

ADVERTISEMENT FOR ENGINEERING AND RELATED SERVICES

March 26, 2020

CONTRACT NO. 4400019293

**IDIQ CONTRACT FOR INDEPENDENT COST ESTIMATING (ICE) SERVICES
STATEWIDE**

DBE GOAL = 2%

Under the authority granted by Title 48 of Louisiana Revised Statutes, the Louisiana Department of Transportation and Development (DOTD) hereby issues this advertisement for consulting firms to provide engineering and related services. **Consultants who are a Louisiana or foreign LLC or corporation should be appropriately registered with the Louisiana Secretary of State, as contemplated by Title 12 of the Louisiana Revised Statutes, and with the Louisiana Professional Engineering and Land Surveying (LAPELS) Board under its rules for firms. If a consultant is not in good standing in accordance with those provisions, it may be subject to consequences contemplated in Title 12 and/or the LAPELS rules. All requirements of LAPELS must be met at the time the proposal is submitted. Prime consultants must be registered with the Federal Government using SAM.gov prior to contract execution.**

One (1) proposal will be selected for each contract solicited per this advertisement. Only one (1) DOTD Form 24-102 proposal is required for this advertisement, and it represents the prime consultant's qualifications and those of any and all sub-consultants proposed to be used for the referenced contract(s). All identifying contract number(s) should be listed in Section 2 of the DOTD Form 24-102.

Any questions concerning this advertisement must be sent in writing to DOTDConsultantAds80@la.gov no less than 48 hours (excluding weekends and holidays) prior to the proposal deadline.

SCOPE OF SERVICES

The general tasks that the consultant may be required to perform are described more specifically in Attachment A, which is incorporated herein by reference. The selected consultant will perform the specific services covered in an Indefinite Delivery/Indefinite Quantity (IDIQ) contract as detailed in individual Task Orders (TOs), which will specify TO-specific scope of services, contract time, and compensation.

The consultant shall perform the work in accordance with the requirements of this advertisement, the resulting contract, and any TOs issued thereunder. Deliverables shall be in such format as required in Attachment A, unless otherwise specified in an individual TO. The work performed by the consultant shall be performed in a manner consistent with that degree of care and skill ordinarily exercised by members of the same profession currently practicing under similar circumstances.

MINIMUM PERSONNEL REQUIREMENTS (MPRs)

The requirements set forth in Attachment B must be met at the time the proposal is submitted.

EVALUATION CRITERIA

The criteria to be used by DOTD in evaluating responses for the selection of a consultant to perform these services are listed below:

1. consultant's firm experience on similar projects, weighting factor of four (4);
2. consultant's staff experience on similar projects, weighting factor of five (5);

Project Category Weighting - Specialty

THE FOLLOWING TABLE MUST BE COMPLETED AND INCLUDED IN SECTION 11 OF THE PRIME CONSULTANT'S DOTD FORM 24-102 PROPOSAL.

Identify the percentage of work for the <u>overall contract</u> to be performed by the prime consultant and each sub-consultant.							
	% of Overall Contract	Prime	Firm B	Firm C	Firm D	Firm E	Firm F
Percent of Contract	100%						

Consultants will be evaluated as set forth in the "Evaluation Criteria" section of this advertisement. The evaluation will be by means of a point-based rating system. Each of the above criteria will receive a rating on a scale of one (1) through five (5). The rating will then be multiplied by the corresponding weighting factor. The firm's rating in each category will then be added to arrive at the consultant's final rating.

If sub-consultants are used, the prime consultant must perform a minimum of 51% of the work for the overall contract. The prime consultant and each sub-consultant will be evaluated on their part of the contract. The individual prime consultant and sub-consultant ratings, proportional to the amount of their work, will then be added to arrive at the total consultant rating.

DOTD's Project Evaluation Team will be responsible for performing the above described evaluation, and will present a shortlist of the three (3) (if three are qualified), highest rated consultants to the Secretary of DOTD. The Secretary will make the final selection.

RULES OF CONTACT

These rules are designed to promote a fair and unbiased selection process. DOTD is the single source of information regarding the contract selection. Any official correspondence will be in writing, and any official information regarding the contract will be disseminated by DOTD's designated representative via the DOTD website. The following rules of contact will apply during the contract selection process, commencing on the advertisement posting date and ceasing at the

time of final contract selection. Contact includes face-to-face communication, the use of a telephone, facsimile, electronic mail (email), or formal or informal written communications with DOTD. Any contact determined to be improper, at the sole discretion of DOTD, may result in the rejection of the proposal (i.e., DOTD Form 24-102).

Consultants and consultant organizations shall correspond with DOTD regarding this advertisement only through the email address designated herein; DOTDConsultantAds80@la.gov and during DOTD sponsored one-on-one meetings.

