

EXHIBIT HH
FORM OF 395 DESIGN-BUILD CONTRACT

[SEE ATTACHED]

PART 3

395 Design-Build Contract
Between
Concessionaire and Design-Builder

This **395 DESIGN-BUILD CONTRACT** is made by and between the parties, the **Concessionaire**, 95 EXPRESS LANES LLC, a Delaware Limited Liability Company, and the **Design-Builder**, The Lane Construction Corporation, a Connecticut Corporation for services in connection with the 395 Express Lanes Project (“**395 Project**”).

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In consideration of the mutual covenants and obligations contained herein, Concessionaire and Design-Builder agree as set forth herein.

Article 1

Scope of 395 Work

1.1 Design-Builder shall perform all design and construction services, and provide all material, equipment, tools and labor, necessary to complete the 395 Work described in and reasonably inferable from the 395 Contract Documents.

Article 2

395 Contract Documents

2.1 The 395 Contract Documents are comprised of the following:

2.1.1 All written modifications, amendments and work orders to this 395 Design-Build Contract issued in accordance with *Part 4 General Conditions of Contract Between Concessionaire and Design-Builder* (“**General Conditions of Contract**”);

2.1.2 This 395 Design-Build Contract (Part 3), executed by Concessionaire and Design-Builder, inclusive of all Exhibits;

2.1.3 General Conditions of Contract (Part 4), inclusive of all Exhibits;

2.1.4 395 Project Technical Information and Requirements (Part 2), inclusive of all Attachments;

2.1.5 Request for Proposals (RFP) (Part 1) dated July 18, 2016, including all Addenda (track changes depicted in the Addenda have been accepted and are incorporated herein);

2.1.6 Division I Amendments (Part 5) to Standard Specifications, (“**Division I Amendments**”), inclusive of all Exhibits;

2.1.7 Construction Documents prepared and approved in accordance with Section 2.4 of the General Conditions of Contract; and

2.1.8 Design-Builder’s Technical and Price Proposals (Proposal) submitted in response to Part 1 (RFP).

Article 3

Interpretation and Intent

3.1 The 395 Contract Documents are intended to permit the parties to complete the 395 Work and all obligations required by the 395 Contract Documents within the 395 Contract Time(s) for the 395 Contract Price. The 395 Contract Documents are intended to be complementary and interpreted in harmony so as to avoid conflict, with words and phrases interpreted in a manner consistent with construction and design industry standards. In the event of any inconsistency, conflict, or ambiguity between or among the 395 Contract Documents, the 395 Contract Documents shall take precedence in the order in which they are listed in Section 2.1.

3.2 Terms, words and phrases used in the 395 Contract Documents, including this 395 Design-Build Contract, shall have the meanings given them in this 395 Design-Build Contract and the General Conditions of Contract.

3.3 The 395 Contract Documents form the entire agreement between Concessionaire and Design-Builder with respect to its subject matter and by incorporation herein are as fully binding on the parties as if repeated herein. The parties have made no oral representations or other agreement, except as specifically stated in the 395 Contract Documents.

3.4 Except as set forth in the last sentence of this Section 3.4, and notwithstanding anything to the contrary in Design-Builder's Proposal, Design-Builder is obligated to perform the 395 Work in full compliance with the 395 Contract Documents. The parties agree, however, that the betterments and higher and/or more stringent standards or specifications and design and construction criteria, concepts, and drawings set forth in the Design-Builder's Proposal (collectively referred to as "**Enhancements**") shall supersede the minimum requirements of the 395 Project Technical Information and Requirements and Design-Builder is obligated to perform the 395 Work in compliance with the Enhancements.

3.5 The documents which govern Concessionaire's transactions with the 395 Financing Parties for the 395 Project may provide to the Financing Parties' Technical Advisers certain rights of review, inspection, certification and consultation with Concessionaire concerning the 395 Project and the 395 Work in order that the Financing Parties' Technical Advisers may regularly and completely apprise the Financing Parties of the progress and other aspects of the 395 Project and the 395 Work. Design Builder shall fully and promptly cooperate with the Financing Parties' Technical Advisers as reasonably requested by Concessionaire. Any acceptance or comment by the Financing Parties' Technical Advisers, the Department or the Financing Parties shall not be construed to impose on the Financing Parties' Technical Advisers, the Department or the Financing Parties any control of any portion of the 395 Work, or relieve Design Builder of any of its duties, liabilities or obligations under the Contract Documents. All communications to and from the Financing Parties' Technical Advisers regarding the 395 Work shall be made through Concessionaire, except as Contractor is otherwise directed by Concessionaire.

Article 4

Ownership of 395 Work Product

4.1 395 Work Product Defined. The term “**395 Work Product**” is intended to include all drawings, specifications, calculations, reports, and documentation, whether in paper copy or electronic format, produced by or through Design-Builder that is furnished to Concessionaire.

4.2 Ownership of 395 Work Product. Concessionaire shall own all rights, title and interest in the 395 Work Product upon its receipt of such 395 Work Product. Concessionaire’s ownership rights, include without restriction or limitation, the right of the Concessionaire, the Department with respect to such 395 Work Product the Concessionaire has assigned to the Department, and anyone contracting with Concessionaire at Concessionaire’s discretion, to incorporate any ideas or information from the 395 Work Product into: (a) any other contract awarded in reference to the 395 Project; or (b) any subsequent procurement by Concessionaire or the Department on another project, during or after the completion of this 395 Design-Build Contract. In receiving all rights, title and interest in the 395 Work Product, Concessionaire is deemed to own all intellectual property rights, copyrights, patents, trade secrets, trademarks, and service marks in 395 Work Product, and Design-Builder agrees that it shall, at the request of Concessionaire, execute all papers and perform all other acts that may be necessary (if any) to ensure that Concessionaire’s rights, title and interest in the 395 Work Product are protected. The rights conferred herein to Concessionaire include, without limitation, Concessionaire’s ability to use the 395 Work Product without the obligation to notify or seek permission from Design-Builder. In addition, upon expiration, termination, or default of the Comprehensive Agreement, the Concessionaire shall turn over a copy of all 395 Work Product the Concessionaire owns. At such time, all such 395 Work Product (other than Concessionaire’s own proprietary 395 Work Product) will be considered the sole and exclusive property of the Department without compensation due to the Design-Builder or any other party.

4.3 Use of 395 Work Product at Concessionaire’s Risk. The Concessionaire’s use of the 395 Work Product on any subsequent procurement by Concessionaire on another project shall be at Concessionaire’s sole risk, and Design-Builder neither warrants nor represents that the 395 Work Product is suitable for use on another project without modification. The Concessionaire waives any rights to seek recovery from Design-Builder for any claims, damages, liabilities, losses and expenses arising out of or resulting from the Concessionaire’s use of the 395 Work Product on another project.

Article 5

395 Contract Time

5.1 Limited Notice to Proceed and Notice to Proceed.

5.1.1 Limited Notice to Proceed. At any time after the execution of this 395 Design-Build Contract, the Concessionaire anticipates issuing a Limited Notice to Proceed (“LNTP”) authorizing and obligating the Design-Builder to commence the Early Works. Design-Builder shall commence the Early Works within seven (7) days of its receipt of the LNTP, unless the Parties mutually agree otherwise in writing. The scope, schedule, payment amount and payment terms for such Early Works are set forth in the Early Works Scope Document attached hereto as Exhibit 5.1.

5.1.2 Notice to Proceed. The 395 Work shall commence upon Design-Builder’s receipt of Concessionaire’s Notice to Proceed (“NTP”), unless the parties mutually agree otherwise in writing. The obligation of the Design-Builder to commence the 395 Work is subject to the condition precedent that the Design-Builder shall have received, from or on behalf of the Concessionaire, a certificate from the Concessionaire Representative in a form and substance satisfactory to the Design-Builder confirming that: (i) 395 Financial Close for the 395 Project has occurred; (ii) Concessionaire has adequate funds available and committed to fulfill all of Concessionaire’s contractual obligations under the 395 Contract Documents; and (iii) there has been no default or adverse condition that will prevent Concessionaire from making the payments required under this 395 Design-Build Contract as they come due. If the Concessionaire issues the NTP earlier than the anticipated NTP date of July 1, 2017, the Service Commencement Duration from the Design-Builder’s Technical Proposal shall be increased by one day for each day the NTP is issued earlier than July 1, 2017.

5.1.3 Delays to Notice to Proceed. If the NTP is not issued by the Concessionaire until after July 1, 2017, through no fault of the Design-Builder, then, as Design-Builder’s sole and exclusive remedy for any increased costs, impacts, delays and disruptions due to the delayed issuance, Design-Builder shall be entitled to the following:

(i) Additional payments, not to exceed \$1,250,000 per month for actual costs incurred on approved Early Works activities included in Exhibit 5.1 (Early Works Scope of Work) during this period. Any such payments shall not increase the 395 Contract Price;

(ii) The 395 Contract Price, excluding amounts to be paid for Early Works under the LNTP, shall be increased at a three percent (3.00%) annualized rate (i.e., 0.008219% per day), based on the number of days between July 1, 2017 and the date of issuance of the NTP.

(ii) The Scheduled Service Commencement Date shall be extended by the number of days between July 1, 2017 and the date of issuance of the NTP.

(iii) Notwithstanding the above, if Concessionaire determines that the NTP will not be issued on or before September 1, 2017, or if the NTP is not issued by Concessionaire on or before September 1, 2017, the 395 Contract Price, Service Commencement Date, and

the Final Completion Date shall be subject to good faith renegotiation, in accordance with the following protocol:

(1) Concessionaire shall direct Design-Builder in writing to provide a proposal, with Concessionaire identifying those assumptions upon which the proposal is to be based.

(2) Design-Builder shall promptly furnish its proposal after receipt of Concessionaire's directive.

(3) If the parties do not reach agreement on a revised 395 Contract Price, Service Commencement Date, and the Final Completion within thirty (30) days of the date Concessionaire receives Design-Builder's proposal, either Concessionaire or Design-Builder may terminate this 395 Design-Build Contract. Should either party terminate for convenience under this Section 5.1.3(iii)(3), the Design-Builder shall be compensated in accordance with Section 8.1.1 below.

5.1.4 Termination Prior to Notice to Proceed. If Concessionaire terminates all of the 395 Work for convenience before issuing an NTP, the provisions set forth in Section 8.1.1 shall be applicable.

5.2 Completion Dates

5.2.1 Scheduled Service Commencement Date. The **Scheduled Service Commencement Date** shall be the date that is 820 days following the date of issuance of the NTP.

(a) At least thirty (30) days prior to the date when Design-Builder anticipates that it will submit a Notice of Service Commencement, it shall provide an Advanced Notice of Service Commencement to the Concessionaire to allow sufficient time to schedule the resources necessary for an expeditious inspection of the completed 395 Express Lanes Work.

(b) After receipt of the Notice of Service Commencement, Concessionaire shall have thirty (30) days to inspect the 395 Express Lanes Work completed by Design-Builder and either: (a) deliver to Design-Builder a signed Service Commencement Certificate; or (b) if reasonable cause exists for doing so, notify Design-Builder that Service Commencement has not been achieved stating in reasonable detail the reasons therefor. Service Commencement shall only be achieved hereunder if Concessionaire has provided a signed Service Commencement Certificate to Design-Builder acknowledging that Design-Builder has satisfied all conditions set forth within Exhibit 5.2.1 (Requirements for Service Commencement). The foregoing process shall be repeated until Concessionaire is satisfied that all conditions set forth within Exhibit 5.2.1 have been satisfied. The Service Commencement Date shall be deemed to be the date of the last Notice of Service Commencement issued by Design-Builder pursuant to this Section 5.2.1 (i.e., the notice that results in the Concessionaire delivery to Design-Builder of a signed Service Commencement Certificate).

5.2.2 Scheduled Final Completion Date. The Scheduled Final Completion Date shall be two-hundred thirty (230) days after the Service Commencement Date. The Design-Builder will deliver to the Concessionaire the Notice of Final Completion in accordance with Exhibit 5.2.2 (Requirements for Final Completion) after all the 395 Work is complete and the Design-Builder has received the Service Commencement Certificate. After receipt of the Design-Builder’s Notice of Final Completion, Concessionaire shall have (30) thirty days to inspect the 395 Project and all 395 Work completed by Design-Builder and either: (a) deliver to Design-Builder a signed Final Completion Certificate; or (b) if reasonable cause exists for doing so, notify Design-Builder that Final Completion has not been achieved stating in reasonable detail the reasons therefor. Final Completion shall only be achieved hereunder if Concessionaire has provided a signed Final Completion Certificate to Design-Builder acknowledging that Design-Builder has satisfied all conditions of the 395 Contract Documents. The foregoing process shall be repeated until Concessionaire is satisfied that all conditions set forth within 395 Contract Documents have been satisfied. The Final Completion Date shall be the date of the last Notice of Final Completion issued by Design-Builder pursuant to this Section 5.2.2 (i.e., the notice that results in the Concessionaire delivery to Design-Builder of a signed Final Completion Certificate).

If required, one-hundred eighty days (180) calendar days prior to the 395 Long Stop Date, the Design-Builder shall prepare a detailed plan describing the actions it plans to take to achieve Final Completion by the 395 Long Stop Date (“**395 Final Completion Recovery Plan**”), and in any case as soon as reasonably practicable. The 395 Final Completion Recovery Plan may contain a new proposed 395 Long Stop Date, if applicable. The Design-Builder agrees to prepare a second 395 Final Completion Recovery Plan as needed. The Design-Builder acknowledges that approval and the terms of any 395 Final Completion Recovery Plan is solely in the discretion of the Concessionaire, and subject to the Department’s approval.

5.2.3 Scheduled Pentagon South Parking Final Completion Date. The Scheduled Pentagon South Parking Final Completion Date shall be March 31, 2019. The Design-Builder will deliver to the Concessionaire the Notice of Pentagon South Parking Final Completion in accordance with Exhibit 5.2.3 (Requirements for Pentagon South Parking Final Completion) after all the Pentagon South Parking Work and the two traffic signal locations on the Pentagon Reservation are complete. After receipt of the Design-Builder’s Notice of Pentagon South Parking Final Completion, Concessionaire shall have (30) thirty days to inspect the Work completed by Design-Builder and either: (a) deliver to Design-Builder a signed Pentagon South Parking Final Completion Certificate or (b) if reasonable cause exists for doing so, notify Design-Builder that Pentagon South Parking Final Completion has not been achieved stating in reasonable detail the reasons therefor. Pentagon South Parking Final Completion shall only be achieved hereunder if Concessionaire has provided a signed Pentagon South Parking Final Completion Certificate to Design-Builder acknowledging that Design-Builder has satisfied all conditions of the 395 Contract Documents associated with this Work. The foregoing process shall be repeated until Concessionaire is satisfied that all conditions set forth within 395 Contract Documents have been satisfied. The actual Pentagon South Parking Final Completion Date shall be the date the Concessionaire delivers to the Design-Builder a signed Pentagon South Parking Final Completion Certificate.

5.3 Adjustments. All of the scheduled completion dates set forth in Section 5.2 above (collectively referred to as “**395 Contract Times**”) shall be subject to adjustment in accordance with the General Conditions of Contract.

5.4 Time is of the Essence. Concessionaire and Design-Builder mutually agree that time is of the essence with respect to the 395 Contract Times.

5.5 Liquidated Damages. Design-Builder understands that if the Service Commencement Date, Pentagon South Parking Final Completion Date, or the Final Completion Date are not attained, Concessionaire will suffer damages which are difficult to determine and accurately specify. To compensate Concessionaire for such damages, Design-Builder hereby agrees as follows:

5.5.1 If the Service Commencement Date is not attained by the Scheduled Service Commencement Date, Designer-Builder shall pay Concessionaire Fifty Thousand Dollars (\$50,000.00) as liquidated damages for each day that the Service Commencement Date extends beyond the Scheduled Service Commencement Date.

5.5.2 If Final Completion Date is not attained by the Scheduled Final Completion Date, Designer-Builder shall pay Concessionaire Seventeen Thousand Five Hundred Dollars (\$17,500.00) as liquidated damages for each day that Final Completion Date extends beyond the Scheduled Final Completion Date.

5.5.3 If Pentagon South Parking Final Completion Date is not attained by the Scheduled Pentagon South Parking Final Completion Date, Designer-Builder shall pay Concessionaire Two Thousand Five Hundred Dollars (\$2,500.00) as liquidated damages for each day that Pentagon South Parking Final Completion Date extends beyond the Scheduled Pentagon South Parking Final Completion Date.

5.5.4 The total amount of liquidated damages paid pursuant to this Section 5.5 shall not exceed ten percent (10%) of the 395 Contract Price.

5.5.5 Any liquidated damages payable or lane closure penalties payable by the Design-Builder shall be paid by Design-Builder or withheld by Concessionaire, as applicable, in arrears at the next scheduled monthly payment intervals applicable after the Scheduled Service Commence Date, Final Completion Date or Pentagon South Parking Final Completion Date, as applicable, with the last such payment to occur on the date on which Service Commencement, Final Completion or Pentagon South Parking Final Completion, as applicable, actually occurs.

