all action items relating to the meeting within one week of the meeting.</p>			

LEGEND: C = COLLABORATIVE RESPONSIBILITY, 1 = PRIMARY RESPONSIBILITY, 2 = SECONDARY RESPONSIBILITY

**PRE-CONSTRUCTION ROLES AND RESPONSIBILITIES MATRIX - CONTINUED**

CONSTRUCTION MANAGEMENT SERVICES	REQUIRED OF CONTRACTOR	REQUIRED OF DESIGN CONSULTANT	REQUIRED OF TDOT/OTHERS
<b>PHASE: PRE-CONSTRUCTION</b>			
<b><u>1. PROJECT DEVELOPMENT PROCESS</u></b>			
<b>Project Management</b>	2	2	1
The TDOT/PM will coordinate all the work tasks being accomplished by all parties to ensure project work completion stages are on schedule. The C/PM and CMGC/PM shall coordinate all the work tasks being accomplished by their respective teams to make sure project work completion stages are on schedule.			
<b>Communication and Consensus Building</b>	2	2	1
The TDOT/PM is responsible for the consensus building and facilitating the communication between all members of the project team. This does not dismiss the responsibility of all team members to communicate with the TDOT/PM and the TDOT Project Management Team when required.			
<b>Weekly Update Newsletter</b>	N/A		
The TDOT/PM will publish a weekly update newsletter to document the weekly or bi-weekly progress of the schedule, estimate, team meetings, action items, and pertinent information for the FHWA, TDOT management, and project team members.			
<b>Maintain Updated Contact List</b>		1	
Establish and maintain a computerized list of all appropriate interested parties for the communication process. The list will be used for notices regarding public meetings, mailings, newsletters, or other communication as appropriate.			
<b><u>2. MEETINGS</u></b>			
<b>Graphics support and presentations</b>	2	1	2
Each project team member is responsible for the graphics, documents, reports, plans, specifications, and written reviews from each specific scope of work item. Presentation of these documents and their reviews will be available on the shared project server after the meeting has been adjourned.			
<b>Provide Local Office</b>			1
The TDOT/PM will obtain and maintain an office within the project area to conduct small group meetings and provide displays/information to the public. This office may have work spaces for project team members, meeting rooms with graphics support and capacity for the entire team to attend. Additional offices or meeting spaces may be considered at the Project Workshop.			
<b>PM Updates on Progress</b>	2	2	1
The TDOT/PM, CMGC/PM, and the C/PM will all update the team members at the scheduled meetings as to their progress on deliverables, challenges, and the feedback/comments they need.			
<b>Project Discussion</b>	2	2	1
The team members need to come prepared to discuss any and all reservations, ideas, and challenges to the project. Open and honest dialogue is the key to the success of project delivery.			

LEGEND: C = COLLABORATIVE RESPONSIBILITY, 1 = PRIMARY RESPONSIBILITY, 2 = SECONDARY RESPONSIBILITY

**PRE-CONSTRUCTION ROLES AND RESPONSIBILITIES MATRIX - CONTINUED**

CONSTRUCTION MANAGEMENT SERVICES	REQUIRED OF CONTRACTOR	REQUIRED OF DESIGN CONSULTANT	REQUIRED OF TDOT/OTHERS
<b>PHASE: PRE-CONSTRUCTION</b>			
<b>2. PRELIMINARY DESIGN</b>			
Preliminary Roadway, Geometric, Structural, Environmental, SWMP, etc. Design	2	1	2
TDOT/PM will coordinate all design activities with required TDOT specialty units, the Contractor, the Design Consultant, and other outside entities. Design Consultant is responsible for the civil and structural design, plans, specifications, and estimate packages at each formal review.			
Environmental - gathering data, analysis, and mitigation development		2	1
Environmental clearances		2	1
ROW, specialty, and local clearances		2	1
Hazardous material investigation		2	1
TDOT processes (forms, clearances)		2	1
Utility coordination	2	2	1
Conduct field survey of project area		1	2
Field and project research		1	2
Hazardous material investigation		2	1
Field survey and existing feature development		1	2
Construction requirements	1	2	2
Innovation development, proposal, and tracking	C	C	C
Check and field verify all applicable as-built plans	2	1	2
Provide construction plans, specifications, and estimates		1	
Plot/develop all required information on the plans in accordance with all applicable TDOT policies and procedures and all industry standards for civil, electrical, ITS, and structural design.			
Develop construction cost model for Engineer Estimator and ICE	1	2	2
Develop and calculate quantities	2	1	2
Risk Register development	1	2	2
Initiate and Track DBE/ESB and Subcontractor Plan	2	2	1
Constructability reviews and reports	1	2	2
Construction Phasing Plan	1	2	2
Value Engineering proposals			