No consultant, or any other party on behalf of a consultant, shall contact any DOTD employee, other than as specified herein. This prohibition includes, but is not limited to, the contacting of: department heads, members of the evaluation teams, and any official who may participate in the decision to award the contract resulting from this advertisement.

DOTD will not be responsible for any information or exchange that occurs outside the official process specified above.

By submission of a proposal to perform services pursuant to this advertisement, the consultant agrees to the communication protocol herein.

No protest or appeal will be entertained unless made in accordance with the procedures found on DOTD's website, which are incorporated herein by reference and can be accessed at: http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/CCS/Pages/Process_Procedures.aspx.

CONTRACT TIME

This IDIQ contract shall be in effect for **five (5) years**. **All TOs must be completed by the termination date of the IDIQ contract.** No TO will be initiated unless sufficient contract time remains to complete the TO.

COMPENSATION

The maximum compensation payable to the consultant under each IDIQ contract shall not exceed **\$3,000,000**. Compensation to the consultant for services rendered in connection with each TO may be made on the basis of lump sum, actual cost plus a fixed fee, cost per unit of work, or specific rates of compensation, as specified in each TO, subject to the limitation set forth in the IDIQ contract.

Compensation may be either negotiated or non-negotiated as determined by DOTD for each individual TO. When the compensation is negotiated, it will be determined by DOTD based on work hours negotiated between DOTD and the consultant. After notification of selection, a kick-off meeting will be held with the selected consultant and appropriate DOTD personnel. The selected consultant will be required to submit a work hour proposal. All negotiations must be completed within the timeframe set forth in the Consultant Contract Services Manual, unless an abbreviated timeframe is specified in writing by the PM.

DIRECT EXPENSES

To the extent that the consultant is allowed to claim reimbursement for direct expenses, all direct expense items which are not paid for in the firm's indirect cost rate and which are needed and will be consumed during the life of the contract must be identified by the consultant during contract development. Standard equipment or resources to be used in the provision of services rendered for this contract will not be considered for payment under direct expenses.

The consultant should own most of the equipment required to provide the work and services. The cost of this equipment should be included in the consultant's indirect cost rate. Equipment may be considered "specialized" if it cannot be considered standard equipment for that particular consultant's normal operating business needs. If a consultant believes special equipment is needed for the contract, the consultant must inquire through the Question and Answer process, as provided herein, whether the identified item will be considered specialized equipment for the individual contract.

To the extent that direct expenses are authorized to be compensated pursuant to a particular TO, all travel related expenses will be compensated under direct expenses, and will be in accordance with the most current Louisiana Office of State Travel regulations as promulgated in the Louisiana Administrative Code under the caption "PPM No. 49", with the exception that compensation for vehicle usage will be based on actual miles traveled directly and exclusively related to project needs. Vehicle rental rates will require prior approval from the PM.

QUALITY ASSURANCE/QUALITY CONTROL

DOTD requires the selected consultant and all sub-consultants to develop a Quality Assurance/Quality Control (QA/QC) program in order to provide a mechanism by which all deliverables will be subject to a systematic and consistent review. The selected consultant shall address in its plan the review of all sub-consultant work and deliverables. The selected consultant must submit their QA/QC plan to the DOTD PM within 10 business days of the award notification to the consultant. Consultants must ensure quality and adhere to established DOTD policies, procedures, standards and guidelines in the preparation and review of all deliverables. DOTD may provide limited input and technical assistance to the consultant. Any deliverables to be transmitted by the consultant shall be transmitted with a DOTD Quality Assurance/Quality Control Checklist, and a certification that the deliverables meet DOTD's quality standards.

If Attachment A includes specific QA/QC requirements that contradict those set forth above, the requirements in Attachment A control.

TRAFFIC ENGINEERING PROCESS AND REPORT TRAINING REQUIREMENTS

As part of DOTD's on-going commitment to high quality traffic engineering reports, a traffic engineering training course must be taken by traffic engineering PEs and EIs in order to be eligible to work on DOTD projects. For consultants performing traffic engineering services (i.e., traffic analysis throughout all DOTD project stages), appropriate personnel must successfully complete the three (3) modules of the Traffic Engineering Process and Report Course offered by Louisiana

Transportation Research Center (LTRC) . This Course must be completed no later than the time the proposal is submitted. Copies of training certificates are to be included in the proposal. It will be the prime consultant's responsibility to ensure their staff and sub-consultants complete the training. Copies of training records may be obtained from the LTRC website <https://registration.ltrc.lsu.edu/login>.