5.6 Liquidated Damages Not Penalty. The parties acknowledge, recognize and agree on the following:

- (a) that because of the unique nature of the 395 Project, it is difficult or impossible to determine with precision the amount of damages that would or might be incurred by Concessionaire as a result of Design-Builder’s failure to complete the 395 Work on or before the applicable 395 Contract Time(s);

(b) that any sums which would be payable under this Article 5 are in the nature of liquidated damages, and not a penalty, and are fair and reasonable and such payment represents a reasonable estimate of fair compensation for the losses that may reasonably be anticipated from such failure; and

(c) that any sums which would be payable herein shall be in lieu of all liability for any and all extra costs, losses, expenses, claims, penalties and any other damages, whether special or consequential, and of whatsoever nature incurred by Concessionaire which are occasioned by any delay in achieving the applicable 395 Contract Times for the above-referenced 395 Work. Notwithstanding the above, liquidated damages are not intended to excuse Design-Builder from liability for any other breach of its obligations under the 395 Contract Documents.

5.7 Final Completion of Project Components. The Design-Builder may deliver to the Concessionaire a Notice of Project Component Final Completion in accordance with Exhibit 5.7 after all Work for such Project Component is complete. After receipt of such notice, Concessionaire shall have (30) thirty days to inspect the Work for such Project Component and either: (a) deliver to Design-Builder a signed Project Component Final Completion Certificate for such Project Component; or (b) if reasonable cause exists for doing so, notify Design-Builder that Final Completion for such Project Component has not been achieved, stating in reasonable detail the reasons therefor. Final Completion of a Project Component shall only be achieved hereunder if Concessionaire has provided a signed Project Component Final Completion Certificate to Design-Builder acknowledging that Design-Builder has satisfied all conditions of the 395 Contract Documents applicable to such Project Component. The foregoing process shall be repeated until Concessionaire is satisfied that all conditions set forth within 395 Contract Documents have been satisfied. The Final Completion Date for a Project Component shall be the date Concessionaire has signed the Project Component Final Completion Certificate.

Article 6

395 Contract Price

6.1 395 Contract Price. Concessionaire shall pay Design-Builder in accordance with Article 6 of the General Conditions of Contract the sum of **\$336,303,841.02** (“**395 Contract Price**”), subject to adjustments made in accordance with the General Conditions of Contract. Unless otherwise provided in the 395 Contract Documents, Design-Builder shall furnish to the appropriate taxing authorities all required information and reports in connection with such taxes and promptly furnish to the appropriate taxing authorities all required information and reports in connection with such taxes, which taxes will be administered and paid by the Design-Builder. The 395 Contract Price is deemed to include all sales, use consumer and other taxes mandated by applicable Legal Requirements.

6.2 Markups for Changes. If the 395 Contract Price requires an adjustment due to changes in the 395 Work, and the cost of such changes is determined under Section 9.4.1 of Part 4 (General

Conditions of Contract), markups shall be allowed on such changes in accordance with requirements of Section 109.05 of the Division I Amendments to the Standard Specifications.

6.3 Price of Asphalt, Fuel and Steel. Design-Builder shall be responsible for all costs related to the use of Asphalt, Fuel and Steel required to perform the 395 Work. For the avoidance of doubt, there will be no increase to the 395 Contract Price due to a change in the market of asphalt, fuel and/or steel or any other similar materials used by Design-Builder during the performance of the 395 Work.

6.4 Royalties and License Fees. Design-Builder shall pay all applicable and required initial royalties and license fees (it being understood that Design-Builder is not responsible for ongoing maintenance and support fees) and shall procure for the benefit of Concessionaire and/or the Department, as applicable, at Design-Builder's sole expense (other than ongoing maintenance and support fees), the appropriate rights, licenses, agreements and permissions for materials, methods, processes and systems incorporated in the 395 Project. In performing the 395 Work, Design-Builder shall not incorporate into the 395 Project any materials, methods, processes or systems which involve the use of any confidential information, intellectual property or property rights which Concessionaire, the Department or Design-Builder does not have the right to use or which may result in claims or suits against Concessionaire, the Department or Design-Builder arising out of claims of infringement of any domestic or foreign patent rights, copyrights or other proprietary rights, or applications for any such rights, or use of confidential information. Any such rights held by Design-Builder with respect to items incorporated in the 395 Work shall be assigned or licensed to the Department or Concessionaire, as applicable, at no additional cost to the Department or Concessionaire, in connection with the use or operation of the 395 Project.

Article 7

Procedure for Payment

7.1 Progress Payments

7.1.1 Design-Builder shall submit to Concessionaire on or before the fifteenth (15th) day of each month, beginning with the first month after Design-Builder's receipt of Concessionaire's LNTP, Design-Builder's Application for Payment in accordance with Article 6 of the General Conditions of Contract.

7.1.2 Concessionaire shall make payment within thirty (30) days after Concessionaire's receipt of each properly submitted and accurate Application for Payment in accordance with Article 6 of the General Conditions of Contract, but in each case less the total of payments previously made, and less amounts properly withheld under Section 6.3 of the General Conditions of Contract.

7.1.3 Design-Builder agrees that, within seven (7) days following receipt of monies from the Concessionaire for work performed by any Subcontractor, Design-Builder shall either: (a) pay the Subcontractor for the proportionate share of the total payment received from the Concessionaire attributable to the work performed by the Subcontractor; or (b) notify the Concessionaire and Subcontractor, in writing, of Design-Builder's intention to withhold all or a part of the

Subcontractor's payment, specifying the reason for the non-payment. Design-Builder also agrees that it shall include in all of its subcontracts a provision that: (a) obligates Design-Builder to pay interest to Subcontractors on all amounts owed by Design-Builder that remain unpaid after seven (7) days following receipt of monies from the Concessionaire for work performed by any Subcontractor, except for amounts withheld as allowed in the preceding sentence; (b) states, "Unless otherwise provided under the terms of this contract, interest shall accrue at the rate of one percent per month."; and (c) obligates each Subcontractor to include or otherwise be subject to the same payment and interest requirements as specified in this Section 7.1.3 with respect to each lower-tier Sub-subcontractor.

7.1.4 Design-Builder's obligations to pay an interest charge to a Subcontractor pursuant to Section 7.1.3 shall not be construed to be an obligation of the Concessionaire, nor shall any modification to this 395 Design-Build Contract be allowed for the purpose of providing reimbursement for the interest charge. Cost reimbursement claims shall not include any amount for reimbursement for the interest charge.

7.1.5 Design-Builder agrees to provide the Concessionaire, within five (5) days of the 395 Design-Build Contract Date, its federal employer identification number.

7.2 **Retainage on Progress Payments.** Retainage will not be withheld from Progress Payments.

7.3 **Final Payment.** Design-Builder shall submit its Final Application for Payment to Concessionaire in accordance with Section 6.6 of the General Conditions of Contract. Concessionaire shall make payment on Design-Builder's properly submitted and accurate Final Application for Payment within thirty (30) days after Concessionaire's receipt of the Final Application for Payment, provided that Design-Builder has satisfied the requirements for Final Payment set forth in Section 6.6.3 of the General Conditions of Contract.

7.4 **Interest.** Payments due and unpaid by Concessionaire to Design-Builder, whether progress payments or Final Payment, shall bear interest commencing seven (7) days after payment is due at an interest at a variable rate per annum equal to the reference rate announced by Bank of America, N.A., from time-to-time, plus one percent (1%).

7.5 **Record Maintenance and Retention of Records.** Design-Builder shall keep full and detailed accounts and exercise such controls as may be necessary for proper financial management, using accounting and control systems in accordance with generally accepted accounting principles and as may be provided in the 395 Contract Documents. During the performance of the 395 Work and for a period of five (5) years after Final Payment, Concessionaire and Concessionaire's accountants shall be afforded access from time-to-time, upon reasonable notice, to Design-Builder's records, books, correspondence, receipts, subcontracts, purchase orders, vouchers, memoranda and other data, including but not limited to electronic schedules and other electronic data (all collectively referred to as "**Books and Records**") relating to: (a) changes in the 395 Work performed on a cost basis; or (b) any request by Design-Builder for an adjustment in the 395 Contract Price or 395 Contract Times. Design-Builder shall preserve all of its Books and Records for a period of five (5) years after Final Payment. The Design-Builder shall permit the

Concessionaire to audit, examine, and copy all documents, computerized records, electronic mail, or other records of the Design-Builder during the life of the Contract and for a period for not less than five years after the date of final payment, or the date the Design-Builder is declared in default of Contract, or the date of termination of the Contract.

Article 8

Termination for Convenience

8.1 Upon ten (10) days written notice to Design-Builder, Concessionaire may, for its convenience and without cause, elect to terminate all or part of the 395 Work if Concessionaire, in its sole discretion, determines that such a termination is in the Concessionaire's best interests. The Concessionaire shall notify Design-Builder of the decision to terminate by delivering to Design-Builder a written notice of termination specifying the extent of termination and its effective date (a "**Notice of Termination**"). Pursuant to this Section 8.1, the Concessionaire shall have the right to terminate the 395 Design-Build Contract immediately upon termination by the Department of the Comprehensive Agreement.

8.1.1 If Concessionaire terminates all of the 395 Work for convenience before issuing a Notice to Proceed, Design-Builder's sole remedy shall be the payment of monies due for Early Works properly performed by Design-Builder, the amount of which shall be explicitly enumerated in the Exhibit 5.1 (Early Works Scope Document). The amounts owed under any such payment will be limited to the actual costs incurred and verified by the Concessionaire. Such monies will be paid in accordance with the terms of the Early Works Scope Document. Other than its rights to be paid for Early Works properly performed, Design-Builder specifically waives any and all rights to claim from the Concessionaire for any cost, profit, overhead contribution or any other monetary relief associated with the 395 Contract Documents or 395 Project, including but not limited to bid and proposal costs, or any services that might have constituted 395 Work under the 395 Contract Documents.

8.1.2 If Concessionaire terminates all or part of the 395 Work for convenience after issuing a Notice to Proceed, then Sections 8.2 through 8.8 below shall apply.

8.2 After receipt of a Notice of Termination, and except as directed by Concessionaire, Design-Builder shall immediately proceed as follows, regardless of any delay in determining or adjusting any amounts due under this Article 8:

- (a) Stop any 395 Work as specified in the notice;
- (b) Enter into no further Subcontracts and place no further orders for materials, services or facilities, except as necessary to complete the continued portion of the 395 Work, if any, or for mitigation of damages;
- (c) Unless instructed otherwise by Concessionaire, terminate all Subcontracts to the extent they relate to the 395 Work terminated and except to the extent that continuation of the Subcontract is necessary in order to mitigate damages;

- (d) Assign to Concessionaire or its designee in the manner, at the times, and to the extent directed by Concessionaire, all of the right, title, and interest of Design-Builder under the Subcontracts so terminated, in which case Concessionaire will have the right, in its sole discretion, to accept performance, settle or pay any or all claims under or arising out of the termination of such Subcontracts;
- (e) Settle outstanding liabilities and claims arising out of such termination of Subcontracts, with the approval or ratification of Concessionaire, to the extent it may require, which approval or ratification shall be final;
- (f) Transfer and deliver to Concessionaire or its designee, as directed by Concessionaire: (1) possession and control of the 395 Project; and (2) all right, title and interest of Design-Builder in and to: (i) the 395 Work in process, completed 395 Work, supplies and other materials produced or acquired for the 395 Work terminated; (ii) the Construction Documents and all other completed or partially completed drawings (including plans, elevations, sections, details and diagrams), specifications, records, reports, books, samples, information and other 395 Work Product that would have been required to be furnished to Concessionaire if the 395 Work had been completed; and (iii) all intellectual property developed specifically for the 395 Project; provided, however, that in the event of such transfer, the Design-Builder shall not be liable for any warranties for 395 Work which has not achieved Final Completion, nor shall the Design-Builder have any liability with respect to any design materials produced with respect to the 395 Project;
- (g) Complete performance in accordance with the 395 Contract Documents of all 395 Work not terminated;
- (h) Take all action that may be necessary, or that Concessionaire may direct, for the protection and preservation of the property related to the 395 Contract Documents that is in the possession of Design-Builder and in which Concessionaire has or may acquire an interest; and
- (i) As authorized by Concessionaire, use its best efforts to sell at fair market value any property of the types referred to in Section 8.3; provided, however, that Design-Builder: (1) shall not take any such action with respect to any items for which title has previously transferred to Concessionaire; (2) is not required to extend credit to any purchaser; and (3) may acquire the property itself, under the conditions prescribed and at prices approved by Concessionaire. The proceeds of any transfer or disposition will be applied to reduce any payments to be made by Concessionaire under the 395 Contract Documents or paid in any other manner directed by Concessionaire.

8.3 Inventory. Design-Builder shall submit to Concessionaire a list of termination inventory not previously disposed of and excluding items authorized for disposition by Concessionaire; and within thirty (30) days of receipt of the list, Design-Builder shall deliver such inventory to Concessionaire and Concessionaire shall accept title to such inventory as appropriate.

8.4 Settlement Proposal. After termination, Design-Builder shall submit a final termination settlement proposal to Concessionaire in the form and with the certification prescribed by Concessionaire. Design-Builder shall submit the proposal promptly, but no later than thirty (30) days from the effective date of termination unless Design-Builder has requested a time extension in writing within such 30-day period and Concessionaire has agreed in writing to allow such an extension.

8.5 Amount of Termination Settlement. Design-Builder and Concessionaire shall negotiate in good faith to reach agreement on the settlement amount to be paid to Design-Builder by reason of the termination of 395 Work pursuant to this Article 8 and any such settlement shall be subject to the provisions of Article 10 of Part 4 (General Conditions). Such negotiated settlement shall include an allowance for profit solely on 395 Work that has been performed as of the termination date. Such agreed amount or amounts payable for the terminated 395 Work, exclusive of demobilization costs and other shut-down costs, shall not exceed the total 395 Contract Price as reduced by the 395 Contract Price of 395 Work not performed. Upon determination of the settlement amount, this 395 Design-Build Contract will be amended accordingly, and Design-Builder will be paid the agreed amount as described in this Section 8.5. Concessionaire's execution and delivery of any settlement agreement shall not be deemed to affect any of its rights with respect to compliance of the 395 Work which has achieved Final Completion with all applicable Contract requirements or any of its rights under payment and performance bonds or any of its rights against Subcontractors.

8.6 No Agreement as to Amount of Claim. In the event of failure of Design-Builder and Concessionaire to agree upon the amount to be paid Design-Builder by reason of the termination of 395 Work pursuant to this Article 8, the amount payable (exclusive of interest charges) shall be determined in accordance with the dispute resolution procedures of the General Conditions.

8.7 Reduction in Amount of Claim. The amount otherwise due Design-Builder under this Article 8 shall be reduced by: (a) the amount of any valid claim which Concessionaire may have against Design-Builder in connection with this 395 Design-Build Contract; and (b) the agreed price for, or the proceeds of sale of, materials, supplies or other things previously paid for by the Concessionaire and to be retained by Design-Builder or sold by the Design-Builder (with the proceeds being retained by the Design-Builder), pursuant to the provisions of this Article 8.

8.8 Payment. Concessionaire may, from time-to-time, under such terms and conditions as it may prescribe and in its sole discretion, make partial payments on account against costs incurred by Design-Builder in connection with the terminated portion of this 395 Design-Build Contract, whenever in the opinion of Concessionaire the aggregate of such payments shall be within the amount to which Design-Builder will be entitled hereunder. If the total of such payments is in excess of the amount finally agreed or determined to be due under this Article 8, such excess shall be payable by Design-Builder to Concessionaire upon demand together with interest at a variable rate per annum equal to the reference rate announced by Bank of America, N.A., from time-to-time, plus one percent (1%).

8.9 Inclusion in Subcontracts. Design-Builder shall insert in all Subcontracts that the Subcontractor shall stop 395 Work on the date of and to the extent specified in a Notice of

Termination from Concessionaire and shall require that Subcontractors insert the same provision in each Subcontract at all tiers. Design-Builder shall communicate, immediately upon receipt thereof, any Notice of Termination issued by Concessionaire to all affected Subcontractors.

8.10 No Consequential Damages. In the event of a termination for convenience under this Article 8, Design-Builder acknowledges and agrees that it shall not be entitled to any compensation in excess of the value of the 395 Work performed plus its settlement and closeout costs. Under no circumstances shall Design-Builder or any Subcontractor be entitled to anticipatory or unearned profits, unabsorbed overhead, opportunity costs, or consequential or other damages as a result of a termination for convenience under this Article 8. The payment to Design-Builder determined in accordance with this Article 8 constitutes Design-Builder's exclusive remedy for a termination hereunder.

8.11 No Waiver. Anything contained in this 395 Design-Build Contract to the contrary notwithstanding, a termination under this Article 8 shall not waive any right or claim to damages which Concessionaire may have with respect to 395 Work which has achieved Final Completion prior to the date of termination, and Concessionaire may pursue any cause of action which it may have by law or under this 395 Design-Build Contract on account of such completed 395 Work. The Design-Builder makes no warranties with respect to 395 Work which has not achieved Final Completion prior to the date of termination. Concessionaire's termination of this 395 Design-Build Contract shall not relieve any rights Concessionaire has under any performance bonds issued on the 395 Project.

8.12 Dispute Resolution. The failure of the parties to agree on amounts due under Article 8 shall be a dispute to be resolved in accordance with the requirements of the General Conditions, Article 10.

8.13 Right to Use 395 Work Product. If Concessionaire terminates this 395 Design-Build Contract pursuant to this Article 8, Concessionaire's rights to use the 395 Work Product shall be as set forth in Article 4 hereof.