LEGEND: C = COLLABORATIVE RESPONSIBILITY, 1 = PRIMARY RESPONSIBILITY, 2 = SECONDARY RESPONSIBILITY



**PRE-CONSTRUCTION ROLES AND RESPONSIBILITIES MATRIX - CONTINUED**

<b>CONSTRUCTION MANAGEMENT SERVICES</b>	<b>REQUIRED OF CONTRACTOR</b>	<b>REQUIRED OF DESIGN CONSULTANT</b>	<b>REQUIRED OF TDOT/OTHERS</b>
<b>PHASE: PRE-CONSTRUCTION</b>			
Cost savings reviews	1	2	2
Preliminary construction schedule	1	2	2
Long lead time GMP submissions and proposals	1		
Long lead time negotiations	1		
Long lead time item procurement	1		
Opinion of probable construction cost Estimate #1	1	2	2
<b>FIR (Field Inspection Review) Preparation</b>			
Coordinate, complete, and compile the plans with input from other branches: materials, hydraulics, environmental, traffic, right-of-way, maintenance, safety, and Staff Bridge, if applicable.		1	2
The FIR plans and specifications shall comply with TDOT requirements and shall include: title sheet, typical sections, general notes, plan/profile sheets, and preliminary layouts.		1	2
The plans shall be submitted to the TDOT/PM and the CMGC/PM for preliminary review at least two weeks prior to the FIR.		1	2
The plans will be reproduced by TDOT or the Consultant.		1	2
Prepare the Engineer's Estimate for work described in the FIR plans based on estimate quantities.		2	1
Prepare the FIR Opinion of Probable Construction Cost (OPCC #1)			
TDOT Form 1048 – Project Scoping Procedures Completion		1	2
<b>Field Inspection Review Meeting</b>			
Review FIR PS&E package and provide written reviews, comments, and redlines.		C	C
Attend the FIR.		C	C
Provide post-FIR revisions and memo.		1	2
Provide list of all deviations from the standard design criteria and written justification for each.		1	2
Update DBE/ESB and Subcontractor Plan.			1
Update Risk Register and Cost Model.	1	2	2

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**PRE-CONSTRUCTION ROLES AND RESPONSIBILITIES MATRIX - CONTINUED**

CONSTRUCTION MANAGEMENT SERVICES	REQUIRED OF CONTRACTOR	REQUIRED OF DESIGN CONSULTANT	REQUIRED OF TDOT/OTHERS
<b>PHASE: PRE-CONSTRUCTION</b>			
<b>Final Roadway, Geometric, Structural, Environmental, SWMP, etc. Design</b>			
TDOT/PM will coordinate all design activities with required TDOT specialty units, the Contractor, the Design Consultant, and other outside entities. Design Consultant is responsible for the civil and structural design, plans, specifications, and estimate packages at each formal review.			
Environmental - gathering data, analysis, and mitigation development		2	1
Final environmental clearances		1	2
Final environmental permits		1	2
ROW, specialty, and local clearances		2	1
FIPI justification for sole sourcing		2	1
Final utility coordination		2	1
Develop and calculate final quantities	2	1	2
TDOT processes (forms, clearances)		2	1
Update Risk Register, formal risk assessment meeting	1	2	2
Constructability reviews and reports	1	2	2
Construction Phasing Plan	1	2	2
Value Engineering proposals			
Final construction requirements	C	C	C
Innovation development, proposal, and tracking	C	C	C
Cost Savings reviews	C	C	C
Final Office Review (FOR) Construction Schedule	1	2	2
Long lead time GMP submissions and proposals	1		
Long lead time negotiations	1		
Long lead time item procurement	1		
Opinion of Probable Construction Cost Estimate #2	1	2	2
Provide FOR level construction plans, specifications, and estimates	2	1	2

LEGEND: C = COLLABORATIVE RESPONSIBILITY, 1 = PRIMARY RESPONSIBILITY, 2 = SECONDARY RESPONSIBILITY

**PRE-CONSTRUCTION ROLES AND RESPONSIBILITIES MATRIX - CONTINUED**

CONSTRUCTION MANAGEMENT SERVICES	REQUIRED OF CONTRACTOR	REQUIRED OF DESIGN CONSULTANT	REQUIRED OF TDOT/OTHERS
<b>PHASE: PRE-CONSTRUCTION</b>			
Develop and calculate final quantities	2	1	2
<b>FOR (Final Office Review) Preparation</b>			
Coordinate, complete, and compile the FOR plans with input from other branches: materials, hydraulics, environmental, traffic, right-of-way, maintenance, safety, and Staff Bridge, if applicable.	2	1	2
The FOR plans and specifications shall comply with TDOT requirements and shall include: title sheet, typical sections, general notes, plan/profile sheets, and preliminary layouts.	2	1	2
The plans shall be submitted to the TDOT/PM and the CMGC/PM for preliminary review at least two weeks prior to the FOR.	2	1	1
The FOR plans will be reproduced by TDOT or the Consultant.		1	
Prepare the Engineer's Estimate for work described in the FOR plans based on estimate quantities.		2	1
Prepare the FOR Opinion of Probable Construction Cost (OPCC #2)	1		
<b>FOR (Final Office Review) Meeting</b>			
Review FOR PS&E package and provide written reviews, comments, and redlines.	2	2	1
Attend the FOR meeting.	C	C	C
Post-FOR revisions and memo	2	1	2
Provide list of all deviations from the standard design criteria and written justification for each.	2	1	2
Provide a FOR Construction Plan.	1	2	2
Obtain final environmental and access permits.	2	2	1
Finalize construction cost model for Engineer Estimator and ICE.	1	2	2
Update DBE/ESB and Subcontractor Plan.			1
Update Risk Register.	1	2	2