WORK ZONE TRAINING REQUIREMENTS

As part of DOTD's on-going commitment to work zone safety, required work zone training courses must now be taken every four (4) years in order for personnel to remain eligible to work on DOTD projects. For consultants performing preconstruction services (*i.e.*, design, survey, subsurface utility, geotechnical, traffic, bridge inspection, environmental services), appropriate personnel must successfully complete these courses. In general, the person in responsible charge of traffic control plans shall be required to have Traffic Control Supervisor training. For preconstruction field services performed within the clear zone, at least one (1) member of the field crew shall have Traffic Control Supervisor or Traffic Control Technician training. The consultant should identify all personnel listed in the staffing plan for the contract who have completed the appropriate work zone training courses. **The consultant shall explain in Section 16 of DOTD Form 24-102 how they plan to meet the work zone requirements.** All preconstruction work zone training requirements shall be met **prior to contract execution**. It will be the prime consultant's responsibility to ensure their staff and sub-consultants have the appropriate work zone training.

In addition to the above requirements, if the Scope of Services set forth in Attachment A includes Construction Engineering and Inspection (CE&I), the following training requirements shall be met **at the time the proposal is submitted**:

Field Engineers:	Traffic Control Technician Traffic Control Supervisor Flagger
Field Engineer Interns:	Traffic Control Technician Traffic Control Supervisor Flagger
Field Senior Technicians, Survey Party Chiefs, and SUE Worksite Traffic Supervisors*:	Traffic Control Technician Traffic Control Supervisor Flagger
Other Field Personnel*:	Traffic Control Technician Flagger

* excluding Asphalt Plant Inspector, Paint Managers, and Paint Inspectors

Approved courses are offered by ATSSA and AGC. Substitutes for these courses must be approved by the DOTD Work Zone Task Force. For more information, please contact Barry Lacy at 225-379-1584. Specific training course requirements are:

- Flagger: Successful completion every four (4) years of a work zone flagger course approved by the Department. The “DOTD Maintenance Basic Flagging Procedures Workshop” is not an acceptable substitute for the ATSSA and AGC flagging courses.
- Traffic Control Technician (TCT): Successful completion every four (4) years of a work zone traffic control technician course approved the Department. After initial successful completion, it is not necessary to retake this course every four (4) years if Traffic Control Supervisor training is completed every four (4) years.
- Traffic Control Supervisor (TCS): Successful completion of a work zone traffic control supervisor course approved by the Department. Following an initial completion, traffic control supervisors must either complete a one (1)-day TCS refresher course or retake the original two (2)-day TCS course every four (4) years.

ATSSA contact information: (877) 642-4637

REFERENCES

All services and documents will meet the standard requirements as to format and content of DOTD and will be prepared in accordance with the latest applicable editions, supplements, and revisions of the following:

1. AASHTO Standards – <https://www.transportation.org/>
2. ASTM Standards – <https://www.astm.org/BOOKSTORE/BOS/index.html>
3. DOTD Test Procedures – http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Materials_Lab/Pages/Menu_TPM.aspx
4. DOTD Location and Survey Manual – http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/LocationSurvey/Manuals%20and%20Forms/Location_and_Survey_Manual.pdf
5. Addendum “A” to the Location & Survey Manual – http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/LocationSurvey/Manuals%20and%20Forms/Location%20and%20Survey%20Manual%20-%20Addendum%20A.pdf
6. DOTD Roadway Design Procedures and Details – http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Road_Design/Pages/Road-Design-Manual.aspx

7. DOTD Design Guidelines –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Road_Design/Memoranda/Minimum%20Design%20Guidelines.pdf
8. DOTD Hydraulics Manual –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Public_Works/Hydraulics/Documents/Hydraulics%20Manual.pdf
9. Louisiana Standard Specifications for Roads and Bridges –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Standard_Specifications/Pages/Standard%20Specifications.aspx
10. Manual on Uniform Traffic Control Devices (Non-DOTD Link) –
<http://mutcd.fhwa.dot.gov/>
11. DOTD Traffic Signal Design Manual –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Traffic_Engineering/Traffic%20Control/Traffic%20Signal%20Manual%20V2.0%205-28-2015.pdf
12. National Environmental Policy Act (NEPA)
13. DOTD Stage 1 Planning/Environmental Manual of Standard Practice - http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Environmental/Pages/Stage_1.aspx
14. National Electrical Safety Code
15. National Electrical Code (NFPA 70)
16. A Policy on Geometric Design of Highways and Streets (AASHTO) –
https://bookstore.transportation.org/collection_detail.aspx?ID=110
17. DOTD Construction Contract Administration Manual –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Pages/Engineering_Docs.aspx
18. DOTD Materials Sampling Manual –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Materials_Lab/Pages/Menu_MSM.aspx
19. DOTD Bridge Design Manual –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Bridge_Design/Pages/BDEM.aspx
20. Consultant Contract Services Manual –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/CCS/Manuals/CCS%20Manual%202017.pdf
21. Bridge Inspector’s Training Manual –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Operations/BridgeMaintenance/Pages/Documents-and-Manuals.aspx
22. Federal Aid Off-System Highway Bridge Program Guidelines –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Bridge_Design/Manuals/Other%20Manuals%20-%20Guidelines/Federal%20Aid%20Off-System%20Highway%20Bridge%20Program%20Guidelines.pdf