8.14 Limitation of Certain Contractor Liabilities. Notwithstanding anything herein to the contrary, the total liability of Design-Builder in contract, tort, equity or otherwise (including negligence, warranty, strict liability or otherwise) relative to or arising out of 395 Contract Documents shall not exceed an amount equal to forty percent (40%) of the 395 Contract Price; provided, that the foregoing limitation shall not apply to or include:

- (i) the proceeds of insurance, not to exceed amounts required to be maintained by Design-Builder in accordance with the terms of the 395 Contract Documents;
- (ii) costs, liabilities or obligations that arise from gross negligence, willful misconduct or actual fraud of the Design-Builder;
- (iii) costs, liabilities or obligations that arise from Design-Builder's abandonment of the 395 Work or failure to maintain the insurance and bonds required pursuant to Article 5 of Part 4;

- (iv) Design-Builder’s breach of its representations made in any of its Applications for Payment contained in Section 6.2.3 of Part 4; or
- (v) Design-Builder’s indemnity obligations under Article 7 of Part 4.

Article 9

Representatives of the Parties

9.1 Concessionaire’s Representative

9.1.1 (Not Used)

9.1.2 Concessionaire designates Mr. Kevin Ginnerty as its Concessionaire’s Representative, which individual has the authority and responsibility set forth in Section 3.4 of the General Conditions of Contract.

9.2 Design-Builder’s Representatives

9.2.1 (Not Used)

9.2.2 Design-Builder designates Mr. Jason Tracy as its Design-Builder’s Representative, which individual has the authority and responsibility set forth in Section 2.1.1 of the General Conditions of Contract.

9.3 The Concessionaire and Design-Builder shall, in the spirit of cooperation, exchange information in a timely manner. While the 395 Contract Documents establish a timeline and process for making decisions and managing communications on the 395 Project, the parties recognize it is not possible to specify processes for all activities that may occur.

Article 10

Bonds and Insurance

10.1 Insurance. Design-Builder shall procure and maintain insurance in accordance Section 5.1.1 of Part 4 (General Conditions of Contract).

10.2 Performance and Payment Bonds. Design-Builder shall procure and maintain performance and payment bonds executed by a surety acceptable to Concessionaire, each in the amount of one hundred percent (100%) of the 395 Contract Price, and in accordance with all other requirements of the 395 Contract Documents, including the Division I Amendments.

Article 11 Other Provisions

11.1 Project Management and Reporting Requirements

11.1.1 Initial Baseline Schedule. Design-Builder submitted an Initial Baseline Schedule with their Proposal in accordance with the Section 1.4 of Part 2 (395 Project Technical Information and Requirements) and the RFP. This Initial Baseline Schedule shall be used to manage the Early Works Scope of Work until such time it is replaced by the approved Baseline Schedule.

11.1.2 Baseline Schedule. Within sixty (60) days of Design-Builder's receipt of Concessionaire's Limited Notice to Proceed, Design-Builder shall submit to Concessionaire, for its review and approval, a Baseline Schedule in accordance with the Section 1.4 of Part 2 (395 Project Technical Information and Requirements). Concessionaire reserves the right to withhold approval for all or part of Design-Builder's Applications for Payment until such time Design-Builder furnishes an approved Baseline Schedule.

11.1.3 Schedule Updates. Design-Builder shall submit Schedule Updates in accordance with the Section 1.4 of Section 1.4 of Part 2 (395 Project Technical Information and Requirements). Concessionaire reserves the right to withhold approval for all or part of Design-Builder's Applications for Payment until such time Design-Builder furnishes an approved Schedule Update.

11.1.4 Revised Baseline Schedule. Design-Builder shall submit a Revised Baseline Schedule when required in accordance with Section 1.4 of Part 2 (395 Project Technical Information and Requirements). Concessionaire reserves the right to withhold approval for all or part of Design-Builder's Applications for Payment until such time Design-Builder furnishes an approved Revised Baseline Schedule.

11.1.5 Final As-Built Schedule. Design-Builder shall submit a Final As-Built Schedule in accordance with Section 1.4 of Part 2 (395 Project Technical Information and Requirements). Concessionaire reserves the right to withhold approval for all or part of Design-Builder's Applications for Final Payment until such time Design-Builder furnishes an approved Final As-Built Schedule.

11.1.6 Other Information and Alteration. Design-Builder shall, whenever required by Concessionaire, provide in writing a general description of the arrangements and methods which Design-Builder proposes to adopt for the execution of the 395 Work. No significant alteration to the Baseline Schedule, or to such arrangements and methods, shall be made without informing Concessionaire and any alterations made shall reflect the requirement for coordination of the 395 Work with the actions and obligations of Concessionaire and the work to be carried out by Separate Contractors and the TTMS Contractor. If any alteration affects any such actions, obligations or 395 Work, it shall not be made without the prior approval of Concessionaire. If the progress of the 395 Work does not conform to the Baseline Schedule, as updated herein, Concessionaire may instruct Design-Builder to revise the Baseline Schedule, showing the modifications necessary to achieve completion within the 395 Contract Times.

11.1.7 TTMS Contractor and Separate Contractors. Design-Builder agrees to include the activities of the TTMS Contractor and Separate Contractors into the Baseline Schedule. Design-Builder shall reasonably cooperate with Concessionaire's the TTMS Contractor and Separate Contractors and coordinate its activities with those of such Separate Contractors so that the 395 Project can be completed in an orderly and coordinated manner without unreasonable disruption.

11.1.8 Concessionaire's Review and Approval of Schedule Submissions. Concessionaire's review and approval of the Baseline Schedule or subsequent Schedule Updates and Revised Baseline Schedule shall not be construed as relieving Design-Builder of its complete and exclusive control and responsibility over the means, methods, sequences and techniques for executing the 395 Work and does not constitute approval or acceptance of Design-Builder's ability to complete the 395 Work within the 395 Contract Time(s).

11.1.9 Monthly Reports. Monthly reports shall be prepared by Design-Builder and submitted to Concessionaire in accordance with Part 2 (395 Project Technical Information and Requirements). The first report shall cover the period up to the end of the calendar month after that in which the 395 Design-Build Contract Date occurred; reports shall be submitted monthly thereafter, on or before the fifteenth (15th) day of each month. Reporting shall continue until Concessionaire's determination that the 395 Project has achieved Final Completion.

Failure of Design-Builder to provide complete monthly reports, including but not limited to the monthly schedule updates, shall be grounds for Concessionaire to withhold approval for all or part of Design-Builder's Applications for Payment until such time Design-Builder furnishes such complete reports.

11.1.10 395 Project Records. Design-Builder shall organize and maintain its 395 Project records in a manner that allows such 395 Project records to be filed by work packages, as applicable. Additionally, Design-Builder shall develop a tracking log wherein the 395 Project records are provided chronologically, with the file type, description, date received/sent, entity the documentation is from/to, pay package reference, status and electronic location. If the 395 Project record relates to changes in the 395 Work, preferably only one work package shall be referenced in such 395 Project record. If a 395 Project record relates to multiple work packages, then all related work packages shall be referenced in such 395 Project record. As a condition of Final Payment, Design-Builder shall provide Concessionaire with a complete set of all 395 Project records by and between Design-Builder and Concessionaire exchanged on the 395 Project.

11.1.11 Estoppel Certificate. Design-Builder shall at any time and from time to time furnish promptly upon request by Concessionaire or any 395 Financing Party a written statement in such form as may be required by the requesting party stating that this 395 Design-Build Contract is a valid and binding obligation of Design-Builder, enforceable against Design-Builder in accordance with its terms, except to the extent that its enforceability may be limited by bankruptcy, insolvency, reorganization, moratorium or other similar laws affecting the rights of creditors generally or by general principles of equity; that this 395 Design-Build Contract has not been released, subordinated or modified; and that there are no offsets or defenses against the enforcement of this 395 Design-Build Contract against Design-Builder; or if any of the foregoing statements are qualified or unable to be made in their entirety, specifying the reasons therefor.

11.2 Miscellaneous

11.2.1 In executing this 395 Design-Build Contract, Concessionaire and Design-Builder each individually represents that it has the necessary financial resources to fulfill its obligations under this 395 Design-Build Contract, and each has the necessary approvals to execute this 395 Design-Build Contract and their applicable obligations described herein.

11.2.2 The Design Builder specifically represents and warrants the following:

.1 that it is duly organized and validly existing under the law of its state of organization, and is duly licensed or qualified to do business in the Commonwealth of Virginia and in each other jurisdiction wherein the nature of the business transacted by them makes such licensing or qualification necessary;

.2 that it has the power and authority to do all acts and things to execute and deliver all 395 Contract Documents and other documents as are required to be done, observed or performed by in connection with the performance of the 395 Work;

.3 that it has all necessary expertise, qualifications, experience, competence, skills and know-how to perform the 395 Work;

.4 that it is not in violation of any applicable law that would have a material adverse effect on the performance of the 395 Work;

.5 none of itself nor any of its affiliates, including their respective officers, directors and employees, have been debarred or prohibited from participating in state or federally-funded projects, or indicted, convicted, pled guilty or nolo contendere to a violation of law involving fraud, conspiracy, collusion, bribery, perjury, material misrepresentation, or any other violation that shows a similar lack of moral or ethical integrity;

.6 it owns or possesses all the patents, trademarks, service marks, trade names, copyrights, licenses, franchises, Governmental Approvals and rights with respect to the foregoing necessary to perform the 395 Work and to carry on its business as presently conducted and presently planned to be conducted without conflict with the rights of others;

.7 no representation or warranty by Design-Builder contained herein or in any other document furnished by Design-Builder to Concessionaire contains or will contain any untrue statement of material fact or omits or will omit to state a material fact necessary to make such representation or warranty not misleading in light of the circumstances under which it was made. All financial and other information furnished by Design-Builder to Concessionaire is true and correct in all material respects;

.8 to the best of Design-Builder's knowledge after diligent inquiry, no event which, with the passage of time or the giving of notice, would constitute a default under the 395 Contracts has occurred; and

.9 that it is prequalified with the Department to perform all aspects of the 395 Work in accordance with the Department’s Rules Governing Prequalification Privileges, and covenants that it will not subcontract any part of the 395 Work to a Sub-contractor or Sub-subcontractor who is not prequalified with the Department in accordance with the Department’s Rules Governing Prequalification Privileges; provided, that this restriction does not apply to contract specialty items, consultants, manufacturers, suppliers, haulers or snow removal service providers.

11.3 Federal Requirements

Design-Builder shall follow all federal requirements set forth in Exhibit 11.3.

11.4 Exhibits

11.4.1 The following exhibits are made part of and incorporated into this 395 Design-Build Contract:

EXHIBIT 5.1 – EARLY WORKS SCOPE OF WORK

EXHIBIT 5.2.1 – REQUIREMENTS FOR SERVICE COMMENCEMENT

EXHIBIT 5.2.2 – REQUIREMENTS FOR FINAL COMPLETION

EXHIBIT 5.2.3 – REQUIREMENTS FOR PENTAGON SOUTH PARKING FINAL
COMPLETION

EXHIBIT 5.7 – REQUIREMENTS FOR COMPONENT FINAL COMPLETION

EXHIBIT 11.3 – FEDERAL REQUIREMENTS

**END OF PART 3
395 DESIGN-BUILD CONTRACT**

EXHIBIT 5.1

EARLY WORKS SCOPE OF WORK

[ATTACHED]

EARLY WORKS SCOPE OF WORK

Introduction

The LANE Team will utilize the Early Works program to maximize time gain on the 395 Project's critical path. To that end, our objective for Early Works is to strategically develop as much of the design as possible, subsequently supporting the construction activities on the critical path during the 2017 construction season. In the attached Early Works Fragnet, we depict our planned activities and costs for the Early Works with a total cost of \$9,983,300.00. The Early Works activities are organized into a Work Breakdown Structure (WBS) with five primary WBS groups and their sub-WBS groups as follows:

1. Administration
 - a. Project Milestones – Project and Contract Milestones (Early Works Period)
2. Design Management / Administration
 - a. Design Management – Subcontract, Baseline Schedule Development, and Design Management
 - b. Project Plan Development – Twelve (12) Project Development Plans
3. Early Works
 - a. LNTP Early Design – Final Design for Initial Construction, Utilities & Subsurface Exploration, Geotechnical Investigation, Surveys and Scope Validation
 - b. Sound Barriers – Sound Barrier Design
 - c. Construction – Non-permanent and Non-Destructive Construction
4. 395 Express Lanes
 - a. Design – Final Design for Segments 1 - 4
 - b. Submittals – Shop drawings (i.e. temporary barrier wall, light weight steel, reinforcing steel, forms, etc.)
5. Additional Department Improvement – Duke-Edsall Widening (DEW)
 - a. Design – Final Design for DEW
 - b. Submittals – Shop drawings (i.e. sound barrier, temporary barrier wall, etc.)

Project Plan Development

The schedule shows various submittals of the Project Development Plans. The scope of work includes both deliverable plans (RFP Part 2 Attachment 1.3) and Pre-Construction plans, and the twelve (12) Project Development Plan categories, as follows:

1. Transportation Management Plan
2. Utilities Plan
3. Environmental Management Plan
4. Design Quality Management Plan
5. Document Management Plan
6. Quality Management System Plan
7. ROW Acquisition Plan
8. Communications Plan
9. DBE/SWaM and Workforce Plan
10. Construction Quality Management Plan (CQMP)
11. Health, Safety and Security Plan
12. Design-Builder Operation Plans (Mobilization Plan, Design Execution Plan, Construction Execution Plan, Project Controls Plan and Information System & Technology Plan)

LNTP - Early Design

The WBS group represents the preliminary design activities that are required to advance the conceptual design to final design. Per the scope requirement in RFP Part 1, Section 1.3.6, the LANE Team will perform the following design supporting field work:

- a) Survey – scope of surveys work shall include both supplemental field topographical surveys and the task of updating the base mapping for the design plan.
- b) Geotechnical Investigation – scope shall include but not be limited to field investigations, borings, laboratory testing and preparation of geotechnical recommendations and reports.
- c) Utility Locating and Subsurface Utility Exploration (SUE) – scope includes but not limited to field verification of utilities, conflict evaluation, avoidance planning, cost responsibility determination, and the development of the utility relocation design plan.

Scope Validation Period

The Scope Validation Period is the 90-day period that begins with receipt of LNTP (RFP Part 4 Section 2.2). During this period, the LANE Team will thoroughly review and evaluate all of the 395 Contract Documents to verify and validate our proposed design concept and we will identify any defects, errors, or inconsistencies in the RFP documents that affect the LANE Team's ability to complete the Project within the proposed Contract Price and Schedule. The LANE Team has identified the following areas of interest for this review period:

- a) Pentagon Improvements Validation (drainage and topography)
- b) Bridge Rehabilitation quantities
- c) Existing Drainage Structures to Remain Validation
- d) Pavement Design Validation

Final Design for Initial Construction

As the preliminary design progresses, the LANE Team will take advantage of the Early Works Program to advance the schedule and maximize the extent of construction work that can be accomplished during the first season. The LANE Team has identified the following deliverables that will allow the Project to maximize the amount of initial construction and mitigate schedule risks:

- a) MOT / SW3P for Phase 1 & 2 – the completion of these design plans will allow the LANE Team to set-up MOT and work areas for the initial phases of the Project upon NTP. This will maximize our initial construction effort.
- b) Environmental Permitting – the early start of the permitting process will advance the start of construction and reduce the risk of the permit-related schedule delays particularly in the Pentagon Reservation (Segment 4).
- c) Temporary Pavement Design – this design package will allow the LANE Team to construct temporary pavements and the asphalt wedge required for Phase 1 and Phase 2 construction, respectively.
- d) Sound Barrier Analyses – This effort concerns the development of sound barrier analyses Package A & B for SBL and NBL sound barriers. The early start of the sound barrier analyses will advance the subsequent design and thus fabrication of sound barrier units, which will reduce the risk of fabrication-related schedule delays.
- e) Sound Barrier Design (Seminary Road) - early start of the sound barrier design will initiate the fabrication which will support work for the first construction season and mitigate the risk of schedule fabrication-related delays.
- f) Selected Early Works Bridge Rehabilitation - the completion of these design plans will allow the LANE Team to commence rehabilitation on a selected group of bridges upon start of construction. This will

maximize the amount of initial construction and optimize the resource allocation (refer to Section 4.8.2 Schedule Narrative for further discussion).

- g) Early Demolition and ITS (Phase 3) - the completion of these design plans will allow the LANE Team to perform demolition work and install ITS duct bank immediately after the Phase 3 MOT set-up. This maximizes the amount of initial construction.
- h) DEW Early Grade and Drainage - the completion of these design plans will allow the LANE Team to perform roadway, drainage, and structural work during the first season of construction, and provide gains against the schedule's critical path.
- i) ROW Acquisition – the acquisition of ROW is critical for providing access to project areas for construction of sound barriers, Eads Street, and DEW roadway work. The early start of this work will reduce the risks of delay and impacts to the Project.

Sound Barrier

The scope of work is to perform the final design for DEW, SBL and NBL sound barrier. The LANE Team will advance the design during the Early Works period and the fabrication of the wall post and panels can start as early as possible after NTP improve on the critical path and reduce the risk of delay which may occur during fabrication.

Construction for Non-Permanent and Non-Destructive Works

The LANE Team will take advantage of the Early Works and perform mobilization of certain Project resources. The LANE Team utilizes the following to represent the Early Works scope:

- a) Set-up Project Office –includes procurement of a land/office lease agreement and the physical set-up of the project offices (i.e. set-up field trailers, temporary utilities, etc.)
- b) Construct Laydown Yard (various locations identified under Section 4.7.1) – involves procurement of the property lease agreement, installation of security systems, miscellaneous clearing, set-up yard office space and provision of temporary utilities/drainage.