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**PRE-CONSTRUCTION ROLES AND RESPONSIBILITIES MATRIX - CONTINUED**

CONSTRUCTION MANAGEMENT SERVICES	REQUIRED OF CONTRACTOR	REQUIRED OF DESIGN CONSULTANT	REQUIRED OF TDOT/ OTHERS
<b>PHASE: PRE-CONSTRUCTION</b>			
<b>GMP Proposal and Negotiations</b>	<b>C</b>	<b>C</b>	<b>C</b>
Notify TDOT/PM at a point where GMP proposals can be sufficiently prepared.	1		
Supply cost model and assumptions to ICE and Engineer Estimate.	1		
Supply EBS to CM/GC Contractor.	2	2	1
Prepare and submit construction GMP proposals.	1		
Procure independent cost estimate.		2	1
Submit an electronic EBS to the TDOT/PM for each phase.	1		
Review the construction GMP proposals and compare to Engineer's Estimate and ICE.		1	2
Negotiate final GMPs for each phase.	<b>C</b>	<b>C</b>	<b>C</b>
CM/GC and TDOT have three attempts to negotiate assumptions and prepare GMP estimates. After the third opening, TDOT reserves the right to prepare the bid package for advertisement.			

LEGEND: C =COLLABORATIVE RESPONSIBILITY, 1 = PRIMARY RESPONSIBILITY, 2 = SECONDARY RESPONSIBILITY

## **APPENDICES**

### **APPENDIX A: SAMPLE CM/GC SERVICES CONTRACT**

A draft template of the CM/GC services contract will be available on the project website at <http://www.tdot.state.tn.us/construction/> under Alternative contracting menu.

## **APPENDIX B: CM/GC PROCESS FOR CONSTRUCTION**

### **DESIGNER AND CONTRACTOR DESIGN PROJECT**

The selected Contractor will be awarded a consulting contract, prepared and administered by the Department. The cost of the contract will be based upon negotiated unit rates for key personnel and support staff identified on the project team that will participate on the project. The requirements will be identified in the contract (further outlined in Section 4 – Scope of Work and CM/GC Services). These requirements can include, but are not limited to:

- Constructability reviews of the design.
- Assistance in shaping the project scope of work to the available budget.
- Assistance in improving project schedule.
- Provide detailed cost estimates and cost estimate breakdowns of elements of the work as the design is developed using open-book methods.
- Design reviews to ensure that the package is complete and without ambiguity.
- Finding design errors.

### **CONTRACTOR SUBMITS BID FOR PROJECT (EARLY PROCUREMENT)**

The Contractor may be asked to procure long lead materials such as bridge girders, retaining wall panels, piling, and other materials that may be in short supply or require longer than desired lead times from purchase to delivery. The Department may also procure through the Contractor such services as pavement cores, pipe videos, potholes, or other investigations to facilitate the design. TDOT may choose to exercise this option if the early procurement saves significant construction time, money, or avoids potential delays once the project begins.

If TDOT elects to use this early procurement option, it proceeds as follows:

The Contractor will prepare a bid to supply the item(s), including all other costs associated with the procurement (such as transportation, storage, etc.). The bid is only for purchased items and should not include mobilization for construction or other unrelated costs.

TDOT will evaluate the scope of work for DBE participation opportunities and set a goal in accordance therewith.

The Contractor will submit the bid through the TDOT Electronic Bid System (EBS). TDOT will secure an independent cost estimate for the item(s). Upon opening the Contractor's bid, TDOT will determine the acceptability of the bid by comparing it to state averages, similar projects, the independent cost estimate and the engineer's estimate. The ICE estimate will not be made available. For each bid item, the team will evaluate if the GMP, Engineer's Estimate, and the ICE were within 10%.

If the DBE goal is greater than zero, at the time of bid the Contractor will be required to submit commitments to DBE participants sufficient to meet the goal and/or demonstrate good faith efforts to meet the goal.

TDOT personnel reviewing these costs may include: the Project Manager, the CM/GC PM, the Construction Engineer, an estimating consultant if hired, and FHWA representatives.

If the prices are not acceptable, TDOT may enter into a process of risk identification that identifies price differences between the Contractor and the Independent Cost Estimate. Following the resolution of these risk issues, the items may be re-bid. If this is not successful, TDOT has the option to accept the offered price or to procure the items later as part of the bid process for the construction project or by some other method. The construction contract is prepared and executed to cover only the defined procurement services. Site preparation to support the procurement or additional procurement services may be made a part of this contract.

### **CONTRACTOR SUBMITS BID FOR PROJECT (EARLY CONSTRUCTION CONTRACT)**

If time and/or money can be saved by allowing the Contractor to start initial work prior to the completion of the total design package, TDOT may ask the Contractor to prepare a lump sum or unit cost bid for all or a portion of the work.