23. Code of Federal Regulations 29 CFR 1926 (OSHA)
24. Complete Streets –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Multimodal/Highway_Safety/Complete_Streets/Pages/default.aspx
25. Traffic Engineering Manual -
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Traffic_Engineering/Misc%20Documents/Traffic%20Engineering%20Manual.pdf
26. Traffic Engineering Process and Report –
http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/Traffic_Engineering/Publications/Pages/Process%20and%20Report.aspx
27. AREMA: American Railway Engineering and Maintenance-of-Way Association, Manual for Railway Engineering (2019 ed.) – https://www.arema.org/AREMA_MBRR/AREMA_MBRR/AREMAStore/MRE.aspx

CONTRACT EXECUTION REQUIREMENTS

The selected consultant will be required to execute the contract within ten (10) days after receipt of the contract.

A sample of the contract provisions can be found at the following link: http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/CCS/Pages/Advertisements.aspx.

DBE - The selected consultant shall have a Disadvantaged Business Enterprise (DBE) goal of **2%** of the contract fee. DBE participation will be limited to the firms certified pursuant to the Louisiana Unified Certification Program. For convenience, DOTD provides a list on its website (<http://www8.dotd.la.gov/UCP/UCPSearch.aspx>) of firms that have been certified as eligible to participate as DBEs on US DOT assisted contracts. This list is not an endorsement of the quality of performance of any firm but is simply an acknowledgment of the listed firms' eligibility as a DBE. DOTD makes no representations of the accuracy or completeness of this list on any particular date or time. Prime consultants considering the use of a particular DBE sub-consultant are advised to obtain documentation of certification status from that sub-consultant. Credit will only be given for use of DBEs that are certified by the Louisiana Unified Certification Program.

Prime consultants must specify by firm name in Section 10 on the DOTD Form 24-102 all DBE firms which the prime intends will participate in providing services under the contract to meet the DBE goal and indicate for each the percent of the contract fee for the services that will be performed by each specified DBE firm. If the prime did not succeed in obtaining enough DBE participation to meet the goal, it must attach to the DOTD Form 24-102, behind Section 17, documentation of its good faith efforts to meet the goal.

SECONDARY SELECTION PROCESS

When multiple IDIQ contracts with similar scopes of service are available within a DOTD Section that is prepared to issue a TO, the TO selection procedures set forth in Attachment C shall be used to award that TO. Documentation of the selection process shall be retained by DOTD.

REVISIONS TO THE ADVERTISEMENT

DOTD reserves the right to revise any part of the advertisement by issuing addenda to the advertisement at any time. Issuance of this advertisement in no way constitutes a commitment by DOTD to award a contract. DOTD reserves the right to accept or reject, in whole or part, all DOTD Form 24-102s submitted, and/or cancel this consultant services procurement if it is determined to be in DOTD's best interest. All materials submitted in response to this advertisement become the property of DOTD, and selection or rejection of a proposal does not affect this right. DOTD also reserves the right, at its sole discretion, to waive administrative informalities contained in the advertisement.

CLARIFICATIONS

DOTD reserves the right to request clarification of ambiguities or apparent inconsistencies found within any proposal, if it is determined to be in DOTD's best interest.

PROPOSAL REQUIREMENTS

One (1) original (**stamped "original"**) and **five (5)** copies of the consultant's response to this advertisement must be submitted to DOTD on the most current version of the DOTD Form 24-102 (available at http://bit.ly/CCS_ManualsFormsAgreements) along with an electronic copy (USB flash drive only) in a searchable Portable Document Format (PDF). All proposals must be in accordance with the requirements of this advertisement, and the Consultant Contract Services Manual. Unless otherwise stated in this advertisement, copies of licenses and certificates are not required to be submitted with the proposal.

If more than one (1) contract is to be selected based on this advertisement, no prime consultant is allowed to be a sub-consultant on any other consultant's 24-102. If a prime consultant is submitted as a sub-consultant on another consultant's 24-102, its proposal as a prime consultant may be deemed non-responsive.

Any consultant failing to submit any of the information required on the DOTD Form 24-102, or providing inaccurate information on the DOTD Form 24-102, may be considered nonresponsive.

DOTD employees may not submit a proposal, nor be included as part of a consultant's proposal.

Any sub-consultants to be used in performance of this contract, must also submit a DOTD Form 24-102, which is completely filled out and contains all information pertinent to the work to be performed. The sub-consultant's DOTD Form 24-102 must be firmly bound to the prime consultant's DOTD Form 24-102.

Contract and/or part-time employees are allowed. Such employees should be shown in Section 12 of the DOTD Form 24-102 with an asterisk denoting their employment status.