I-395 Express Lanes and Pentagon South Parking Improvements

During the Early Works Period, the LANE Team will progress the design for the four segments of the Project including the I-395 Express Lane Segments 1, 2, 3 and 4 (Pentagon Reservation). In addition, the LANE Team will develop shop drawings for stainless steel reinforcement, temporary barrier walls, light weight steel for bridge sound barrier, bearing pads, and shoring, to name a few key items.

Additional Department Improvements

During the Early Works Period, the LANE Team will perform the final design for Duke-Edsall Widening. In addition, we will also prepare shop drawings for temporary barrier wall and the Seminary Road sound barrier. The completion of this design will allow the construction of the DEW work to commence which is the first leg of the critical path leading to Service Commencement.

Conclusion

This Early Works Fragnet shows that the LANE Team's intention is to maximize the design work that is feasible during the Early Works period and to perform non-permanent/non-destructive work. Our goal is to maximize the amount of construction work during the first season in order to effect gains against the critical path and mitigate potential downstream schedule risks.

EARLY WORKS EARNED VALUE SCHEDULE

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Activity ID	Activity Name	Start	Finish	Original Duration	Budgeted Cost
All Resources ALL RESOURCES		15-Feb-17	10-Aug-17	127	\$9,983,300.00
PROJECT RESOURCES PROJECT RESOURCES		15-Feb-17	10-Aug-17	127	\$9,983,300.00
JOB SPECIFIC Job Specific Resources		15-Feb-17	10-Aug-17	127	\$9,983,300.00
XYXY I-395 Express Lanes		15-Feb-17	10-Aug-17	127	\$9,983,300.00
D-1 395 Express Lanes Work		15-Feb-17	10-Aug-17	127	\$7,833,240.00
D-1-01 EARLY WORKS		15-Feb-17	10-Aug-17	127	\$7,833,240.00
395 Express Lane Project - Initial Baseline Schedule With Revenue		15-Feb-17	10-Aug-17	127	\$7,833,240.00
Design Management / Admin		15-Feb-17	17-Jul-17	109	\$560,240.00
Project Plan Development		15-Feb-17	07-Jun-17	81	\$261,040.00
Design Quality Management Plan		15-Feb-17	18-Apr-17	45	\$20,800.00
DM-1000	Develop DQMP	15-Feb-17	28-Mar-17	30	\$20,000.00
DM-1080	Transurban Review and Approve DQMP	29-Mar-17	18-Apr-17	21	\$800.00
Environmental Management Plan		15-Feb-17	30-May-17	75	\$20,800.00
DM-1010	Develop Environmental Management Plan	15-Feb-17	09-May-17	60	\$20,000.00
DM-1100	Transurban Review and Approve Environmental Management Plan	10-May-17	30-May-17	21	\$800.00
Utilities Plan		15-Feb-17	02-May-17	55	\$10,240.00
DM-1020	Develop Utilities Plan	15-Feb-17	11-Apr-17	40	\$9,600.00
DM-1120	Transurban Review and Approve Utilities Plan	12-Apr-17	02-May-17	21	\$640.00
Transportation Management Plan		15-Feb-17	02-May-17	55	\$6,160.00
DM-1030	Develop Transportation Management Plan	15-Feb-17	11-Apr-17	40	\$6,000.00
DM-1140	Transurban Review & Approve Transportation Management Plan	12-Apr-17	02-May-17	21	\$160.00
Document Management Plan		15-Feb-17	18-Apr-17	45	\$3,360.00
DM-1160	Develop Document Management Plan	15-Feb-17	28-Mar-17	30	\$3,200.00
DM-1180	Transurban Review and Approve Document Management Plan	29-Mar-17	18-Apr-17	21	\$160.00
Quality Management System Plan		15-Feb-17	30-May-17	75	\$1,760.00
DM-1190	Develop Quality Management System Plan	15-Feb-17	09-May-17	60	\$1,600.00
DM-1210	Transurban Review and Approve Quality Management System Plan	10-May-17	30-May-17	21	\$160.00
ROW Acquisition Plan		15-Feb-17	30-May-17	75	\$19,520.00
DM-1220	Develop ROW Acquisition and Relocation Plan	15-Feb-17	09-May-17	60	\$19,200.00
DM-1240	Transurban Review and Approve ROW Acquisition and Relocation Plan	10-May-17	30-May-17	21	\$320.00
Communication Plan		15-Feb-17	30-May-17	75	\$4,000.00
DM-1250	Develop Communications Plan	15-Feb-17	09-May-17	60	\$4,000.00
DM-1270	Transurban Review and Approve Communications Plan	10-May-17	30-May-17	21	\$0.00
DBE/SWaM and Work Plan		15-Feb-17	07-Jun-17	81	\$6,400.00
DM-1280	Develop DBE/SWaM and Workforce Plan	15-Feb-17	09-May-17	60	\$6,400.00
DM-1300	Transurban DBE/SWaM and Workforce Plan	10-May-17	07-Jun-17	20	\$0.00
Construction Quality Management Plan (CQMP)		15-Feb-17	30-May-17	75	\$20,000.00
DM-1310	Develop CQMP	15-Feb-17	09-May-17	60	\$20,000.00
DM-1330	Transurban Review and Approve CQMP	10-May-17	30-May-17	21	\$0.00
Health Safety and Security Plan		15-Feb-17	18-Apr-17	45	\$60,000.00
DM-1340	Develop Health Safety and Security Plan	15-Feb-17	28-Mar-17	30	\$60,000.00
DM-1360	Transurban Review and Approve Health Safety and Security Plan	29-Mar-17	18-Apr-17	21	\$0.00
Design-Builder Operation Plans		15-Feb-17	30-May-17	75	\$88,000.00
DM-1370	Develop Design-Builder Operations Plans	15-Feb-17	09-May-17	60	\$88,000.00
DM-1390	Transurban Review Design-Builder Operations Plans (FYI)	10-May-17	30-May-17	21	\$0.00
Design Management		15-Feb-17	17-Jul-17	109	\$299,200.00
Design Management, Admin, & Project Controls		15-Feb-17	17-Jul-17	109	\$280,000.00
DM-1040	Design Management, Admin, & Project Controls (Early Work)	15-Feb-17	17-Jul-17	107	\$280,000.00
Prepare and Submit Baseline Schedule		15-Feb-17	30-May-17	75	\$19,200.00
DM-1050	Prepare and Submit Baseline Schedule	15-Feb-17	11-Apr-17	40	\$12,000.00
DM-1400	Transurban Review Baseline Schedule	12-Apr-17	02-May-17	21	\$0.00
DM-1410	Address Transurban's Comment on Baseline Schedule	03-May-17	09-May-17	5	\$7,200.00
DM-1420	Transurban Review Revised Baseline Schedule	10-May-17	30-May-17	21	\$0.00
Early Work		15-Feb-17	01-Aug-17	120	\$5,302,000.00
LNTN - Early Design		15-Feb-17	01-Aug-17	120	\$3,252,000.00
Utilities & Subsurface Utility Exploration		15-Feb-17	28-Jun-17	96	\$192,000.00
LNTN-1150	Perform SUE Field Work	15-Feb-17	31-May-17	75	\$150,000.00
LNTN-2115	Perform SUE Field Work - Pentagon Reservation	22-Mar-17	28-Mar-17	5	\$10,000.00
LNTN-1155	Update Base Mapping & Utility Records	01-Jun-17	21-Jun-17	15	\$24,000.00
LNTN-1160	Submit (internal) SUE Data for Design Input	22-Jun-17	28-Jun-17	5	\$8,000.00
Geotechnical Investigation		15-Feb-17	17-Jul-17	109	\$947,500.00
Boring Plan		15-Feb-17	28-Feb-17	10	\$10,000.00
LNTN-1070	Boring Plan Development & Approval	15-Feb-17	28-Feb-17	10	\$10,000.00
Access / ROE / Permits		15-Feb-17	07-Mar-17	15	\$7,500.00

EARLY WORKS EARNED VALUE SCHEDULE

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Activity ID	Activity Name	Start	Finish	Original Duration	Budgeted Cost
LNT-1080	Access / ROE / Permits	15-Feb-17	07-Mar-17	15	\$7,500.00
Geotechnical Borings					
LNT-1090	Boring and Utility Locates	01-Mar-17	21-Mar-17	15	\$4,000.00
LNT-1100	Geotechnical Borings - Early Work	05-Apr-17	17-Jul-17	72	\$686,000.00
LNT-1110	Geotechnical Lab Testing - Early Work	26-Apr-17	17-Jul-17	57	\$200,000.00
Temporary and Permanent Pavement Report					
LNT-1120	Develop Geotechnical Report and Recommendations	25-May-17	22-Jun-17	20	\$40,000.00
Survey					
LNT-1790	Perform ROW Survey	15-Feb-17	19-May-17	68	\$40,000.00
LNT-1060	Locate Geotechnical Test Holes and Utilities	15-Feb-17	06-Jul-17	100	\$21,600.00
LNT-1050	Perform Supplemental Design Survey	15-Feb-17	31-May-17	75	\$156,800.00
LNT-1065	Locate Geotechnical Test Holes and Utilities - Pentagon Reservation	29-Mar-17	04-Apr-17	5	\$2,400.00
LNT-1055	Perform Supplemental Design Survey - Pentagon Reservation	29-Mar-17	04-Apr-17	5	\$3,200.00
LNT-1061	Update Base Mapping	01-Jun-17	21-Jun-17	15	\$12,000.00
LNT-1062	Submit Updated Survey Data for Design Input (Internal)	22-Jun-17	28-Jun-17	5	\$4,000.00
Scope Validation					
Pavement Design Validation					
LNT-1020	Perform Pavement Design Validation	15-Feb-17	15-May-17	64	\$250,000.00
Existing Drainage Structures Validation					
LNT-1030	Existing Drainage Structures Validation	15-Feb-17	15-May-17	64	\$65,000.00
Drainage & Bridge Rehabilitation Quantities					
LNT-1040	Submit Complete Scope Validation Report	15-Feb-17	12-May-17	63	\$100,000.00
Final Design for Initial Construction					
MOT / SWPPP Phase 1, 2					
LNT-1170	Develop MOT / SWPPP Phase 1 & 2 Plan	15-Feb-17	10-May-17	61	\$155,000.00
LNT-1180	QA/QC MOT / SWPPP Phase 1 & 2 Plan	11-May-17	01-Jun-17	15	\$22,000.00
LNT-1200	Transurban Review MOT / SWPPP Phase 1 & 2 Plan	02-Jun-17	22-Jun-17	21	\$0.00
LNT-1210	RFC MOT / SWPPP Phase 1 & 2 Plan	23-Jun-17	07-Jul-17	10	\$28,000.00
Environmental Permitting					
404 / 401 Permits					
LNT-1220	Delineate any additional areas outside of the NEPA assessed corridor (if req'd)	15-Feb-17	21-Jun-17	90	\$40,000.00
LNT-1250	Draft 404/401 permit application (begin at 60% plan design) - Early Work	22-Jun-17	17-Jul-17	17	\$25,000.00
408 Permits					
LNT-1750	Delineate any additional areas outside of the NEPA assessed corridor (if req'd)	15-Feb-17	21-Jun-17	90	\$40,000.00
LNT-1760	Draft 408 permit application (begin at 60% plan design) - Early Work	22-Jun-17	17-Jul-17	17	\$25,000.00
Sensitive Resource Coordination					
LNT-1240	Provide Sensitive Resource Coordination, as needed	15-Feb-17	09-Jun-17	82	\$30,000.00
Regional and County planning and management program					
LNT-1290	Provide Regional and County planning and management program coordination, as nee	15-Feb-17	17-Jul-17	107	\$30,000.00
Sound Barrier Analysis - Package A (SBL)					
LNT-1260	Prepare Draft Noise Abatement Design Report (NADR) - Package A	15-Feb-17	25-Apr-17	50	\$230,000.00
LNT-1270	Perform QA/QC Review of NADR - Package A	26-Apr-17	09-May-17	10	\$20,000.00
LNT-1360	Transurban Review Draft NADR - Package A	10-May-17	08-Jun-17	21	\$0.00
LNT-1370	Address Comment and Prepare Final NADR - Package A	09-Jun-17	29-Jun-17	15	\$10,000.00
LNT-1390	Transurban Approves Final NADR - Package A	30-Jun-17	07-Jul-17	5	\$0.00
LNT-1400	Department Develops Letter and Obtains Concurrence - Package A	10-Jul-17	14-Jul-17	5	\$0.00
Sound Barrier Analysis - Package B (NBL)					
LNT-1460	Prepare Draft Noise Abatement Design Report (NADR) - Package B	13-Mar-17	24-May-17	53	\$220,000.00
LNT-1470	Perform QA/QC Review of NADR - Package B	25-May-17	08-Jun-17	10	\$25,000.00
LNT-1490	Transurban Review Draft NADR - Package B	09-Jun-17	10-Jul-17	21	\$0.00
LNT-1500	Address Comment and Prepare Final NADR - Package B	11-Jul-17	31-Jul-17	15	\$0.00
Early Bridge Rehab Package					
LNT-1300	Develop Early Bridge Rehab Design	15-Feb-17	24-May-17	71	\$195,000.00
LNT-1590	QA/QC Early Bridge Rehab Design	25-May-17	08-Jun-17	10	\$17,000.00
LNT-1610	Transurban Review Early Bridge Rehab Design	09-Jun-17	29-Jun-17	21	\$0.00
LNT-1620	RFC Early Bridge Rehab Design	30-Jun-17	07-Jul-17	5	\$8,000.00
Early Demo and ITS Package					
LNT-1310	Develop MOT / SWPPP Phase 3 Design	15-Feb-17	23-May-17	70	\$190,000.00
LNT-1640	Develop ITS Design	16-Feb-17	24-May-17	70	\$0.00
LNT-1630	Develop Roadway Demo Design	16-Feb-17	24-May-17	70	\$94,000.00
LNT-1650	QA/QC Early Demo and ITS Package	25-May-17	15-Jun-17	15	\$16,000.00
LNT-1670	Transurban Review Early Demo and ITS Package	16-Jun-17	06-Jul-17	21	\$0.00
LNT-1680	RFC Early Demo and ITS Package	07-Jul-17	20-Jul-17	10	\$0.00
ROW Acquisition					
22-May-17 01-Aug-17 52 \$37,500.00					