If TDOT elects to use this contracting option, it proceeds as follows:

TDOT and the Contractor will agree upon a scope of work to accomplish in this phase of the contract. The agreement may take the form of a set of plans or it may consist of something less formal such as sketches, drawings, or written descriptions. Both parties must agree that the scope of work is clear and unambiguous.

TDOT will evaluate the scope of work for DBE participation opportunities and set a goal in accordance therewith.

The Contractor will prepare a bid to perform the agreed to scope of work. The bid will be based on the estimating model and the most recent OPCC for the agreed scope of work.

The Contractor will submit the bid through EBS. TDOT will secure an independent cost estimate for the work. Upon opening the Contractor's bid, TDOT will determine the acceptability of the bid by comparing it to state averages, similar projects, the independent cost estimate and the engineer's estimate. The ICE estimate will not be made available. For each bid item, the team will evaluate if the GMP, Engineer's Estimate, and the ICE were within 10%.

If the DBE goal is greater than zero, at the time of bid the Contractor will be required to submit commitments to DBE participants sufficient to meet the goal and/or demonstrate good faith efforts to meet the goal.

TDOT personnel reviewing these costs may include: the Project Manager, the CM/GC PM, the Construction Engineer, an estimating consultant if hired, and FHWA representatives.

If the prices are acceptable, TDOT will prepare a construction contract for this portion of the work. If a previous construction contract had been entered into, a separate contract may be prepared, or the work may be added to that contract by supplemental agreement at the discretion of TDOT.

If the prices are not acceptable, TDOT may enter into a process of risk identification that identifies price differences between the Contractor and the Independent Cost Estimate. Following the resolution of these risk issues, the work will be re-bid. TDOT has the option to accept the revised price or to terminate the CM/GC process and procure the construction project by some other method.

**CONTRACTOR SUBMITS BID FOR PROJECT (DESIGN IS COMPLETE)**

When TDOT, the designer, and the Contractor agree that the project has been designed to a sufficient level of detail to allow the Contractor to accurately bid the project, the following procedure will be used:

The designer will produce a set of plans and specifications showing all work to be accomplished. The plans will also show all work accomplished under any previous Early Construction packages.

TDOT will evaluate the scope of work for DBE participation opportunities and set a goal in accordance therewith.

The Contractor will prepare a bid to perform the work shown. The bid will be based on the estimating model and the most recent OPCC for the agreed scope of work.

The Contractor will submit the bid through EBS. TDOT will secure an independent cost estimate for the work. Upon opening the Contractor's bid, TDOT will determine the acceptability of the bid by comparing it to state averages, similar projects, the independent cost estimate and the engineer's estimate. The ICE estimate will not be made available. For each bid item, the team will evaluate if the GMP, Engineer's Estimate, and the ICE were within 10%.

If the DBE goal is greater than zero, at the time of bid the Contractor will be required to submit commitments to DBE participants sufficient to meet the goal and/or demonstrate good faith efforts to meet the goal.

TDOT personnel reviewing these costs may include: the Project Manager, the CM/GC PM, the Construction Engineer, an estimating consultant if hired, and FHWA representatives.

If the prices are acceptable, TDOT will prepare a construction contract. If a previous construction contract had been entered into, a separate contract may be prepared, or the work may be added to that contract by supplemental agreement at the discretion of TDOT.

If the prices are not acceptable, TDOT will enter into a process of risk identification that identifies price differences between the Contractor and the Independent Cost Estimate. Following the resolution of these risk issues, the project will be re-bid. TDOT has the option to accept the revised price or to terminate the CM/GC process and procure the construction Project by some other method.

**CONTRACTOR BUILDS PROJECT**

From this point forward, the work proceeds in the same manner as a design-bid-build project as per the negotiated contract.



## **APPENDIX C: ACKNOWLEDGEMENT AND ATTESTATION FORMS**

# ACKNOWLEDGEMENT AND ATTESTATION FORM (PARTNERSHIPS FORM)

Date: \_\_\_\_\_  
Page 1 of 1

By responding to this RFP, the Respondent(s) certify that he/she has reviewed the Construction Management/General Contractor Sample Contract, and its Exhibits contained herein, and are familiar with their terms and conditions and find them expressly workable without change or modification.

We certify and declare that the foregoing is true and correct.

Subscribed on \_\_\_\_\_ at \_\_\_\_\_,  
Date City

\_\_\_\_\_, State of \_\_\_\_\_  
County State

1) \_\_\_\_\_  
Partner Signature

Typed Name: \_\_\_\_\_

2) \_\_\_\_\_  
Partner Signature

Typed Name: \_\_\_\_\_

Notary: \_\_\_\_\_  
Notary Signature Date

Commission Expires: \_\_\_\_\_

Note: Add additional signature if there are more than two partners.

# ACKNOWLEDGEMENT AND ATTESTATION FORM (JOINT VENTURE FORM)

Date: \_\_\_\_\_  
Page 1 of 1

By responding to this RFP, the Respondent(s) certify that he/she has reviewed the Construction Management/General Contractor Sample Contract, and its Exhibits contained herein, and are familiar with their terms and conditions and find them expressly workable without change or modification.