The DOTD Form 24-102 should be identified with **contract number 4400019293**, and shall be submitted **prior to 3:00 p.m. CST on Thursday, April 16, 2020**, by hand delivery or mail, addressed to:

Department of Transportation and Development
Attn.: Darlene Major
Consultant Contract Services Administrator
1201 Capitol Access Road, **Room 405-E**
Baton Rouge, LA 70802

Phone: (225) 379-1025

ATTACHMENT A – SCOPE OF SERVICES

DOTD has the general authority to utilize the Construction Manager at Risk (CMAR) project delivery method for projects at its discretion. The CMAR delivery method allows DOTD to engage a contractor (Construction Manager or CM) during the design process to provide input on the design. During the design phase, the Construction Manager provides advice including, but not limited to, scheduling, pricing, and construction methodology and phasing to help develop a project that provides the greatest value to DOTD. When design (or portion thereof) is complete, the CM becomes the General Contractor (GC) and constructs the project.

This advertisement is for the procurement of a team to provide Independent Cost Estimating (ICE) services and schedule review as described under Scope of Services below. A Consultant will provide these services for projects as chosen by DOTD in support of the CMAR project delivery method, but may also be used to provide cost estimating services for other projects as directed. DOTD, Design Team, CMAR Contractor, and ICE Consultant are collectively a team committed to delivering a Project that meets DOTD's needs, within budget and schedule, at a reasonable and appropriate cost to DOTD.

The ideal ICE will not only have extensive CMAR ICE experience but will also have experience in similar challenging heavy civil projects. Experience with risk informed decision making is an additional positive factor.

Administrative and General Information

The Consultant shall provide cost estimating and scheduling services in support of projects utilizing the CMAR delivery method or on other projects as tasked by DOTD. The ICE Consultant is expected to collaborate with DOTD Project Management Team, Design Team, and CMAR Contractor. The ICE Consultant will provide cost estimating services at project delivery milestones as identified in the contract. The cost estimating support should include but not be limited to: verify/take-off quantities, prepare project estimates, material cost forecasting, construction phasing review, provide input on risks associated with the construction and proposal of any constructability or value engineering or scheduling comments that are evident during the course of the estimating work. The ICE Consultant (in coordination with the CMAR Contractor) may provide intermediate estimating support to the engineering team for design alternatives and/or construction packages throughout the design phase.

The goals and objectives of this ICE Contract are to:

- Ensure that the Cost Estimating subject matter expertise needed to assist DOTD in planning, facilitating, and managing the progressive cost estimating process is available during the design and pre-construction phase to enable DOTD to understand funding requirements and inform its decision making.
- Ensure the cost estimates completed by the CMAR Contractor and Design Team are as accurate and complete as possible based on the level of design details available to reduce the risk to the Project budget.

- Ensure that the Cost Estimates completed for each project are developed in accordance with appropriate industry standards, understood by DOTD, and provide a fair and reasonable estimation of the cost to construct the project.

Work will be performed through individual task orders on an as-needed basis.

Required Staffing

The Consultant's personnel shall be capable of performing the types of work described in the "Scope of Services" with minimal instructions:

1. **Project Manager** who manages the contract, and oversees the Consultant team. This person assures all contract terms and conditions are followed by the Consultant's team. This person is also the leader of the technical work responsible for the quality of the work performed by the Consultant's team.
2. **Lead Estimator** who provides cost estimating services for the project as a whole or may also manage discipline specific estimators.
3. **Discipline Specific Estimator(s)** to provide cost estimating services on an "as needed" basis as required by DOTD or as recommended by the Lead Estimator. The Discipline Specific Estimator(s) may have specific expertise such as structural, geotechnical, earthwork, etc., estimating.
4. **Scheduler(s)** to provide project scheduling services (creation or review) on an "as needed" basis.

Scope of Services

When assigned by DOTD's Project Manager, the Consultant will complete the following tasks, including but not limited to:

General Administration and Coordination

The ICE Consultant shall coordinate with DOTD, Design Team, CMAR Contractor (and others as needed) and maintain a cooperative attitude throughout the life of the project.

The Consultant's Project Manager will manage the Consultant's project team. Services performed under the contract management task include, but are not limited to supervision of all work performed for this project; quality of work; communication with team members; project accounting, project opening, monthly invoicing in accordance with DOTD standards, project closeout; and communication with DOTD.

The general administration and coordination activities to be performed by the ICE Consultant are anticipated but not limited to the following:

- The ICE Consultant shall supply staff to coordinate and support the project at each milestone estimate.
- The ICE Consultant shall become thoroughly familiar with the site and conditions surrounding the site and shall document the conditions observed on the site.
- The ICE Consultant shall perform field visits and activities, as required by DOTD.