EARLY WORKS EARNED VALUE SCHEDULE

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Activity ID	Activity Name	Start	Finish	Original Duration	Budgeted Cost
	Eads Street	22-May-17	01-Aug-17	52	\$23,194.00
	LNTP-1970 Title Report Preparation - Eads St	22-May-17	19-Jun-17	20	\$1,517.00
	LNTP-1960 Prepare ROW Acquisition Plats - Eads St	22-May-17	19-Jun-17	20	\$21,677.00
	LNTP-1980 Appraisals - Eads St	20-Jun-17	01-Aug-17	30	\$0.00
	I-395 Express Lane - Seg 2	22-May-17	01-Aug-17	52	\$14,306.00
	LNTP-2050 Title Report Preparation - I-395 Seg 2	22-May-17	19-Jun-17	20	\$0.00
	LNTP-2040 Prepare ROW Acquisition Plats - I-395 Seg 2	22-May-17	19-Jun-17	20	\$14,306.00
	LNTP-2060 Appraisals - I-395 Seg 2	20-Jun-17	01-Aug-17	30	\$0.00
	Sound Barriers	16-Feb-17	17-Jul-17	108	\$530,000.00
	SBL Sound Barrier	16-Feb-17	22-Jun-17	91	\$365,000.00
	Geotechnical - SBL Sound Barrier	13-Apr-17	22-Jun-17	51	\$225,000.00
	Sound Barrier & Retaining Wall Memo - SBL Sound Barrier	13-Apr-17	22-Jun-17	51	\$225,000.00
	SB-1850 Prepare/Submit Intermediate Sound Barrier & Retaining Wall Memo - SBL Sound Barrier	13-Apr-17	22-Jun-17	50	\$225,000.00
	Coordinate Third Party and Governmental Approvals	16-Feb-17	22-Jun-17	91	\$55,000.00
	SB-1000 Coordinate Third Party and Governmental Approvals	16-Feb-17	22-Jun-17	90	\$55,000.00
	Coordinate Utilities, ROW & Permitting	16-Feb-17	22-Jun-17	91	\$55,000.00
	SB-1010 Coordinate Utilities, ROW & Permitting	16-Feb-17	22-Jun-17	90	\$55,000.00
	Finalize Sound Barrier Configuration & Aesthetics	16-Feb-17	22-Jun-17	91	\$30,000.00
	SB-1020 Finalize Sound Barrier Configuration & Aesthetics	16-Feb-17	22-Jun-17	90	\$30,000.00
	NBL Sound Barrier	16-Feb-17	17-Jul-17	108	\$165,000.00
	Geotechnical - NBL Sound Barrier	25-May-17	17-Jul-17	38	\$125,000.00
	Sound Barrier & Retaining Wall Memo - NBL Sound Barrier	25-May-17	17-Jul-17	38	\$125,000.00
	SB-1810 Prepare/Submit Intermediate Sound Barrier & Retaining Wall Memo - NBL Sound Barrier	25-May-17	17-Jul-17	36	\$125,000.00
	Coordinate Third Party and Governmental Approvals	16-Feb-17	17-Jul-17	108	\$15,000.00
	SB-1330 Coordinate Third Party and Governmental Approvals - Early Work	16-Feb-17	17-Jul-17	106	\$15,000.00
	Coordinate Utilities, ROW & Permitting	16-Feb-17	17-Jul-17	108	\$15,000.00
	SB-1340 Coordinate Utilities, ROW & Permitting - Early Work	16-Feb-17	17-Jul-17	106	\$15,000.00
	Finalize Sound Barrier Configuration & Aesthetics	16-Feb-17	17-Jul-17	108	\$10,000.00
	SB-1350 Finalize Sound Barrier Configuration & Aesthetics - Early Work	16-Feb-17	17-Jul-17	106	\$10,000.00
	Construction	15-Feb-17	21-Jun-17	91	\$1,520,000.00
	CE00-1010 Early Work Construction Staff for Early Work Scope Validation	15-Feb-17	31-May-17	75	\$350,000.00
	CE00-1020 Early Work Construction Staff for Constructability Review	12-Apr-17	31-May-17	25	\$250,000.00
	C156-1170 Construct Laydown Yard, Early Work - Project Wide	19-Apr-17	31-May-17	30	\$400,000.00
	CE00-1000 Set-Up Field Office, Early Work - Project Wide	19-Apr-17	21-Jun-17	45	\$520,000.00
	395 Express Lane	15-Feb-17	10-Aug-17	127	\$1,971,000.00
	Design	15-Feb-17	10-Aug-17	127	\$1,971,000.00
	Segment 1 (1533+65 to 1613+65)	15-Feb-17	20-Jul-17	112	\$388,000.00
	Roadway Design - Segment 1	15-Feb-17	20-Jul-17	112	\$68,000.00
	SG1-1000 Develop Intermediate Roadway Design - Segment 1	15-Feb-17	25-Apr-17	50	\$68,000.00
	SG1-1010 Develop Final Roadway Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
	Drainage Design - Segment 1	15-Feb-17	20-Jul-17	112	\$65,000.00
	SG1-1020 Develop Intermediate Drainage Design - Segment 1	15-Feb-17	25-Apr-17	50	\$65,000.00
	SG1-1030 Develop Final Drainage Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
	Structures Design - Segment 1	15-Feb-17	20-Jul-17	112	\$40,000.00
	Bridge Design - Segment 1	15-Feb-17	20-Jul-17	112	\$0.00
	SG1-1040 Develop Intermediate Bridge Design - Segment 1	15-Feb-17	25-Apr-17	50	\$0.00
	SG1-1050 Develop Final Bridge Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
	Signing & Lighting Structures Design - Segment 1	15-Feb-17	20-Jul-17	112	\$20,000.00
	SG1-1060 Develop Intermediate Signing & Lighting Structures Design - Segment 1	15-Feb-17	25-Apr-17	50	\$20,000.00
	SG1-1070 Develop Final Signing & Lighting Structures Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
	Toll Gantry Structures Design - Segment 1	15-Feb-17	20-Jul-17	112	\$20,000.00
	SG1-1080 Develop Intermediate Toll Gantry Structures Design - Segment 1	15-Feb-17	25-Apr-17	50	\$20,000.00
	SG1-1090 Develop Final Toll Gantry Structures Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
	Geotechnical Design - Segment 1	15-Feb-17	20-Jul-17	112	\$55,000.00
	Structures Memo - Segment 1	15-Feb-17	20-Jul-17	112	\$55,000.00
	SG1-1120 Develop Intermediate Structures Memo - Segment 1	15-Feb-17	25-Apr-17	50	\$55,000.00
	SG1-1130 Develop Final Structures Memo - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
	ITS / TTMS Design - Segment 1	15-Feb-17	20-Jul-17	112	\$30,000.00
	SG1-1160 Develop Intermediate ITS / TTMS Design - Segment 1	15-Feb-17	25-Apr-17	50	\$30,000.00
	SG1-1170 Develop Final ITS / TTMS Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
	Maintenance of Traffic (MOT) Design - Segment 1	15-Feb-17	20-Jul-17	112	\$50,000.00
	SG1-1140 Develop Intermediate MOT Design - Segment 1	15-Feb-17	25-Apr-17	50	\$50,000.00
	SG1-1150 Develop Final MOT Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
	Signing & Illumination Design - Segment 1	15-Feb-17	20-Jul-17	112	\$15,000.00

EARLY WORKS EARNED VALUE SCHEDULE

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Activity ID	Activity Name	Start	Finish	Original Duration	Budgeted Cost
SG1-1180	Develop Intermediate Signing & Illumination Design - Segment 1	15-Feb-17	25-Apr-17	50	\$15,000.00
SG1-1190	Develop Final Signing & Illumination Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
Utilities Design - Segment 1		15-Feb-17	20-Jul-17	112	\$10,000.00
SG1-1200	Develop Intermediate Utilities Design - Segment 1	15-Feb-17	25-Apr-17	50	\$10,000.00
SG1-1210	Develop Final Utilities Design - Segment 1	01-Jun-17	20-Jul-17	35	\$0.00
Design Submittal - Segment 1 Package		26-Apr-17	28-Jun-17	46	\$55,000.00
Intermediate Design Submittal - Segment 1 Package		26-Apr-17	28-Jun-17	46	\$55,000.00
SG1-1220	Assemble Intermediate Design Submittal - Segment 1 Package	26-Apr-17	09-May-17	10	\$22,000.00
SG1-1230	Perform QA/QC Review Intermediate Design Submittal - Segment 1 Package	10-May-17	31-May-17	15	\$17,000.00
SG1-1240	Constr. Review Intermediate Design Submittal - Segment 1 Package	17-May-17	31-May-17	10	\$0.00
SG1-1260	Transurban Review Intermediate Design Submittal - Segment 1 Package	01-Jun-17	21-Jun-17	21	\$0.00
SG1-1270	Address Review Comments Intermediate Design Submittal - Segment 1 Package	22-Jun-17	28-Jun-17	5	\$16,000.00
Segment 2 (1613+65 to 1758+65)		08-Mar-17	10-Aug-17	112	\$836,000.00
Roadway - Segment 2		08-Mar-17	10-Aug-17	112	\$230,000.00
SG2-1000	Develop Intermediate Roadway Design - Segment 2	08-Mar-17	16-May-17	50	\$230,000.00
SG2-1010	Develop Final Roadway Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Drainage - Segment 2		08-Mar-17	10-Aug-17	112	\$206,000.00
SG2-1020	Develop Intermediate Drainage Design - Segment 2	08-Mar-17	16-May-17	50	\$206,000.00
SG2-1030	Develop Final Drainage Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Structures - Segment 2		08-Mar-17	10-Aug-17	112	\$80,000.00
Bridge Design - Segment 2		08-Mar-17	10-Aug-17	112	\$64,000.00
SG2-1310	Develop Intermediate Bridge Design - Segment 2	08-Mar-17	16-May-17	50	\$64,000.00
SG2-1320	Develop Final Bridge Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Signing & Lighting Structures Design - Segment 2		08-Mar-17	10-Aug-17	112	\$8,000.00
SG2-1330	Develop Intermediate Signing & Lighting Structures Design - Segment 2	08-Mar-17	16-May-17	50	\$8,000.00
SG2-1340	Develop Final Signing & Lighting Structures Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Toll Gantry Structures Design - Segment 2		08-Mar-17	10-Aug-17	112	\$8,000.00
SG2-1350	Develop Intermediate Toll Gantry Structures Design - Segment 2	08-Mar-17	16-May-17	50	\$8,000.00
SG2-1360	Develop Final Toll Gantry Structures Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Geotechnical - Segment 2		08-Mar-17	10-Aug-17	112	\$60,000.00
Structures Memo - Segment 2		08-Mar-17	10-Aug-17	112	\$60,000.00
SG2-1080	Develop Intermediate Structures Memo - Segment 2	08-Mar-17	16-May-17	50	\$60,000.00
SG2-1090	Develop Final Structures Memo - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Maintenance of Traffic (MOT) - Segment 2		08-Mar-17	10-Aug-17	112	\$70,000.00
SG2-1100	Develop Intermediate MOT Design - Segment 2	08-Mar-17	16-May-17	50	\$70,000.00
SG2-1110	Develop Final MOT Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
ITS / TTMS - Segment 2		08-Mar-17	10-Aug-17	112	\$80,000.00
SG2-1120	Develop Intermediate ITS / TTMS Design - Segment 2	08-Mar-17	16-May-17	50	\$80,000.00
SG2-1130	Develop Final ITS / TTMS Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Signing & Illumination - Segment 2		08-Mar-17	10-Aug-17	112	\$30,000.00
SG2-1140	Develop Intermediate Signing & Illumination Signs Design - Segment 2	08-Mar-17	16-May-17	50	\$30,000.00
SG2-1150	Develop Final Signing & Illumination Signs Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Utilities - Segment 2		08-Mar-17	10-Aug-17	112	\$30,000.00
SG2-1160	Develop Intermediate Utilities Design - Segment 2	08-Mar-17	16-May-17	50	\$30,000.00
SG2-1170	Develop Final Utilities Design - Segment 2	22-Jun-17	10-Aug-17	35	\$0.00
Design Submittal - Segment 2 Package		17-May-17	12-Jul-17	41	\$50,000.00
Intermediate Design Submittal - Segment 2 Package		17-May-17	12-Jul-17	41	\$50,000.00
SG2-1180	Assemble Intermediate Design Submittal - Segment 2 Package	17-May-17	31-May-17	10	\$29,000.00
SG2-1190	Perform QA/QC Review Intermediate Design Submittal - Segment 2 Package	01-Jun-17	21-Jun-17	15	\$21,000.00
SG2-1200	Constr. Review Intermediate Design Submittal - Segment 2 Package	08-Jun-17	21-Jun-17	10	\$0.00
SG2-1220	Transurban Review Intermediate Design Submittal - Segment 2 Package	22-Jun-17	12-Jul-17	21	\$0.00
Segment 3 (1758+65 to 1882+20)		31-Mar-17	14-Jul-17	76	\$747,000.00
Roadway - Segment 3		31-Mar-17	08-Jun-17	50	\$200,000.00
SG3-1000	Develop Intermediate Roadway Design - Segment 3	31-Mar-17	08-Jun-17	49	\$200,000.00
Drainage - Segment 3		31-Mar-17	08-Jun-17	50	\$50,000.00
SG3-1020	Develop Intermediate Drainage Design - Segment 3	31-Mar-17	08-Jun-17	49	\$50,000.00
Structures - Segment 3		31-Mar-17	08-Jun-17	50	\$340,000.00
Bridge Design - Segment 3		31-Mar-17	08-Jun-17	50	\$300,000.00
SG3-1040	Develop Intermediate Bridge Design - Segment 3	31-Mar-17	08-Jun-17	49	\$300,000.00
Signing & Lighting Structures Design - Segment 3		31-Mar-17	08-Jun-17	50	\$20,000.00
SG3-1060	Develop Intermediate Signing & Lighting Structures Design - Segment 3	31-Mar-17	08-Jun-17	49	\$20,000.00
Toll Gantry Structures Design - Segment 3		31-Mar-17	08-Jun-17	50	\$20,000.00
SG3-1080	Develop Intermediate Toll Gantry Structures Design - Segment 3	31-Mar-17	08-Jun-17	49	\$20,000.00
Geotechnical - Segment 3		31-Mar-17	08-Jun-17	50	\$60,000.00

EARLY WORKS EARNED VALUE SCHEDULE

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Activity ID	Activity Name	Start	Finish	Original Duration	Budgeted Cost
Structures Memo - Segment 3					
SG3-1120	Develop Intermediate Structures Memo - Segment 3	31-Mar-17	08-Jun-17	50	\$60,000.00
Maintenance of Traffic (MOT) - Segment 3					
SG3-1140	Develop Intermediate MOT Design - Segment 3	31-Mar-17	08-Jun-17	49	\$40,000.00
ITS / TTMS / Traffic Signals - Segment 3					
SG3-1160	Develop Intermediate ITS / TTMS / Traffic Signal Design - Segment 3	31-Mar-17	08-Jun-17	49	\$0.00
Utilities - Segment 3					
SG3-1200	Develop Intermediate Utilities Design - Segment 3	31-Mar-17	08-Jun-17	49	\$30,000.00
Design Submittal - Segment 3 Package					
Intermediate Design Submittal - Segment 3 Package					
SG3-1220	Assemble Intermediate Design Submittal - Segment 3 Package	09-Jun-17	14-Jul-17	26	\$27,000.00
SG3-1230	Perform QA/QC Review Intermediate Design Submittal - Segment 3 Package	09-Jun-17	22-Jun-17	10	\$0.00
SG3-1240	Const. Review Intermediate Design Submittal - Segment 3 Package	23-Jun-17	14-Jul-17	15	\$27,000.00
SG3-1240	Const. Review Intermediate Design Submittal - Segment 3 Package	30-Jun-17	14-Jul-17	10	\$0.00
Signing & Illumination Signs - Segment 3					
SG3-1180	Develop Intermediate Signing & Illumination Signs Design - Segment 3	31-Mar-17	08-Jun-17	49	\$0.00
D-2 Additional Department Improvements Work					
D-2-1 EARLY WORKS					
395 Express Lane Project - Initial Baseline Schedule With Revenue					
Design Management / Admin					
Project Plan Development					
Design Quality Management Plan					
DM-1000	Develop DQMP	15-Feb-17	18-Apr-17	45	\$5,200.00
DM-1080	Transurban Review and Approve DQMP	15-Feb-17	28-Mar-17	30	\$5,000.00
DM-1080	Transurban Review and Approve DQMP	29-Mar-17	18-Apr-17	21	\$200.00
Environmental Management Plan					
DM-1010	Develop Environmental Management Plan	15-Feb-17	30-May-17	75	\$5,200.00
DM-1100	Transurban Review and Approve Environmental Management Plan	15-Feb-17	09-May-17	60	\$5,000.00
DM-1100	Transurban Review and Approve Environmental Management Plan	10-May-17	30-May-17	21	\$200.00
Utilities Plan					
DM-1020	Develop Utilities Plan	15-Feb-17	02-May-17	55	\$2,560.00
DM-1120	Transurban Review and Approve Utilities Plan	15-Feb-17	11-Apr-17	40	\$2,400.00
DM-1120	Transurban Review and Approve Utilities Plan	12-Apr-17	02-May-17	21	\$160.00
Transportation Management Plan					
DM-1030	Develop Transportation Management Plan	15-Feb-17	02-May-17	55	\$1,540.00
DM-1030	Develop Transportation Management Plan	15-Feb-17	11-Apr-17	40	\$1,500.00
DM-1140	Transurban Review & Approve Transportation Management Plan	12-Apr-17	02-May-17	21	\$40.00
Document Management Plan					
DM-1160	Develop Document Management Plan	15-Feb-17	18-Apr-17	45	\$840.00
DM-1160	Develop Document Management Plan	15-Feb-17	28-Mar-17	30	\$800.00
DM-1180	Transurban Review and Approve Document Management Plan	29-Mar-17	18-Apr-17	21	\$40.00
Quality Management System Plan					
DM-1190	Develop Quality Management System Plan	15-Feb-17	30-May-17	75	\$440.00
DM-1190	Develop Quality Management System Plan	15-Feb-17	09-May-17	60	\$400.00
DM-1210	Transurban Review and Approve Quality Management System Plan	10-May-17	30-May-17	21	\$40.00
ROW Acquisition Plan					
DM-1220	Develop ROW Acquisition and Relocation Plan	15-Feb-17	30-May-17	75	\$4,880.00
DM-1240	Transurban Review and Approve ROW Acquisition and Relocation Plan	15-Feb-17	09-May-17	60	\$4,800.00
DM-1240	Transurban Review and Approve ROW Acquisition and Relocation Plan	10-May-17	30-May-17	21	\$80.00
Communication Plan					
DM-1250	Develop Communications Plan	15-Feb-17	30-May-17	75	\$1,000.00
DM-1250	Develop Communications Plan	15-Feb-17	09-May-17	60	\$1,000.00
DM-1270	Transurban Review and Approve Communications Plan	10-May-17	30-May-17	21	\$0.00
DBE/SWaM and Work Plan					
DM-1280	Develop DBE/SWaM and Workforce Plan	15-Feb-17	07-Jun-17	81	\$1,600.00
DM-1280	Develop DBE/SWaM and Workforce Plan	15-Feb-17	09-May-17	60	\$1,600.00
DM-1300	Transurban DBE/SWaM and Workforce Plan	10-May-17	07-Jun-17	20	\$0.00
Construction Quality Management Plan (CQMP)					
DM-1310	Develop CQMP	15-Feb-17	30-May-17	75	\$5,000.00
DM-1310	Develop CQMP	15-Feb-17	09-May-17	60	\$5,000.00
DM-1330	Transurban Review and Approve CQMP	10-May-17	30-May-17	21	\$0.00
Health Safety and Security Plan					
DM-1340	Develop Health Safety and Security Plan	15-Feb-17	30-May-17	75	\$15,000.00
DM-1340	Develop Health Safety and Security Plan	15-Feb-17	28-Mar-17	30	\$15,000.00
DM-1360	Transurban Review and Approve Health Safety and Security Plan	29-Mar-17	18-Apr-17	21	\$0.00
Design-Builder Operation Plans					
DM-1370	Develop Design-Builder Operations Plans	15-Feb-17	30-May-17	75	\$22,000.00
DM-1370	Develop Design-Builder Operations Plans	15-Feb-17	09-May-17	60	\$22,000.00
DM-1390	Transurban Review Design-Builder Operations Plans (FYI)	10-May-17	30-May-17	21	\$0.00
Design Management					
Design Management, Admin, & Project Controls					
DM-1040	Design Management, Admin, & Project Controls (Early Work)	15-Feb-17	17-Jul-17	109	\$70,000.00
DM-1040	Design Management, Admin, & Project Controls (Early Work)	15-Feb-17	17-Jul-17	107	\$70,000.00
Prepare and Submit Baseline Schedule					
DM-1050	Prepare and Submit Baseline Schedule	15-Feb-17	30-May-17	75	\$4,800.00
DM-1050	Prepare and Submit Baseline Schedule	15-Feb-17	11-Apr-17	40	\$3,000.00
DM-1400	Transurban Review Baseline Schedule	12-Apr-17	02-May-17	21	\$0.00
DM-1410	Address Transurban's Comment on Baseline Schedule	03-May-17	09-May-17	5	\$1,800.00
DM-1420	Transurban Review Revised Baseline Schedule	10-May-17	30-May-17	21	\$0.00