We certify and declare that the foregoing is true and correct.

Subscribed on \_\_\_\_\_ at \_\_\_\_\_,  
Date City  
\_\_\_\_\_, State of \_\_\_\_\_  
County State

1) \_\_\_\_\_  
Venture Partner Binding Signature Date

Typed Name: \_\_\_\_\_  
Title: \_\_\_\_\_  
Type of Business \_\_\_\_\_

\_\_\_\_\_  
Witness Date

Typed Name: \_\_\_\_\_

2) \_\_\_\_\_  
Venture Partner Binding Signature Date

Typed Name: \_\_\_\_\_  
Title: \_\_\_\_\_  
Type of Business \_\_\_\_\_

\_\_\_\_\_  
Witness Date

Typed Name: \_\_\_\_\_

1. Add additional venture partners as necessary.
2. Witnesses of venture partners shall be corporate secretary for corporations, partners for partnerships, and notaries for sole proprietorships.
3. Please attach joint venture agreement.
4. Type of business shall identify the venture partner as a corporation, venture, partnership, sole proprietorship, or other legal entity.

**ACKNOWLEDGEMENT AND ATTESTATION FORM (CORPORATE FORM)**

Date: \_\_\_\_\_  
Page 1 of 1

By responding to this RFP, the Respondent(s) certify that he/she has reviewed the Construction Management/General Contractor Sample Contract, and its Exhibits contained herein, and are familiar with their terms and conditions and find them expressly workable without change or modification.

We certify and declare that the foregoing is true and correct.

Subscribed on \_\_\_\_\_ at \_\_\_\_\_,  
Date City

\_\_\_\_\_, State of \_\_\_\_\_.  
County State

\_\_\_\_\_  
Corporate Officer Signature Date

\_\_\_\_\_  
Secretary Date

Note: Use full corporate name and attach corporate seal here.

(SEAL)

**ACKNOWLEDGEMENT AND ATTESTATION FORM (SOLE PROPRIETORSHIP FORM)**

Date: \_\_\_\_\_  
Page 1 of 1

By responding to this RFP, the Respondent(s) certify that he/she has reviewed the Construction Management/General Contractor Sample Contract, and its Exhibits contained herein, and are familiar with their terms and conditions and find them expressly workable without change or modification.

We certify and declare that the foregoing is true and correct.

Subscribed on \_\_\_\_\_ at \_\_\_\_\_,  
Date City  
\_\_\_\_\_, State of \_\_\_\_\_  
County State

\_\_\_\_\_  
Respondent Date

Typed Name: \_\_\_\_\_

Notary: \_\_\_\_\_  
Date

Commission Expires: \_\_\_\_\_

## APPENDIX D: EVALUATION AND CM/GC MANAGEMENT PRICE PROPOSAL FORMS

### PROPOSAL, ORAL INTERVIEW EVALUATION SCORING NOTES:

- i. TDOT has developed a CM/GC Selection Panel Scoring Guide to promote objectivity and transparency. Selection Panel Members are required to read and follow all scoring guidelines.
- ii. Agencies are encouraged to include additional criteria that reflect the unique characteristics of the project under each category to help determine the submitter's overall qualifications.
- iii. Weights are to be assigned prior to evaluation and are to be consistent on all evaluation forms.
- iv. Selection Panel scoring values will be only numbers in whole or half-number increments (i.e. 75, 50, 25, 25.5, etc.). Scoring for the SOI/Proposal and Oral Interview Criteria form will be based on the following Qualitative Assessment Guidelines, which will be applied to all sections except the CM/GC Pre-Construction Fee and the CM/GC Management Fee.

<b>Qualitative Assessment Guidelines</b>	
Selection Team members will individually review and score each proposal category according to the criteria set forth in the RFP. Team members will evaluate each category sub-factor listed in this Evaluation Manual and assign those sub-factors a Qualitative Assessment Percentage according to the scoring range listed below:	
<b>90-100%</b>	The Proposer demonstrates a complete understanding of the subject and an approach that significantly exceeds the stated requirements and objectives of this scoring category. The proposal communicates an outstanding level of quality. The Proposer's qualifications are exceptional. Proposal shows no weaknesses or deficiencies for this scoring category.
<b>70-89%</b>	The Proposer demonstrates a strong understanding and has a strong approach to the scoring category. The proposal communicates a high level of quality and the proposal exceeds the stated requirements of the RFP. The proposal shows few weaknesses or deficiencies for this scoring category.
<b>40-69%</b>	The Proposer demonstrates a general understanding of the project and an approach containing some weaknesses/deficiencies regarding the stated requirements and objectives of this project. The proposal communicates an average level of quality and meets the stated requirements of the RFP.
<b>20-39%</b>	The Proposer has demonstrated a below average understanding of this scoring category and their response contains significant weaknesses and deficiencies. The proposal communicates a below-average level of quality. The Proposer's qualifications raise questions about the Proposer's ability to successfully meet the project goals.
<b>0-19%</b>	The Proposer has demonstrated a minimal understanding of this scoring category and their response contains numerous weaknesses and deficiencies. The proposal demonstrates little or no level of quality or value. The Proposer's qualifications raise questions about the Proposer's ability to successfully meet the project goals.