- The ICE Consultant shall become familiar with local labor rates and labor conditions/availability.
- Consultant team members will be required to attend project meetings throughout the life of the project. Attendance at meetings will be as directed by DOTD PM to insure that the appropriate members are at meetings while also managing the efficient utilization of resources. Meeting attendance may be limited to those who can appropriately communicate meeting outcomes to other team members. In preparation for meetings, the Consultant may be required review existing plans and information on the project provided by DOTD. Typical meetings may include:
 - Kickoff meetings
 - Partnering Workshop
 - Cost Approach Meetings
 - Project Risk Workshops
 - Project Schedule Workshops
 - Design Review Meetings
 - Value Analysis/Review Meetings
 - OPCC Review Meetings
 - Price Agreement Meetings

Cost Estimates and Cost Estimating Support

The ICE Consultant will provide cost estimating services at each of the project design milestones as directed by the DOTD Project Manager. Typical design milestones are described in following sections. The cost estimating support should include but not be limited to:

- Verify/take-off quantities, prepare project estimates, material cost forecasting, construction phasing review, provide input on risks associated with the construction and proposal of any constructability or value engineering or scheduling comments that are evident during the course of the estimating work.
- The ICE Consultant (in coordination with the CMAR Contractor) may provide intermediate estimating support to the engineering team for design alternatives and/or construction packages beginning with at the BOD stage and continuing throughout the design phase.
- The ICE Consultant shall conform the estimates to ACEI (Association for the Advancement of Cost Engineers International) Recommended Practice No. 18R-97.

Typical Milestone Tasks and Services

Basis of Design (BOD) (15%) Milestone

The ICE Consultant will provide a review of the Design Team's BOD estimate and provide feedback on the adequacy of the current project budget. Additionally, as part of the BOD phase, the ICE Consultant will:

- Conduct a meeting with DOTD Program Management team, E&D and CMAR Contractor to establish baseline production rate assumptions and standards for formulation of future cost estimates and schedule estimates.

- Work with DOTD/PMT to develop and align the work breakdown structure (WBS) which will be carried forward for future cost estimates.
- Work with DOTD/PMT to develop the format for the progressive estimates.

30% Design Milestone

The scope for this milestone will commence with an early 25% design snapshot provided by the Design Team.

- The ICE Consultant's estimate shall be a detailed estimate and shall be accompanied by a Basis of Estimate Report.
- An Estimate Variance Report will be produced by the ICE Consultant during this milestone.
- DOTD may request the ICE Consultant to assist in estimate reconciliation.

60% Design Milestone

The scope for this milestone will commence with an early 50% design snapshot from the Design Team.

- The ICE Consultant's estimate shall be detailed estimate and shall be accompanied by a Basis of Estimate Report.
- An Estimate Variance Report will be produced by the ICE Consultant during this milestone.
- DOTD may request the ICE to assist in estimate reconciliation.

90% Design Milestone

The scope for this milestone will commence with an early 80% design snapshot from the Design Team.

- The ICE Consultant's estimate shall be detailed estimate and shall be accompanied by a Basis of Estimate Report.
- An Estimate Variance Report will be produced by the ICE during this milestone.
- DOTD may request the ICE Consultant to assist in estimate reconciliation.

Additional Tasks on an as-needed basis:

These tasks are not associated with a design milestone, but the consultant may be tasked to provide the following services:

GMP Review

- The CMAR Contractor will submit a Guaranteed Maximum Price (GMP) to DOTD after the 90% milestone.
- The ICE Consultant may be tasked by DOTD to provide independent estimating support during the process of GMP review and negotiation.

Cost Estimating Support During Construction

- The CMAR Contractor is required to develop and utilize an "open book" accounting system during the Pre-Construction and Construction Phases of this project and to track

and report the actual cost of construction work performed as compared to the Guaranteed Maximum Price (GMP) on a monthly basis. The CMAR Contractor may also be entitled to an equitable adjustment of the GMP in accordance with the terms of their contract.

- The ICE Consultant may be tasked by DOTD to provide independent estimating to support a cost reasonableness analysis of any work performed or proposed and/or the negotiation of any proposed adjustment to the GMP.

Constructability Review, Schedule Review and Value Engineering

The ICE Consultant will not be tasked with a full, independent constructability or value engineering review. However, the ICE Consultant may be asked to provide input on risks associated with the construction and proposal of any constructability or value engineering or scheduling comments that are evident during the course of the estimating work. DOTD does expect that any comments and or recommendations that arise out of the estimating services related to these functions would be shared by the ICE Consultant.

The ICE Consultant may be tasked with a full, independent construction schedule review.

Deliverables

The ICE consultant shall provide the following deliverables with each milestone submittal:

Estimate

The ICE Consultant is expected to use commercial off-the-shelf (COTS) estimating software to prepare its independent cost estimate. The estimating software Sage Timberline®, MC2®, HCSS, and US Cost Success® are acceptable software to be used to create the construction cost estimate.