EARLY WORKS EARNED VALUE SCHEDULE

				01-Feb-17 22:16	
Activity ID	Activity Name	Start	Finish	Original Duration	Budgeted Cost
Early Work		15-Feb-17	01-Aug-17	120	\$1,198,000.00
LNTP - Early Design		15-Feb-17	01-Aug-17	120	\$818,000.00
Utilities & Subsurface Utility Exploration		15-Feb-17	28-Jun-17	96	\$48,000.00
LNTP-1150	Perform SUE Field Work	15-Feb-17	31-May-17	75	\$37,500.00
LNTP-2115	Perform SUE Field Work - Pentagon Reservation	22-Mar-17	28-Mar-17	5	\$2,500.00
LNTP-1155	Update Base Mapping & Utility Records	01-Jun-17	21-Jun-17	15	\$6,000.00
LNTP-1160	Submit (internal) SUE Data for Design Input	22-Jun-17	28-Jun-17	5	\$2,000.00
Geotechnical Investigation		15-Feb-17	22-Jun-17	92	\$32,500.00
Access / ROE / Permits		15-Feb-17	07-Mar-17	15	\$7,500.00
LNTP-1080	Access / ROE / Permits	15-Feb-17	07-Mar-17	15	\$7,500.00
Geotechnical Borings		15-Mar-17	28-Mar-17	10	\$15,000.00
LNTP-1095	Boring and Utility Locates - Pentagon Reservation	15-Mar-17	21-Mar-17	5	\$1,000.00
LNTP-1105	Geotechnical Borings - Pentagon Reservation	22-Mar-17	28-Mar-17	5	\$14,000.00
Temporary and Permanent Pavement Report		25-May-17	22-Jun-17	21	\$10,000.00
LNTP-1120	Develop Geotechnical Report and Recommendations	25-May-17	22-Jun-17	20	\$10,000.00
Survey		15-Feb-17	06-Jul-17	102	\$60,000.00
LNTP-1790	Perform ROW Survey	15-Feb-17	19-May-17	68	\$10,000.00
LNTP-1060	Locate Geotechnical Test Holes and Utilities	15-Feb-17	06-Jul-17	100	\$5,400.00
LNTP-1050	Perform Supplemental Design Survey	15-Feb-17	31-May-17	75	\$39,200.00
LNTP-1065	Locate Geotechnical Test Holes and Utilities - Pentagon Reservation	29-Mar-17	04-Apr-17	5	\$600.00
LNTP-1055	Perform Supplemental Design Survey - Pentagon Reservation	29-Mar-17	04-Apr-17	5	\$800.00
LNTP-1061	Update Base Mapping	01-Jun-17	21-Jun-17	15	\$3,000.00
LNTP-1062	Submit Updated Survey Data for Design Input (Internal)	22-Jun-17	28-Jun-17	5	\$1,000.00
Scope Validation		15-Feb-17	15-May-17	64	\$200,000.00
Pentagon Improvements Validation		15-Feb-17	15-May-17	64	\$200,000.00
LNTP-1045	Perform Pentagon Improvements Validation	15-Feb-17	15-May-17	64	\$200,000.00
Final Design for Initial Construction		15-Feb-17	01-Aug-17	120	\$477,500.00
Sound Barrier Design (Seminary Road)		16-Feb-17	22-Jun-17	91	\$180,000.00
Coordinate Third Party and Governmental Approvals		16-Feb-17	15-Mar-17	20	\$10,000.00
SB-1650	Coordinate Third Party and Governmental Approvals	16-Feb-17	15-Mar-17	20	\$10,000.00
Coordinate Utilities, ROW & Permitting		16-Feb-17	15-Mar-17	20	\$10,000.00
SB-1660	Coordinate Utilities, ROW & Permitting	16-Feb-17	15-Mar-17	20	\$10,000.00
Finalize Sound Barrier Configuration & Aesthetics		16-Feb-17	15-Mar-17	20	\$5,000.00
SB-1670	Finalize Sound Barrier Configuration & Aesthetics	16-Feb-17	15-Mar-17	20	\$5,000.00
Final Design - Sound Barrier Structures Plan		16-Mar-17	22-Jun-17	71	\$155,000.00
SB-1740	Develop Final Sound Barrier Structures Plan	16-Mar-17	10-May-17	40	\$130,000.00
SB-1750	Perform QA/QC Review - Final Sound Barrier Structures Plan	11-May-17	01-Jun-17	15	\$25,000.00
SB-1780	Transurban Review - Final Sound Barrier Structures Plan	02-Jun-17	22-Jun-17	21	\$0.00
DEW Early Grade & Drain Package		15-Feb-17	14-Jul-17	108	\$260,000.00
LNTP-1700	Develop SWPPP - DEW Early Grade & Drain	15-Feb-17	16-May-17	65	\$88,000.00
LNTP-1690	Develop DEW Early Drainage Design	15-Feb-17	16-May-17	65	\$88,000.00
LNTP-1320	Develop MOT DEW Design	15-Feb-17	16-May-17	65	\$66,000.00
LNTP-1710	QA/QC DEW Early Grade and Drainage Package	17-May-17	07-Jun-17	15	\$18,000.00
LNTP-1730	Transurban Review DEW Early Grade & Drain Package	09-Jun-17	29-Jun-17	21	\$0.00
LNTP-1740	RFC DEW Early Grade & Drain Package	30-Jun-17	14-Jul-17	10	\$0.00
ROW Acquisition		22-May-17	01-Aug-17	52	\$37,500.00
DEW Phase 1 Area 2		22-May-17	01-Aug-17	52	\$25,276.00
LNTP-1810	Title Report Preparation - DEW Ph 1 Area 2	22-May-17	19-Jun-17	20	\$1,654.00
LNTP-1800	Prepare ROW Acquisition Plats - DEW Ph 1 Area 2	22-May-17	19-Jun-17	20	\$23,622.00
LNTP-1820	Appraisals - DEW Ph 1 Area 2	20-Jun-17	01-Aug-17	30	\$0.00
DEW Phase 2 Area 2		22-May-17	01-Aug-17	52	\$12,224.00
LNTP-1890	Title Report Preparation - DEW Ph 2 Area 2	22-May-17	19-Jun-17	20	\$413.00
LNTP-1880	Prepare ROW Acquisition Plats - DEW Ph 2 Area 2	22-May-17	19-Jun-17	20	\$11,811.00
LNTP-1900	Appraisals - DEW Ph 2 Area 2	20-Jun-17	01-Aug-17	30	\$0.00
Construction		15-Feb-17	21-Jun-17	91	\$380,000.00
CE00-1010	Early Work Construction Staff for Early Work Scope Validation	15-Feb-17	31-May-17	75	\$150,000.00
C156-1170	Construct Laydown Yard, Early Work - Project Wide	19-Apr-17	31-May-17	30	\$100,000.00
CE00-1000	Set-Up Field Office, Early Work - Project Wide	19-Apr-17	21-Jun-17	45	\$130,000.00
395 Express Lane		15-Feb-17	27-Jul-17	117	\$254,000.00
Design		15-Feb-17	27-Jul-17	117	\$254,000.00
Segment 4 Package (Pentagon Parking Lot)		15-Feb-17	27-Jul-17	117	\$254,000.00
Roadway - Segment 4		15-Feb-17	21-Jun-17	91	\$40,000.00
SG4-1000	Develop Initial Roadway Design - Segment 4	15-Feb-17	04-Apr-17	35	\$40,000.00
SG4-1410	Develop Intermediate Roadway Design - Segment 4	10-May-17	21-Jun-17	30	\$0.00

EARLY WORKS EARNED VALUE SCHEDULE

				01-Feb-17 22:16	
Activity ID	Activity Name	Start	Finish	Original Duration	Budgeted Cost
Drainage - Segment 4		15-Feb-17	21-Jun-17	91	\$60,000.00
SG4-1020	Develop Initial Drainage Design - Segment 4	15-Feb-17	04-Apr-17	35	\$60,000.00
SG4-1420	Develop Intermediate Drainage Design - Segment 4	10-May-17	21-Jun-17	30	\$0.00
Traffic Signal - Segment 4		15-Feb-17	21-Jun-17	91	\$40,000.00
SG4-1160	Develop Initial Traffic Signal Design - Segment 4	15-Feb-17	04-Apr-17	35	\$40,000.00
SG4-1490	Develop Intermediate Traffic Signal Design - Segment 4	10-May-17	21-Jun-17	30	\$0.00
Maintenance of Traffic (MOT) - Segment 4		15-Feb-17	21-Jun-17	91	\$15,000.00
SG4-1140	Develop Initial MOT Design - Segment 4	15-Feb-17	04-Apr-17	35	\$15,000.00
SG4-1480	Develop Intermediate MOT Design - Segment 4	10-May-17	21-Jun-17	30	\$0.00
Utilities - Segment 4		15-Feb-17	21-Jun-17	91	\$20,000.00
SG4-1200	Develop Initial Utilities Design - Segment 4	15-Feb-17	04-Apr-17	35	\$20,000.00
SG4-1510	Develop Intermediate Utilities Design - Segment 4	10-May-17	21-Jun-17	30	\$0.00
Signing & Illumination - Segment 4		15-Feb-17	21-Jun-17	91	\$5,000.00
SG4-1180	Develop Initial Signing & Illumination Design - Segment 4	15-Feb-17	04-Apr-17	35	\$5,000.00
SG4-1500	Develop Intermediate Signing & Illumination Design - Segment 4	10-May-17	21-Jun-17	30	\$0.00
Design Submittal - Segment 4 Package		05-Apr-17	27-Jul-17	82	\$74,000.00
Initial Design Submittal - Segment 4 Package		05-Apr-17	13-Jun-17	50	\$52,000.00
SG4-1220	Assemble Initial Design Submittal - Segment 4 Package	05-Apr-17	18-Apr-17	10	\$22,000.00
SG4-1230	Perform QA/QC Review Initial Design Submittal - Segment 4 Package	19-Apr-17	09-May-17	15	\$13,000.00
SG4-1240	Constr. Review Initial Design Submittal - Segment 4 Package	26-Apr-17	09-May-17	10	\$10,000.00
SG4-1260	Transurban Review Initial Design Submittal - Segment 4 Package	10-May-17	06-Jun-17	28	\$0.00
SG4-1270	Address Review Comments Initial Design Submittal - Segment 4 Package	07-Jun-17	13-Jun-17	5	\$7,000.00
Intermediate Design Submittal - Segment 4 Package		22-Jun-17	27-Jul-17	26	\$22,000.00
SG4-1350	Assemble Intermediate Design Submittal - Segment 4 Package	22-Jun-17	06-Jul-17	10	\$22,000.00
SG4-1360	Perform QA/QC Review Intermediate Design Submittal - Segment 4 Package	07-Jul-17	27-Jul-17	15	\$0.00
SG4-1370	Constr. Review Intermediate Design Submittal - Segment 4 Package	14-Jul-17	27-Jul-17	10	\$0.00
Additional Department Improvements		08-Mar-17	02-Aug-17	106	\$558,000.00
Design - Duke Edsell Widening (DEW)		08-Mar-17	02-Aug-17	106	\$558,000.00
Roadway - DEW		08-Mar-17	02-Aug-17	106	\$68,000.00
SG5-1000	Develop Intermediate Roadway Design - DEW	08-Mar-17	09-May-17	45	\$68,000.00
SG5-1010	Develop Final Roadway Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Drainage - DEW		08-Mar-17	02-Aug-17	106	\$65,000.00
SG5-1020	Develop Intermediate Drainage Design - DEW	08-Mar-17	09-May-17	45	\$65,000.00
SG5-1030	Develop Final Drainage Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Structures - DEW		08-Mar-17	02-Aug-17	106	\$205,000.00
Bridge & Retaining Wall Design - DEW		08-Mar-17	02-Aug-17	106	\$100,000.00
SG5-1040	Develop Intermediate Bridge & Retaining Wall Design - DEW	08-Mar-17	09-May-17	45	\$100,000.00
SG5-1050	Develop Final Bridge & Retaining Wall Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Signing & Lighting Structures Design - DEW		08-Mar-17	02-Aug-17	106	\$85,000.00
SG5-1060	Develop Intermediate Signing & Lighting Structures Design - DEW	08-Mar-17	09-May-17	45	\$85,000.00
SG5-10770	Develop Final Signing & Lighting Structures Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Signal Structures Design - DEW		08-Mar-17	02-Aug-17	106	\$20,000.00
SG5-1080	Develop Intermediate Signal Structures Design - DEW	08-Mar-17	09-May-17	45	\$20,000.00
SG5-1090	Develop Final Signal Structures Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Geotechnical - DEW		08-Mar-17	02-Aug-17	106	\$100,000.00
Sound Barrier & Retaining Wall Memo - DEW		08-Mar-17	02-Aug-17	106	\$50,000.00
SG5-1100	Develop Intermediate Sound Barrier & Retaining Wall Memo - DEW	08-Mar-17	09-May-17	45	\$50,000.00
SG5-1110	Develop Final Sound Barrier & Retaining Wall Memo - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Structures Memo - DEW		08-Mar-17	02-Aug-17	106	\$50,000.00
SG5-1120	Develop Intermediate Structures Memo - DEW	08-Mar-17	09-May-17	45	\$50,000.00
SG5-1130	Develop Final Structures Memo - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Maintenance of Traffic (MOT) - DEW		08-Mar-17	02-Aug-17	106	\$25,000.00
SG5-1140	Develop Intermediate MOT Design - DEW	08-Mar-17	09-May-17	45	\$25,000.00
SG5-1150	Develop Final MOT Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
ITS / TTMS / Traffic Signal - DEW		08-Mar-17	02-Aug-17	106	\$40,000.00
SG5-1160	Develop Intermediate ITS / TTMS / Traffic Signal Design - DEW	08-Mar-17	09-May-17	45	\$40,000.00
SG5-1170	Develop Final ITS / TTMS / Traffic Signal Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Signing & Illumination - DEW		08-Mar-17	02-Aug-17	106	\$25,000.00
SG5-1180	Develop Intermediate Signing & Illumination Design - DEW	08-Mar-17	09-May-17	45	\$25,000.00
SG5-1190	Develop Final Signing & Illumination Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Utilities - DEW		08-Mar-17	02-Aug-17	106	\$30,000.00
SG5-1200	Develop Intermediate Utilities Design - DEW	08-Mar-17	09-May-17	45	\$30,000.00
SG5-1210	Develop Final Utilities Design - DEW	15-Jun-17	02-Aug-17	34	\$0.00
Design Submittal - DEW Package		10-May-17	05-Jul-17	41	\$0.00

EARLY WORKS EARNED VALUE SCHEDULE

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Activity ID	Activity Name	Start	Finish	Original Duration	Budgeted Cost
	Intermediate Design Submittal - DEW Package	10-May-17	05-Jul-17	41	\$0.00
	SG5-1220 Assemble Intermediate Design Submittal - DEW Package	10-May-17	23-May-17	10	\$0.00
	SG5-1230 Perform QA/QC Review Intermediate Design Submittal - DEW Package	24-May-17	14-Jun-17	15	\$0.00
	SG5-1240 Constr. Review Intermediate Design Submittal - DEW Package	01-Jun-17	14-Jun-17	10	\$0.00
	SG5-1260 Transurban Review Intermediate Design Submittal - DEW Package	15-Jun-17	05-Jul-17	21	\$0.00

EXHIBIT 5.2.1

REQUIREMENTS FOR SERVICE COMMENCEMENT

The Design-Builder will not initiate Service Commencement until the following conditions have been satisfied (or the Concessionaire, in its sole discretion, waives any such condition) and the Concessionaire has delivered notice to that effect to the Design-Builder (the “**Service Commencement Notice to Proceed**”):

1. The Concessionaire has issued the Service Commencement Certificate, or it has been determined pursuant to the dispute resolution procedures set forth herein that the Concessionaire should have issued such certificate in accordance with the following:
 - a. The Concessionaire will issue a written certificate of Service Commencement at such time as Service Commencement has been determined to have occurred and shall post-date the certificate (after the Concessionaire’s review process is complete) to the date the Design-Builder actually achieved Service Commencement (as opposed to the date the Concessionaire’s review was completed). If the Concessionaire approves the issuance of a Service Commencement Certificate, the Concessionaire will provide with its Service Commencement Certificate a Punch List of items to be completed to achieve Final Completion.
 - b. Service Commencement will have been achieved when each of the following conditions have occurred for the **395 Express Lanes Scope of Work**:
 - i. all lanes of traffic (including ramps, interchanges, overpasses, underpasses, and other crossings) set forth in the Construction Documentation are in their final configuration and ready to be open to traffic;
 - ii. all major safety features are installed and functional, including, as required, shoulders, guard rails, striping and delineations, concrete traffic barriers, bridge railings, cable safety systems, metal beam guard fences, safety end treatments, terminal anchor sections and crash attenuators;
 - iii. all required illumination for normal and safe use and operation is installed and functional in accordance with Part 2 (395 Project Information and Technical Requirements);
 - iv. all required signs and signals for normal and safe use and operation are installed and functional in accordance with Part 2 (395 Project Information and Technical Requirements);
 - v. the need for temporary traffic controls or for lane closures at any time has ceased (except for any then required for routine maintenance, and except for temporary lane closures in accordance with and as permitted by a Concessionaire approved traffic management plan solely in order to complete Punch List items);