**CM/GC MANAGEMENT PRICE PERCENTAGE PROPOSAL EVALUATION SCORING NOTES:**

- 1. Determine score for each Proposer’s sealed CM/GC Management Price Proposal. The maximum point total for this section is 100 points maximum with an overall total weight of 20%.

A. CM/GC Management Fee 100 Points Maximum

Must include all supporting information required in Section 3.4 and on Form C-1.  
CM/GC Management Price Percentage Scoring information is described in Section 3.4 of this RFP.

**TOTAL SCORING EVALUATION SCORING NOTES:**

- 1. The maximum point total for each of four evaluation sections is 100 points weighted by the following factors:

Section:	Weight	Appendix D
SOI/Proposal	50%	(Scoring Form A)
Interview	30%	(Scoring Form B)
CM/GC Fee Proposal	20%	(Scoring Form C)
Final Scoring Matrix	Total	(Scoring Form D)

- 2. The Proposer with the highest total score in all sections will be selected. The score from the qualitative evaluations from all Selection Panel Members will be averaged to produce the total overall score for each Proposer.

TENNESSEE DEPARTMENT OF TRANSPORTATION  
 SCORING FORM A: STATEMENT OF INTEREST/PROPOSAL EVALUATION FORM  
 CONSTRUCTION MANAGEMENT/GENERAL CONTRACTOR SERVICES

Name of Firm: \_\_\_\_\_ Name of Project: \_\_\_\_\_  
 Evaluator No: \_\_\_\_\_ Date: \_\_\_\_\_

RFP Reference: Meets Minimum Requirements YES \_\_\_ NO \_\_\_

If the minimum requirements (including letter from surety) have not been met, specify the reason(s):

\_\_\_\_\_  
 \_\_\_\_\_

**1 Project Management Team/Capability of the Contractor - 40 Points Maximum**

**Project Management Team**

	Rating		Weight	=	Score
Composition of Team/Location/Organization	<input type="text"/>	x	0.04	=	<input type="text"/>
Job Descriptions and Responsibilities	<input type="text"/>	x	0.01	=	<input type="text"/>
Qualifications and Experience	<input type="text"/>	x	0.04	=	<input type="text"/>
Team Building and Collaboration	<input type="text"/>	x	0.04	=	<input type="text"/>
References	<input type="text"/>	x	0.02	=	<input type="text"/>

**Project Team Capability**

Prior Experience/Performance/References	<input type="text"/>	x	0.10	=	<input type="text"/>
Project Background and Success	<input type="text"/>	x	0.10	=	<input type="text"/>
Local Experience	<input type="text"/>	x	0.05	=	<input type="text"/>

**2. Project Approach - 20 Points Maximum**

**Project Goals**

	Rating		Weight	=	Score
Firm Understands Project Goals	<input type="text"/>	x	0.05	=	<input type="text"/>

**Project Approach**

Strategic Project Approach	<input type="text"/>	x	0.10	=	<input type="text"/>
Safety	<input type="text"/>	x	0.05	=	<input type="text"/>

**3 Project Innovations – 20 Points Maximum**

	Rating		Weight	=	Score
	<input type="text"/>	x	0.20	=	<input type="text"/>

**4 CMGC Design Process – 20 Points Maximum**

	Rating		Weight	=	Score
Risk Management	<input type="text"/>		0.05	=	<input type="text"/>
Decision Analysis and Resolution	<input type="text"/>	x	0.04	=	<input type="text"/>
Cost Estimating	<input type="text"/>	x	0.05	=	<input type="text"/>
Schedule Management	<input type="text"/>	x	0.03	=	<input type="text"/>
Subcontractor Plan	<input type="text"/>	x	0.03	=	<input type="text"/>

**TOTAL SCORE: (100 Points Maximum) \_\_\_\_\_ (A)**

**Weight Overall Score: 50% X \_\_\_\_\_ (A) = \_\_\_\_\_**



TENNESSEE DEPARTMENT OF TRANSPORTATION  
SCORING FORM B: ORAL INTERVIEWS STANDARD EVALUATION FORM  
CONSTRUCTION MANAGEMENT/GENERAL CONTRACTOR SERVICES

Name of Firm: \_\_\_\_\_

Name of Project: \_\_\_\_\_

Evaluator: \_\_\_\_\_

Date: \_\_\_\_\_

**Oral Interview Section** **100 Points Maximum. 20% Overall Weight**

Oral Interview Scoring Criteria	Rating		Weight		Score
Presentation Session	<input type="text"/>	x	<input type="text" value=".35"/>	=	<input type="text"/>
Team Challenge	<input type="text"/>		<input type="text" value=".30"/>		<input type="text"/>
Question and Answer Session		x	<input type="text" value=".35"/>	=	<input type="text"/>
			<input type="text" value="Total Score"/>		<input type="text"/>

**TOTAL SCORE: (100 points Maximum)**

**Overall Weighted Score**  x  =

Team Project Challenge(s):

- 1.
- 2.