Basis of Estimate Report

Each estimate shall be accompanied by a Basis of Estimate (BOE) report. The BOE report shall include the following minimum components:

- Narrative including assumptions and clarifications
- WBS breakdown by facility, discipline, bid group or subcontract package
- Material quantity take offs
- Unit prices
- Labor and equipment rates
- Labor and equipment production rates
- Subcontractor costs
- Scope assumptions and clarifications
- Identification of long lead procurement items (equipment, materials and supplies)
- Mark Ups consistent with CMAR delivery
- Provide any market pricing received from material suppliers and/or subcontractors

Estimate Variance Report

In addition to the ICE Consultant's estimates, an estimate will be provided by the Design Team and the CMAR Contractor at the 30%, 60% and 90% milestones. The ICE Consultant will be responsible for reviewing and comparing the three estimates and preparing a variance report at the

30%, 60%, and 90% milestones for DOTD to document, at a minimum, any significant differences between the estimates.

As part of this report, the ICE Consultant shall produce a narrative and chart showing the major cost changes and explaining the reasons for the change between the other estimates submitted at this phase. The amount of detail shown in this section of the variance report will be commensurate with the size, complexity, and severity or magnitude of the scope change. If the estimate requires a second resubmittal, the report may require updating.

ASTM E1804, “Standard Practice for Performing and Reporting Cost Analysis during the Design Phase of a Project,” outlines the correct way to display cost estimates. This following is an example of this specific format:

Division of Work	ICE Estimate	Estimate X	Variance Dollars	Variance Percentage
Sitework	\$250,000	\$275,000	+\$25,000	+9.1%
Concrete	\$525,000	\$475,000	-\$50,000	-10.5%

All estimate’s will be submitted to DOTD via an Excel format spreadsheet with bid item descriptions, quantities and units.

DOTD Review of Deliverables

DOTD staff will review the Task Order deliverables and provide comments within 15 calendar days of receipt of the Consultants’ submittal.

All project files and deliverables created under this agreement will be compiled and provide to DOTD at the conclusion of the agreement.

PROJECT TIME

The overall time for the completion of the scope of services shall be determined in coordination with and approved by the DOTD Project Manager.

ELECTRONIC DELIVERABLES

Consultant hereby agrees to produce electronic deliverables in conformance with DOTD Software and Deliverable Standards for Electronic Plans document in effect as of the effective date of the most recent contract action or modification, unless exempted in writing by the Project Manager. Consultant is also responsible for ensuring that sub-consultants submit their electronic deliverables in conformance with the same standards. DOTD Software and Deliverable Standards for Electronic Plans document and DOTD CAD Standards Downloads are available via links on DOTD web site.

Consultant shall apply patches to CAD Standard Resources and install incremental updates of software as needed or required. Consultant hereby agrees to install major updates to software versions and CAD Standard Resources in a timely manner. Major updates of CAD standards and software versions shall be applied per directive or approval of the DOTD Design Automation Manager. Such updates will not have a significant impact on the plan development time or project delivery date, nor will they require Consultant to purchase additional software. Prior to proceeding

with plan development, Consultant shall contact the Project Manager for any special instructions regarding project-specific requirements.

In the event that any Digital Plan Delivery Standard conflicts with written documentation, including DOTD plan-development Manuals, the Digital Plan Delivery Standard governs. Consultant is responsible for contacting the Project Manager should questions arise.

Consultant shall upload (or check in) electronic deliverables directly into the DOTD ProjectWise repository at each plan delivery milestone. Consultants are responsible for performing certain operations at each milestone including, but not limited to, the following:

- Upload (or check in) CAD plan deliverables to the discipline “Plans” folder
- Apply and maintain indexing attributes to CAD plans (and other deliverables as needed)
- Publish PDF format plan submittals in ProjectWise using automated publishing tools
- Digitally sign PDF format plan submittals in ProjectWise according to DOTD standards and procedures (Final Plans, Revisions and Change Orders). Signatures shall be applied in signature blocks provided with electronic seals and Title Sheets.

Additionally, after reviewing deliverables for each submittal milestone, the Project Manager shall notify Consultant regarding the availability of two automatically-generated informational reports in ProjectWise. These reports document the completion status and other information regarding indexing attributes and CAD standards. Consultants shall take these reports into account and make any necessary adjustments to plans before the next submittal milestone; or sooner, if directed by the Project Manager.