- vi. the Design-Builder has completed the toll commissioning process described in Part 2 (395 Project Information and Technical Requirements), and the TTMS system is completed, has passed all demonstration and performance testing in accordance with the Construction Documentation, TTMS Plan, and Part 2, including demonstration of interoperability with E-ZPass is ready for normal operation;
 - vii. the TMS and safety features for TMS components are installed and functional; and
 - viii. the Design-Builder has otherwise completed the 395 Express Lanes Scope Work in accordance with this 395 Design-Build Contract, including Part 2 (395 Project Information and Technical Requirements), and with the Construction Documentation, such that the 395 Express Lanes Scope Work is in a physical condition that it can be used for normal and safe vehicular travel in all lanes and at all points of entry and exit, subject only to Punch List items.
 - ix. The Seminary Road Sound Barriers Scope of Work is complete per Attachment 1.0c of Part 2 (395 Information and Technical Requirements)
- c. Completion of the Additional Department Improvements Scope is not a requirement for Service Commencement.
- d. The parties will disregard the status of the landscaping and aesthetic features included in the Construction Documentation in determining whether Service Commencement has occurred, except to the extent that its later completion will affect public safety.
- e. The Design-Builder will provide the Concessionaire with written notice of Service Commencement readiness so the Concessionaire can determine whether Service Commencement has been achieved. The Design-Builder and the Concessionaire will meet, confer and exchange information on a regular basis with the goal supporting the Concessionaire's orderly, timely inspection of the 395 Express Lanes Scope Work and review of the final Construction Documentation and the Concessionaire's issuance of a Service Commencement Certificate. The Concessionaire will deliver a written report of findings and recommendations to the Design-Builder. The Concessionaire will provide the Design-Builder with a determination of whether or not Service Commencement has been achieved (and if not, an explanation with reasonable specificity as to the reasons therefor) within a thirty (30) day period.
- f. If the Concessionaire has not notified the Design-Builder of such approval or disapproval within thirty (30) Days after such Design-Builder notice (or ten (10) Days with respect to any resubmittal of the notice), and if the delay is not a result of a Design-Builder Party action or inaction, then such delay will constitute a delay in accordance with Part 4, Section 10.1.1, Requests for Contract Adjustments and Relief.
- g. the Concessionaire has approved all 395 Project Documentation and all other 395 Project Development Plans required by Part 2 (395 Project Information and Technical Requirements) to be submitted on or before the Service Commencement Date;

- h. the Design-Builder has received and delivered to the Concessionaire copies of all Governmental Approvals necessary to operate the 395 Project and has satisfied all conditions and requirements thereof which must be satisfied before the 395 Project can be lawfully opened for regular public use, all such Governmental Approvals remain in full force and effect, and there exists no uncured material violation of the terms and conditions of any such Governmental Approval;
 - i. the Design-Builder has completed the toll commissioning process described in Part 2 (395 Project Information and Technical Requirements), and the TTMS system is completed, has passed all demonstration and performance testing in accordance with the Construction Documentation and Part 2 (395 Project Information and Technical Requirements), including demonstration of interoperability with E-ZPass and is ready for normal operation;
 - j. all 395 Project agreements are in full force and effect;
 - k. the Design-Builder has paid or caused to be paid to the Concessionaire all amounts due and payable from the Design-Builder to the Concessionaire, including, but not limited to, Lane Closure Damages, in connection with this 395 Design-Build Contract, including any applicable interest thereon (except such amounts subject to dispute in accordance with the dispute resolution procedures);
 - l. the Design-Builder has provided to the Concessionaire the training required to have been provided prior to Service Commencement by Part 2 (395 Project Information and Technical Requirements); and
 - m. the Design-Builder has certified to the Concessionaire in writing that the conditions set forth in this subsection (a) have been satisfied as of the date of such certification.
2. The parties will comply with the submittal and review procedures set forth in Part 2 (395 Project Information and Technical Requirements) in the Concessionaire's determination of whether the Design-Builder has satisfied the conditions precedent for achieving Service Commencement.
3. The Concessionaire's issuance (or deemed issuance) of the Service Commencement Notice to Proceed will not constitute a waiver by the Concessionaire of any then-existing breach of this 395 Design-Build Contract by the Design-Builder.

EXHIBIT 5.2.2

REQUIREMENTS FOR FINAL COMPLETION

1. The Design-Builder will achieve Final Completion on or before the Final Completion Date, subject to adjustment in accordance with this 395 Design-Build Contract.
2. The Design-Builder will provide the Concessionaire with written notification when it has determined that the following conditions to Final Completion of the 395 Project have been satisfied:
 - a. all the 395 Work is complete;
 - b. the 395 Work is free and clear of all Liens, claims, security interests or encumbrances arising out of or in connection with the performance of the 395 Work during the Construction Period;
 - c. all Punch List items related to the 395 Work have been completed and delivered to the reasonable satisfaction of the Concessionaire;
 - d. all Project Documentation, including as-built drawings , to be submitted on or before Final Completion have been submitted by the Design-Builder and approved (to the extent approval is required) by the Concessionaire;
 - e. the Design-Builder has paid for all 395 Work and required to achieve Final Completion by third parties that the Design-Builder is obligated to pay (other than disputed amounts and amounts that are not yet due and payable);
 - f. the Design-Builder has delivered all required certifications from the engineer of record and architect of record to all necessary Governmental Authorities and to the Concessionaire; and
 - g. the Design-Builder has made all deliveries of 395 Work Product to the Concessionaire that are required to be made pursuant to this 395 Design-Build Contract.
3. During the thirty (30) Day period following delivery of the Design-Builder's written notification, the Design-Builder and the Concessionaire will meet, confer and exchange information with the goal supporting the orderly, timely inspection of the 395 Work and the Concessionaire's issuance of a Final Completion Certificate. The Concessionaire will provide the Design-Builder with a determination of whether or not Final Completion has been achieved (and if not, an explanation with reasonable specificity as to the reasons therefor) within such thirty (30) Day period.

4. If the Concessionaire has not notified the Design-Builder of such approval or disapproval within thirty (30) Days after such Design-Builder notice (or then (10) Days with respect to any resubmittal of the notice), and if the delay is not a result of a Design-Builder Party action or inaction, then such delay will constitute a delay in accordance with Part 4, Section 10.1.1, Requests for Contract Adjustments and Relief.

EXHIBIT 5.2.3

REQUIREMENTS FOR PENTAGON SOUTH PARKING FINAL COMPLETION

1. The Design-Builder will achieve Pentagon South Parking Final Completion on or before the Pentagon South Parking Final Completion Date, subject to adjustment in accordance with this 395 Design-Build Contract.
2. The Design-Builder will provide the Concessionaire with written notification when it has determined that the following conditions to Pentagon South Parking Final Completion of the Work in accordance with Section 1.4.1.B.16 of Part 2 (395 Project Information and Technical Requirements) as shown in Attachment A to Exhibit 5.2.3 have been satisfied:
 - a. all the Work is complete;
 - b. the Work is free and clear of all Liens, claims, security interests or encumbrances arising out of or in connection with the performance of the Work during the Construction Period;
 - c. all Punch List items related to the Work have been completed and delivered to the reasonable satisfaction of the Concessionaire;
 - d. all Project Documentation, including as-built drawings, to be submitted on or before Pentagon South Parking Final Completion have been submitted by the Design-Builder and approved (to the extent approval is required) by the Concessionaire;
 - e. the Design-Builder has paid for all Work and required to achieve Pentagon South Parking Final Completion by third parties that the Design-Builder is obligated to pay (other than disputed amounts and amounts that are not yet due and payable);
 - f. the Design-Builder has delivered all required certifications from the engineer of record and architect of record to all necessary Governmental Authorities and the Pentagon to the Concessionaire; and
 - g. the Design-Builder has made all deliveries of Work Product to the Concessionaire that are required to be made pursuant to this 395 Design-Build Contract.
3. During the thirty (30) Day period following delivery of the Design-Builder's written notification, the Design-Builder and the Concessionaire will meet, confer and exchange information with the goal supporting the orderly, timely inspection of the Work and the Concessionaire's issuance of a Pentagon South Parking Final Completion Certificate. The Concessionaire will provide the Design-Builder with a determination of whether or not Pentagon South Parking Final Completion has been achieved (and if not, an explanation with reasonable specificity as to the reasons therefor) within such thirty (30) Day period.

4. If the Concessionaire has not notified the Design-Builder of such approval or disapproval within thirty (30) Days after such Design-Builder notice (or then (10) Days with respect to any resubmittal of the notice), and if the delay is not a result of a Design-Builder Party action or inaction, then such delay will constitute a delay in accordance with Part 4, Section 10.1.1, Requests for Contract Adjustments and Relief.

EXHIBIT 5.7

REQUIREMENTS FOR PROJECT COMPONENT FINAL COMPLETION

1. The Design-Builder may achieve an individual Project Component Final Completion on or before the Final Completion Date, subject to adjustment in accordance with this 395 Design-Build Contract. If the Design-Builder chooses not to submit an individual Project Component Work Final Completion Certificate for an individual Project Component, the individual Project Component Work shall be completed as an element of the overall 395 Work to achieve Final Completion.
2. The Design-Builder will provide the Concessionaire with written notification when it has determined that the following conditions to an individual Project Component Final Completion have been satisfied:
 - a. all the Project Component Work for an individual Project Component is complete (i.e. the Concessionaire will not except selected parts or elements);
 - b. the individual Project Component Work is free and clear of all Liens, claims, security interests or encumbrances arising out of or in connection with the performance of the individual Project Component Work during the Construction Period;
 - c. all Punch List items related to the individual Project Component Work have been completed and delivered to the reasonable satisfaction of the Concessionaire (including all temporary Maintenance of Traffic removed and open for traffic in the final configuration);
 - d. all Project Documentation, including as-built drawings, to be submitted on or before individual Project Component Final Completion have been submitted by the Design-Builder and approved (to the extent approval is required) by the Concessionaire;
 - e. the Design-Builder has paid for all individual Project Component Work and required to achieve individual Project Component Final Completion by third parties that the Design-Builder is obligated to pay (other than disputed amounts and amounts that are not yet due and payable);
 - f. the Design-Builder has delivered all required certifications from the engineer of record and architect of record to all necessary Governmental Authorities and to the Concessionaire;
 - g. the Design-Builder has made all deliveries of individual Project Component Work Product to the Concessionaire that are required to be made pursuant to this 395 Design-Build Contract; and
3. During the thirty (30) Day period following delivery of the Design-Builder's written

notification, the Design-Builder and the Concessionaire will meet, confer and exchange information with the goal supporting the orderly, timely inspection of the individual Project Component Work and the Concessionaire's issuance of an individual Project Component Final Completion Certificate. The Concessionaire will provide the Design-Builder with a determination of whether or not the individual Project Component Final Completion has been achieved (and if not, an explanation with reasonable specificity as to the reasons therefor) within such thirty (30) Day period.

4. If the Concessionaire has not notified the Design-Builder of such approval or disapproval within thirty (30) Days after such Design-Builder notice (or then (10) Days with respect to any resubmittal of the notice), and if the delay is not a result of a Design-Builder Party action or inaction, then such delay will constitute a delay in accordance with Part 4, Section 10.1.1, Requests for Contract Adjustments and Relief.

EXHIBIT 11.3
FEDERAL REQUIREMENTS

<u>Exhibit Description</u>	<u>No. of Pages</u>
Attachment 1 – Federal Requirements for Federal-Aid Construction Projects	3
Attachment 2 – FHWA Form 1273 (May 2012)	25
Attachment 3 – Federal Prevailing Wage Rates	6
Attachment 4 – Standard Federal Equal Employment Opportunity Construction Contract Specifications (Executive Order 11246)	8
Attachment 5 – Notice of Requirement for Affirmative Action to Ensure Equal Employment Opportunity (Executive Order 11246)	1
Attachment 6 – Certification Regarding Use of Contract Funds for Lobbying	1
Attachment 7 – Compliance with Buy America Requirements	2
Attachment 8 – Special Provision for Use of Domestic Metal	3
Attachment 9 – Certification of Non-Discrimination in Employment	1
Attachment 10 – On-the Job Training Program for Federal-Aid Highway Construction Projects	3

ATTACHMENT 1

FEDERAL REQUIREMENTS FOR FEDERAL-AID CONSTRUCTION PROJECTS

GENERAL. — The Work herein proposed will be financed in whole or in part with Federal funds, and therefore all of the statutes, rules and regulations promulgated by the Federal Government and applicable to the Work as a result of the Project being financed in whole or part with Federal funds will apply to such Work. The "Required Contract Provisions, Federal-Aid Construction Contracts, Form FHWA 1273," are included in this Exhibit 11.3. Whenever in said required contract provisions references are made to:

- a. "contracting officer", or "authorized representative", such references shall be construed to mean the Department or its Authorized Representative;
- b. "contractor" or "Contractor", "prime contractor", "bidder", "Federal-aid construction contractor", "prospective first tier participant or First Tier Participant", such references shall be construed to mean the Concessionaire or its authorized representative and/or the Design-Build Contractor or its authorized representative, as may be appropriate under the circumstances;
- c. "contract" or "Contract" or "prime contract", "Federal-aid construction contract" or "design-build contract", such references shall be construed to mean the Design-Build Contract;
- d. "subcontractor" or "Subcontractor", "supplier", "vendor", "prospective lower tier participant", lower tier prospective participant, "Lower Tier participant" or "lower tier subcontractor", such references shall be construed to mean, as appropriate, any Contractors other than the Design-Build Contractor; and
- e. "department", "agency" or "department or agency with which this transaction originated" or "contracting agency", such references shall be construed to mean the Department, except where a different department or agency or officer is specified.

PERFORMANCE OF PREVIOUS CONTRACT. — In addition to the provisions in Section II, "Nondiscrimination," and Section VI, "Subletting or Assigning the Contract," of the Form 1273 required contract provisions, the Concessionaire shall comply with the following:

The bidder shall execute the CERTIFICATION WITH REGARD TO THE PERFORMANCE OF PREVIOUS CONTRACTS OR SUBCONTRACTS SUBJECT TO THE EQUAL OPPORTUNITY CLAUSE AND THE FILING OF REQUIRED REPORTS located in the proposal. No request for subletting or assigning any portion of the contract in excess of \$10,000 will be considered under the provisions of Section VI of the required contract provisions unless such request is accompanied by the CERTIFICATION referred to above, executed by the proposed subcontractor.

NON-COLLUSION PROVISION. — The provisions in this section are applicable to all contracts except contracts for Federal Aid Secondary Projects. Title 23, United States Code, Section 112, requires as a condition precedent to approval by the Federal Highway Administrator of the contract for this work that each bidder file a sworn statement executed by, or on behalf of, the person, firm, association, or corporation to whom such contract is to be awarded, certifying that such person, firm, association, or corporation has not, either directly or indirectly, entered into any agreement, participated in any collusion, or otherwise taken any action in restraint of free competitive bidding in connection with the submitted bid. A form to make the non-collusion affidavit statement required by Section 112 as a certification under penalty of perjury rather than as a sworn statement as permitted by 28 U.S.C., Sec. 1746, is included in the Proposal.

PARTICIPATION BY DISADVANTAGED BUSINESS ENTERPRISES IN SUBCONTRACTING. — Part 26, Title 49, Code of Federal Regulations applies to the Project. Pertinent sections of said Code are incorporated within other sections of the Contract and the Department Disadvantaged Business Enterprise Program adopted pursuant to 49 CFR Part 26.

CONVICT PRODUCED MATERIALS

- a. FHWA Federal-aid projects are subject to 23 CFR § 635.417, Convict produced materials.
- b. Materials produced after July 1, 1991, by convict labor may only be incorporated in a Federal aid highway construction project if such materials have been: (i) produced by convicts who are on parole, supervised release, or probation from a prison, or (ii) produced in a prison project in which convicts, during the 12 month period ending July 1, 1987, produced materials for use in Federal aid highway construction projects, and the cumulative annual production amount of such materials for use in Federal aid highway construction does not exceed the amount of such materials produced in such project for use in Federal aid highway construction during the 12 month period ending July 1, 1987.

ACCESS TO RECORDS

- a. As required by 49 CFR 18.36(i)(10), the Concessionaire and its Contractors shall allow FHWA and the Comptroller General of the United States, or their duly authorized representatives, access to all books, documents, papers, and records of the Concessionaire and Contractors or Subcontractors which are directly pertinent to any grantee or subgrantee contract, for the purpose of making audit, examination, excerpts, and transcriptions thereof. In addition, as required by 49 CFR 18.36(i)(11), the Concessionaire and its Contractors shall retain all such books, documents, papers, and records for three years after final payment is made pursuant to any such contract and all other pending matters are closed.
- b. The Concessionaire agrees to include this section in each Contract at each tier, without modification except as appropriate to identify the Contractor who will be subject to its provisions.

SUBCONTRACTING

- a. Any distribution of work shall be evidenced by a written binding agreement on file at the project site. Where no field office exists, such agreement shall be readily available upon request to Department inspector(s) assigned to the project.
- b. The provisions contained in Form FHWA-1273 specifically, and other federal provisions included with the prime Contract are generally applicable to all Federal-aid construction projects and must be made a part of, and physically incorporated in all contracts as well as appropriate subcontracts for work so as to be binding in those agreements.