Questions Asked:

- 1.
- 2.
- 3.
- 4.
- 5.
- 6.

Questions from Contractor:



SCORING FORM D: FINAL SCORING MATRIX  
CONSTRUCTION MANAGEMENT/GENERAL CONTRACTOR SERVICES

<b>Firm #</b>	<b>Met Minimum Requirements</b>	<b>SOI/Proposal Weighted Score</b>	<b>Oral Interview Weighted Score</b>	<b>CM/GC Fee Weighted Score</b>	<b>Total Score</b>

**APPENDIX E: CONSTRUCTION GENERAL CONDITIONS**

	<b>Costs NOT TO BE included in CM/GC Management Fee Percentage</b>	<b>Costs TO BE included in CM/GC Management Fee Percentage</b>
<b>Item</b>	<b>Costs for the categories below will be negotiated and included in the direct "Cost of the Work"</b>	<b>Other indirect and non-reimbursable costs to be included in the CM/GC fee percentage are listed below</b>
E.1	Mobilization	Project Principal – all costs
E.2	Project Manager	Cost Estimator services during Construction Phase –all costs. <i>(Note: Cost Estimator services during Pre-construction Phase are reimbursable as included in the Pre-construction Services Fee (Form C-2))</i>
E.3	Construction Manager/Superintendent	Project Manager relocation, housing, and subsistence costs.
E.4	All other on-site, construction management staff as approved by the Agency	Construction Manager/Superintendent relocation, housing, and subsistence costs.
E.5	On-site administrative staff, including clerical and secretarial staff	Additional CM/GC staff relocation, housing, and subsistence cost.
E.6	All project direct costs related to Safety	Home, branch and regional office administrative support staff and all related costs
E.7	All project direct costs related to Quality Control	Home, branch and regional office safety support staff and all related costs
E.8	Project office costs for cleaning, set-up/demob, maintenance, security, utilities, rent/lease, equipment, and furniture	Home, branch and regional office quality control support staff and all related costs
E.9	Materials and equipment handling, including shipping/transport to site and storage costs	Profit
E.10	Costs to co-locate with Agency staff	
E.11	Job site temporary toilet facilities and maintenance	
E.12	Partnering workshops	
E.13	Construction rental equipment	
E.14	Actual cost of permits	
E.15	All project direct costs related to implementation of Agency-approved sustainable practices	
E.16	All project direct costs related to implementation of Agency-approved D/M/W/ESB program	
E.17	Construction equipment and vehicles at Proposer's internal cost rate, including costs of maintenance and fuel	
E.18	All costs related to cell phones, radios, fax machines, pagers, computers and software.	
E.19	All costs of capital and interest; licenses and taxes required by law.	
E.20	Miscellaneous project office costs, including but not limited to, drinking water, printing, reproduction, postage, delivery, and supplies	

## APPENDIX F: REFERENCES

### 1. AMERICAN ASSOCIATION OF STATE HIGHWAY AND TRANSPORTATION OFFICIALS (AASHTO) PUBLICATIONS (using latest approved versions):

- a. A Policy on Design Standards-Interstate System
- b. A Policy on Geometric Design of Highways and Streets
- c. Guide for Design of Pavement Structures
- d. Standard Specifications for Highway Bridges
- e. Guide for the Design of High Occupancy Vehicle and Public Transfer Facilities
- f. Guide for the Development of Bicycle Facilities
- g. Standard Specifications for Transportation Materials and Methods of Sampling and Testing – Part 1, Specifications and Part II, Tests
- h. Highway Design and Operational Practices Related to Highway Safety
- i. Roadside Design Guide

### 2. TENNESSEE DEPARTMENT OF TRANSPORTATION PUBLICATIONS (using latest approved versions):

- The Department Standard Specifications;
- The Department Supplemental Specifications;
- The Department Design Guidelines, and Addendum;
- The Department Construction Circular Letters;
- The Department Standard Drawings;
- Design Procedures for Hydraulic Structures 2004;
- Drainage Manual;
- Utility Manual
- AASHTO LRFD Bridge Design Specifications (Sixth Edition, 2012)
- FHWA scour publication HEC-18, FHWA publication HEC-21 or HEC-22;
- Change Orders;
- Force Account Work Orders;
- Written Orders and Authorizations Issued by the Department;
- All Other Programmatic Plans or any Other Documents;
- All Material Included by Reference in any of the above Documents.
- The Department Material and Test Standard Operating Procedures.