ATTACHMENT B – MINIMUM PERSONNEL REQUIREMENTS (MPRs)

The following requirements must be met at the time the proposal is submitted:

1. **Project Manager:** At least one (1) project manager shall have a minimum of ten (10) years of experience in responsible charge of managing heavy civil projects. The project manager shall have the following:
 - A degree in Construction Management, Civil Engineering or in a related field; and
 - Shall have a minimum of ten (10) experience in Field Operations Management and Estimating from a Contractor's Perspective.
 - It is preferred that the Project Manager have experience with alternative delivery projects (Design-Build, CMAR) and have experience in management of relevant transportation projects.
2. **Lead Estimator:** At least one (1) lead estimator shall have a minimum of twenty (20) years of hard bid general estimating experience, of which ten (10) years of experience shall have been as the lead estimator. The lead estimator shall have the following:
 - A degree in Construction Management, Civil Engineering or in a related field; and
 - It is preferred that the Lead Estimator have experience with alternative delivery projects (Design-Build, CMAR) and have experience as the lead estimator of relevant transportation projects.
3. **Discipline Specific Estimator(s)** – At least one (1) Cost Estimator with a minimum of ten (10) years of experience in estimating complex highway projects from the perspective of a contractor. Additional experience developing estimates as an independent estimator for a transportation agency utilizing the CMAR or other similar methodology is desirable.
4. **Scheduler(s)** – At least one (1) Scheduler shall have a minimum of five (5) years of experience in developing critical path method schedules for contractors on complex transportation projects and five (5) years of experience of schedule management on major urban project.
 - Be proficient in standard off the shelf (OTS) construction scheduling software such as Primavera or MS Project or similar. Additional experience developing schedules as an independent scheduler for a transportation agency utilizing the CMAR or other similar methodology is desirable.

MPRS ARE TO BE MET BY SEPARATE INDIVIDUALS, UNLESS STATED OTHERWISE BELOW.

MPR Nos. 2 through 4 may be met by the same person.

MPR Nos. 3 and 4 may be satisfied through the use of a sub-consultant(s).

NOTE: WHEN SATISFYING A MINIMUM PERSONNEL REQUIREMENT, PLEASE ENSURE THE RÉSUMÉ REFLECTS REQUIRED EXPERIENCE AS REQUESTED.

- Please note the number of MPRs are minimal; however, all relevant personnel necessary to perform the Scope of Services must be identified in the prime consultant's DOTD Form 24-102.
- The Prime Consultant shall use Section No. 12 and Section No. 16 of the DOTD Form 24-102 to convey the organizational structure and plan on how to timely deliver all the requirements and deliverables identified in the Scope of Services and allow DOTD to assess the consultant's ability to successfully complete this project.
- All relevant personnel and support staff necessary to perform the Scope of Services, shall be identified in Section No. 12 and their resumes included in Section 14 of the DOTD Form 24-102. This includes both individuals designated as satisfying MPRs and individuals not designated as satisfying MPRs but relevant to the contract.

ATTACHMENT C – SECONDARY SELECTIONS FOR TASK ORDERS

Procedures for selecting among IDIQ contracts for issuance of Task Orders

If proposed new TO is to be issued for the purpose of extending services related to services performed under a previously issued TO by a particular consultant with whom DOTD has an existing IDIQ contract containing the appropriate scope of services and with time and funding capacity available sufficient to support the issuance of the new TO under said contract, then that consultant's contract will be tasked.

Otherwise, when more than one IDIQ is available for the provision of the services required, the following procedure will be employed to determine which of the IDIQ contracts will be tasked.

1. Identify all IDIQ contracts that apply – type/scope of work in contract
 - a. If applies, move to next step
 - b. If does not apply, then cannot use the contract
2. Determine if there is sufficient time remaining on the contract to complete the work
 - a. If yes, proceed to next step
 - b. If no, then cannot use the contract
3. Determine if there is sufficient compensation remaining on contract to complete the work
 - a. If yes, proceed to next step
 - b. If no, cannot use the contract
4. Determine if specialty tasks are required or if timing of performance is critical
 - a. If yes, can the consultant perform the work, as needed? (Consideration may be given to experience with task(s), current workload, and past performance.)
 - i. If yes, the consultant can perform the work, then proceed to next step
 - ii. If no, the consultant should not or is not able to perform the work, do not use the contract. Document the reasons, *e.g.*, the consultant is less experienced, past performance indicates that the consultant may have difficulty with task(s), the consultant has multiple jobs ongoing for DOTD so timeliness may be an issue, etc.
 - b. If no specialty tasks or timeliness issues are present, then proceed to the next step.
5. If more than one IDIQ contract reaches this step, then they will be distinguished from one another by the consultants': 1) familiarity or experience with the services required; 2) locality, where a local presence will add value to the quality and efficiency of the project; or 3) the amount of remaining contract time or remaining available compensation.
 - a. Select the contract whose consultant is most familiar or experienced with the services required.

- b. If the consultants are equal regarding familiarity/unfamiliarity with the services required, then select the contract whose consultant is local to the project area, provided that a local presence will add value to the quality and efficiency of the project.
- c. If the consultants are equal on the criteria of familiarity and experience with the services required and locality, if applicable, then select the contract with the most available time or the most available compensation on the contract, with due consideration given to the risks involved and the needs of the project.