3. **FEDERAL PUBLICATIONS** (using latest approved versions):
  - a. Manual on Uniform Traffic Control Devices
  - b. Highway Capacity Manual
  - c. Urban Transportation Operations Training – Design of Urban Streets, Student Workbook
  - d. Reference Guide Outline – Specifications for Aerial Surveys and Mapping by Photogrammetric Methods for Highways
  - e. FHWA Federal-Aid Policy Guide
  - f. Technical Advisory T6640.8A
  - g. U.S. Department of Transportation Order 5610.1E
  - h. Geometric Geodetic Accuracy Standards and Specifications for Using GPS Relative Positioning Techniques
  - i. ADAAG Americans With Disabilities Act Accessibility Guidelines
  - j. Roundabout Design Guide
  
4. **MISCELLANEOUS PUBLICATIONS AND STANDARDS**
  - a. Manual for Railway Engineering - American Railway Engineering and Maintenance of Right-of-Way Association (AREMA)
  - b. ASTM
  - c. Electronics Industries Alliance (EIA)
  - d. Roadway Lighting, ANSI Approved RP-8-00 - Illuminating Engineering Society of North America
  - e. Life Safety Code - National Fire Protection Agency (NFPA)
  - f. National Electric Code - National Fire Protection Agency (NFPA)
  - g. U.S. Army Corp of Engineers
  - h. National Transportation Communications for ITS Protocol Standards (NTCIP)
  
5. **AREA**
  - a. Manual for Railway Engineering

## APPENDIX G: DEFINITIONS

- 1) AASHTO - American Association of State Highway & Transportation Officials
- 2) ADT - Average Daily Traffic in Number of Vehicles
- 3) ADAAG - Americans with Disabilities Accessibility Act Guidelines
- 4) BAMS - Bid Analysis and Management Systems
- 6) CATEX - Categorical Exclusion
- 7) DESIGN CONSULTANT - Consultant for this project
- 8) CONTRACTOR - The selected Proposer that has ranked the highest of all proposers in the Technical Proposal, Interview, and Cost Proposal Sections of the selection process.
- 9) C/PM/Consultant Project Manager – The Consultant Engineer responsible for combining the various inputs in the process of completing the project plans and managing the consultant design effort.
- 10) CMGC/PM/Contractor Project Manager – The Contractor Project Manager, also known as the Construction Manager/General Contractor, is the firm responsible for completing all CM/GC services on this project.
- 11) CM/GC - Construction Manager/General Contractor
- 12) DBE - Disadvantaged Business Enterprise
- 13) EA- Environmental Assessment
- 14) EEMA - Engineering Estimates and Market Analysis
- 15) EIS - Environmental Impact Study
- 16) FHPG - Federal Aid Highway Policy Guide
- 17) FHWA - Federal Highway Administration
- 18) FIR - Field Inspection Review
- 19) FONSI - Finding of No Significant Impact
- 20) FOR - Final Office Review
- 21) GMP - Guaranteed Maximum Price
- 22) GPS - Global Positioning System

- 23) FHPG - Federal Aid Highway Policy Guide
- 24) FHWA - Federal Highway Administration
- 25) FIR - Field Inspection Review
- 26) FONSI - Finding of No Significant Impact
- 27) FOR - Final Office Review
- 28) GMP - Guaranteed Maximum Price
- 29) GPS - Global Positioning System
- 30) ICE - Independent Cost Estimator/Estimate
- 31) MPO - Metropolitan Planning Organization
- 32) MS4 - Municipal Separate Storm Sewer System
- 33) NEPA - National Environment Policy Act
- 34) NGS - National Geodetic Survey
- 35) NICET - National Institute for Certification in Technology
- 36) NOAA - National Oceanic and Atmospheric Administration
- 37) OPCC - The Opinion of Probable Construction Cost is the actual construction cost to the CM/GC to build all aspects of a 100% Plans, Specifications, and Estimate Package. These are required at established milestones for each phase, procurement, or construction package
- 38) PE - Professional Engineer registered in Tennessee
- 39) PEIS - Programmatic Environmental Impact Statement
- 40) PM - Project Manager
- 41) PLS - Professional Land Surveyor registered in Tennessee
- 42) PRT - Project Review Team
- 43) PS&E - Plans, Specifications and Estimate
- 44) PROJECT - The work defined by a scope of work.
- 45) PROPOSER - Contractor or Joint Venture



- 46) Range Limit of Construction Cost – The range of actual cost of construction that includes construction services staff, the CM/GC Management Fee, labor, materials and equipment, mobilization, and all other costs of the actual construction of the work.
- 47) ROD - Record Of Decision
- 48) ROR - Region Office Review
- 49) ROW - Right-of-Way: A general term denoting land, property, or interest therein, Usually in a strip acquired for or devoted to a highway
- 50) ROWPR - Right-of-Way Plan Review
- 51) TDOT/PM - Tennessee Department of Transportation Project Manager – The TDOT Civil Engineer who is responsible for the day-to-day direction and Design Consultant coordination of the design effort, and responsible for the satisfactory completion of the contract by the construction Manager (CM).
- 52) TOPOGRAPHY - In the context of TDOT plans, topography normally refers to existing cultural or man-made details
- 53) UD & FCD - Urban Drainage and Flood Control District
- 54) USCOE - United States Army Corp of Engineers

Note: For other definitions and terms, refer to Section 101 of the TDOT Standard Specifications for Road and Bridge Construction and the TDOT Design Guidelines.

CM/GC QUESTION REQUEST  
FORM QR

PROJECT: 19005-4160-04

DATE:

RFP Section ID	Question	Reserved for Agency Response