ATTACHMENT 2
REQUIRED CONTRACT PROVISIONS
FEDERAL-AID CONSTRUCTION CONTRACTS

FHWA FORM 1273

FHWA-1273 -- Revised May 1, 2012

REQUIRED CONTRACT PROVISIONS FEDERAL-AID CONSTRUCTION CONTRACTS

- I. General
- II. Nondiscrimination
- III. Non-Segregated Facilities
- IV. Davis-Bacon and Related Act Provisions
- V. Contract Work Hours and Safety Standards Act Provisions
- VI. Subletting or Assigning the Contract
- VII. Safety: Accident Prevention
- VIII. False Statements Concerning Highway Projects
- IX. Implementation of Clean Air Act and Federal Water Pollution Control Act
- X. Certification Regarding Suspension, Debarment, Ineligibility and Voluntary Exclusion
- XI. Certification Regarding Use of Contract Funds for Lobbying

ATTACHMENTS

- A. Employment and Materials Preference for Appalachian Development Highway System or Appalachian Local Access Road Contracts (included in Appalachian contracts only)

I. GENERAL

1. Form FHWA-1273 must be physically incorporated in each construction contract funded under Title 23 (excluding emergency contracts solely intended for debris removal). The contractor (or subcontractor) must insert this form in each subcontract and further require its inclusion in all lower tier subcontracts (excluding purchase orders, rental agreements and other agreements for supplies or services).

The applicable requirements of Form FHWA-1273 are incorporated by reference for work done under any purchase order, rental agreement or agreement for other services. The prime contractor shall be responsible for compliance by any subcontractor, lower-tier subcontractor or service provider.

Form FHWA-1273 must be included in all Federal-aid design-build contracts, in all subcontracts and in lower tier subcontracts (excluding subcontracts for design services, purchase orders, rental agreements and other agreements for supplies or services). The design-builder shall be responsible for compliance by any subcontractor, lower-tier subcontractor or service provider.

Contracting agencies may reference Form FHWA-1273 in bid proposal or request for proposal documents, however, the Form FHWA-1273 must be physically incorporated (not referenced) in all contracts, subcontracts and lower-tier subcontracts (excluding purchase orders, rental agreements and other agreements for supplies or services related to a construction contract).

2. Subject to the applicability criteria noted in the following sections, these contract provisions shall apply to all work performed on the contract by the contractor's own organization and with the assistance of workers under the contractor's immediate superintendence and to all work performed on the contract by piecework, station work, or by subcontract.
3. A breach of any of the stipulations contained in these Required Contract Provisions may be sufficient grounds for withholding of progress payments, withholding of final payment, termination of the contract, suspension / debarment or any other action determined to be appropriate by the contracting agency and FHWA.
4. Selection of Labor: During the performance of this contract, the contractor shall not use convict labor for any purpose within the limits of a construction project on a Federal-aid highway unless it is labor performed by convicts who are on parole, supervised release, or probation. The term Federal-aid highway does not include roadways functionally classified as local roads or rural minor collectors.

II. NONDISCRIMINATION

The provisions of this section related to 23 CFR Part 230 are applicable to all Federal-aid construction contracts and to all related construction subcontracts of \$10,000 or more. The provisions of 23 CFR Part 230 are not applicable to material supply, engineering, or architectural service contracts.

In addition, the contractor and all subcontractors must comply with the following policies: Executive Order 11246, 41 CFR 60, 29 CFR 1625-1627, Title 23 USC Section 140, the Rehabilitation Act of 1973, as amended (29 USC 794), Title VI of the Civil Rights Act of 1964, as amended, and related regulations including 49 CFR Parts 21, 26 and 27; and 23 CFR Parts 200, 230, and 633.

The contractor and all subcontractors must comply with: the requirements of the Equal Opportunity Clause in 41 CFR 60-1.4(b) and, for all construction contracts exceeding \$10,000, the Standard Federal Equal Employment Opportunity Construction Contract Specifications in 41 CFR 60-4.3.

Note: The U.S. Department of Labor has exclusive authority to determine compliance with Executive Order 11246 and the policies of the Secretary of Labor including 41 CFR 60, and 29 CFR 1625-1627. The contracting agency and the FHWA have the authority and the responsibility to ensure compliance with Title 23 USC Section 140, the Rehabilitation Act of 1973, as amended (29 USC 794), and Title VI of the Civil Rights Act of 1964, as amended, and related regulations including 49 CFR Parts 21, 26 and 27; and 23 CFR Parts 200, 230, and 633.

The following provision is adopted from 23 CFR 230, Appendix A, with appropriate revisions to conform to the U.S. Department of Labor (US DOL) and FHWA requirements.

1. Equal Employment Opportunity: Equal employment opportunity (EEO) requirements not to discriminate and to take affirmative action to assure equal opportunity as set forth under laws, executive orders, rules, regulations (28 CFR 35, 29 CFR 1630, 29 CFR 1625-1627, 41 CFR 60 and 49 CFR 27) and orders of the Secretary of Labor as modified by the provisions prescribed herein, and imposed pursuant to 23 U.S.C. 140 shall constitute the EEO and specific affirmative action standards for the contractor's project activities under this contract. The provisions of the Americans with Disabilities Act of 1990 (42 U.S.C. 12101 et seq.) set forth under 28 CFR 35 and 29 CFR 1630 are incorporated by reference in this contract. In the execution of this contract, the contractor agrees to comply with the following minimum specific requirement activities of EEO:

- a. The contractor will work with the contracting agency and the Federal Government to ensure that it has made every good faith effort to provide equal opportunity with respect to all of its terms and conditions of employment and in their review of activities under the contract.
- b. The contractor will accept as its operating policy the following statement:

"It is the policy of this Company to assure that applicants are employed, and that employees are treated during employment, without regard to their race, religion, sex, color, national origin, age or disability. Such action shall include: employment, upgrading, demotion, or transfer; recruitment or recruitment advertising; layoff or termination; rates of pay or other forms of compensation; and selection for training, including apprenticeship, pre-apprenticeship, and/or on-the-job training."

2. **EEO Officer:** The contractor will designate and make known to the contracting officers an EEO Officer who will have the responsibility for and must be capable of effectively administering and promoting an active EEO program and who must be assigned adequate authority and responsibility to do so.

3. **Dissemination of Policy:** All members of the contractor's staff who are authorized to hire, supervise, promote, and discharge employees, or who recommend such action, or who are substantially involved in such action, will be made fully cognizant of, and will implement, the contractor's EEO policy and contractual responsibilities to provide EEO in each grade and classification of employment. To ensure that the above agreement will be met, the following actions will be taken as a minimum:
 - a. Periodic meetings of supervisory and personnel office employees will be conducted before the start of work and then not less often than once every six months, at which time the contractor's EEO policy and its implementation will be reviewed and explained. The meetings will be conducted by the EEO Officer.
 - b. All new supervisory or personnel office employees will be given a thorough indoctrination by the EEO Officer, covering all major aspects of the contractor's EEO obligations within thirty days following their reporting for duty with the contractor.
 - c. All personnel who are engaged in direct recruitment for the project will be instructed by the EEO Officer in the contractor's procedures for locating and hiring minorities and women.
 - d. Notices and posters setting forth the contractor's EEO policy will be placed in areas readily accessible to employees, applicants for employment and potential employees.
 - e. The contractor's EEO policy and the procedures to implement such policy will be brought to the attention of employees by means of meetings, employee handbooks, or other appropriate means.

4. **Recruitment:** When advertising for employees, the contractor will include in all advertisements for employees the notation: "An Equal Opportunity Employer." All such advertisements will be placed in publications having a large circulation among minorities and women in the area from which the project work force would normally be derived.
 - a. The contractor will, unless precluded by a valid bargaining agreement, conduct systematic and direct recruitment through public and private employee referral sources likely to yield qualified minorities and women. To meet this requirement, the contractor will identify sources of potential minority group employees, and establish with such identified sources procedures whereby minority and women applicants may be referred to the contractor for employment consideration.
 - b. In the event the contractor has a valid bargaining agreement providing for exclusive hiring hall referrals, the contractor is expected to observe the provisions of that agreement to the extent that the system meets the contractor's compliance with EEO contract provisions. Where implementation of such an agreement has the effect of discriminating against

minorities or women, or obligates the contractor to do the same, such implementation violates Federal nondiscrimination provisions.

- c. The contractor will encourage its present employees to refer minorities and women as applicants for employment. Information and procedures with regard to referring such applicants will be discussed with employees.

5. Personnel Actions: Wages, working conditions, and employee benefits shall be established and administered, and personnel actions of every type, including hiring, upgrading, promotion, transfer, demotion, layoff, and termination, shall be taken without regard to race, color, religion, sex, national origin, age or disability. The following procedures shall be followed:

- a. The contractor will conduct periodic inspections of project sites to insure that working conditions and employee facilities do not indicate discriminatory treatment of project site personnel.
- b. The contractor will periodically evaluate the spread of wages paid within each classification to determine any evidence of discriminatory wage practices.
- c. The contractor will periodically review selected personnel actions in depth to determine whether there is evidence of discrimination. Where evidence is found, the contractor will promptly take corrective action. If the review indicates that the discrimination may extend beyond the actions reviewed, such corrective action shall include all affected persons.
- d. The contractor will promptly investigate all complaints of alleged discrimination made to the contractor in connection with its obligations under this contract, will attempt to resolve such complaints, and will take appropriate corrective action within a reasonable time. If the investigation indicates that the discrimination may affect persons other than the complainant, such corrective action shall include such other persons. Upon completion of each investigation, the contractor will inform every complainant of all of their avenues of appeal.

6. Training and Promotion:

- a. The contractor will assist in locating, qualifying, and increasing the skills of minorities and women who are applicants for employment or current employees. Such efforts should be aimed at developing full journey level status employees in the type of trade or job classification involved.
- b. Consistent with the contractor's work force requirements and as permissible under Federal and State regulations, the contractor shall make full use of training programs, i.e., apprenticeship, and on-the-job training programs for the geographical area of contract performance. In the event a special provision for training is provided under this contract, this subparagraph will be superseded as indicated in the special provision. The contracting agency may reserve training positions for persons who receive welfare assistance in accordance with 23 U.S.C. 140(a).

- c. The contractor will advise employees and applicants for employment of available training programs and entrance requirements for each.
 - d. The contractor will periodically review the training and promotion potential of employees who are minorities and women and will encourage eligible employees to apply for such training and promotion.
- 7. Unions:** If the contractor relies in whole or in part upon unions as a source of employees, the contractor will use good faith efforts to obtain the cooperation of such unions to increase opportunities for minorities and women. Actions by the contractor, either directly or through a contractor's association acting as agent, will include the procedures set forth below:
- a. The contractor will use good faith efforts to develop, in cooperation with the unions, joint training programs aimed toward qualifying more minorities and women for membership in the unions and increasing the skills of minorities and women so that they may qualify for higher paying employment.
 - b. The contractor will use good faith efforts to incorporate an EEO clause into each union agreement to the end that such union will be contractually bound to refer applicants without regard to their race, color, religion, sex, national origin, age or disability.
 - c. The contractor is to obtain information as to the referral practices and policies of the labor union except that to the extent such information is within the exclusive possession of the labor union and such labor union refuses to furnish such information to the contractor, the contractor shall so certify to the contracting agency and shall set forth what efforts have been made to obtain such information.
 - d. In the event the union is unable to provide the contractor with a reasonable flow of referrals within the time limit set forth in the collective bargaining agreement, the contractor will, through independent recruitment efforts, fill the employment vacancies without regard to race, color, religion, sex, national origin, age or disability; making full efforts to obtain qualified and/or qualifiable minorities and women. The failure of a union to provide sufficient referrals (even though it is obligated to provide exclusive referrals under the terms of a collective bargaining agreement) does not relieve the contractor from the requirements of this paragraph. In the event the union referral practice prevents the contractor from meeting the obligations pursuant to Executive Order 11246, as amended, and these special provisions, such contractor shall immediately notify the contracting agency.
- 8. Reasonable Accommodation for Applicants / Employees with Disabilities:** The contractor must be familiar with the requirements for and comply with the Americans with Disabilities Act and all rules and regulations established there under. Employers must provide reasonable accommodation in all employment activities unless to do so would cause an undue hardship.
- 9. Selection of Subcontractors, Procurement of Materials and Leasing of Equipment:** The contractor shall not discriminate on the grounds of race, color, religion, sex, national origin, age or disability in the selection and retention of subcontractors, including procurement of materials and leases of equipment. The contractor shall take all necessary and reasonable

steps to ensure nondiscrimination in the administration of this contract.

- a. The contractor shall notify all potential subcontractors and suppliers and lessors of their EEO obligations under this contract.
- b. The contractor will use good faith efforts to ensure subcontractor compliance with their EEO obligations.

10. Assurance Required by 49 CF26.13(b):

- a. The requirements of 49 CFR Part 26 and the State DOT's U.S. DOT-approved DBE program are incorporated by reference.
- b. The contractor or subcontractor shall not discriminate on the basis of race, color, national origin, or sex in the performance of this contract. The contractor shall carry out applicable requirements of 49 CFR Part 26 in the award and administration of DOT-assisted contracts. Failure by the contractor to carry out these requirements is a material breach of this contract, which may result in the termination of this contract or such other remedy as the contracting agency deems appropriate.

11. Records and Reports: The contractor shall keep such records as necessary to document compliance with the EEO requirements. Such records shall be retained for a period of three years following the date of the final payment to the contractor for all contract work and shall be available at reasonable times and places for inspection by authorized representatives of the contracting agency and the FHWA.

- a. The records kept by the contractor shall document the following:
 - (1) The number and work hours of minority and non-minority group members and women employed in each work classification on the project;
 - (2) The progress and efforts being made in cooperation with unions, when applicable, to increase employment opportunities for minorities and women; and
 - (3) The progress and efforts being made in locating, hiring, training, qualifying, and upgrading minorities and women;
- b. The contractors and subcontractors will submit an annual report to the contracting agency each July for the duration of the project, indicating the number of minority, women, and non-minority group employees currently engaged in each work classification required by the contract work. This information is to be reported on Form FHWA-1391. The staffing data should represent the project work force on board in all or any part of the last payroll period preceding the end of July. If on-the-job training is being required by special provision, the contractor will be required to collect and report training data. The employment data should reflect the work force on board during all or any part of the last payroll period preceding the end of July.

III. NON-SEGREGATED FACILITIES

This provision is applicable to all Federal-aid construction contracts and to all related construction subcontracts of \$10,000 or more.

The contractor must ensure that facilities provided for employees are provided in such a manner that segregation on the basis of race, color, religion, sex, or national origin cannot result. The contractor may neither require such segregated use by written or oral policies nor tolerate such use by employee custom. The contractor's obligation extends further to ensure that its employees are not assigned to perform their services at any location, under the contractor's control, where the facilities are segregated. The term "facilities" includes waiting rooms, work areas, restaurants and other eating areas, time clocks, restrooms, washrooms, locker rooms, and other storage or dressing areas, parking lots, drinking fountains, recreation or entertainment areas, transportation, and housing provided for employees. The contractor shall provide separate or single-user restrooms and necessary dressing or sleeping areas to assure privacy between sexes.

IV. DAVIS-BACON AND RELATED ACT PROVISIONS

This section is applicable to all Federal-aid construction projects exceeding \$2,000 and to all related subcontracts and lower-tier subcontracts (regardless of subcontract size). The requirements apply to all projects located within the right-of-way of a roadway that is functionally classified as Federal-aid highway. This excludes roadways functionally classified as local roads or rural minor collectors, which are exempt. Contracting agencies may elect to apply these requirements to other projects.

The following provisions are from the U.S. Department of Labor regulations in 29 CFR 5.5 "Contract provisions and related matters" with minor revisions to conform to the FHWA-1273 format and FHWA program requirements.

1. Minimum wages

- a. All laborers and mechanics employed or working upon the site of the work, will be paid unconditionally and not less often than once a week, and without subsequent deduction or rebate on any account (except such payroll deductions as are permitted by regulations issued by the Secretary of Labor under the Copeland Act (29 CFR part 3)), the full amount of wages and bona fide fringe benefits (or cash equivalents thereof) due at time of payment computed at rates not less than those contained in the wage determination of the Secretary of Labor which is attached hereto and made a part hereof, regardless of any contractual relationship which may be alleged to exist between the contractor and such laborers and mechanics.

Contributions made or costs reasonably anticipated for bona fide fringe benefits under section 1(b)(2) of the Davis-Bacon Act on behalf of laborers or mechanics are considered wages paid to such laborers or mechanics, subject to the provisions of paragraph 1.d. of this section; also, regular contributions made or costs incurred for more than a weekly period (but not less often than quarterly) under plans, funds, or programs which cover the particular weekly period, are deemed to be constructively made or incurred during

such weekly period. Such laborers and mechanics shall be paid the appropriate wage rate and fringe benefits on the wage determination for the classification of work actually performed, without regard to skill, except as provided in 29 CFR 5.5(a)(4). Laborers or mechanics performing work in more than one classification may be compensated at the rate specified for each classification for the time actually worked therein: Provided that the employer's payroll records accurately set forth the time spent in each classification in which work is performed. The wage determination (including any additional classification and wage rates conformed under paragraph 1.b. of this section) and the Davis- Bacon poster (WH-1321) shall be posted at all times by the contractor and its subcontractors at the site of the work in a prominent and accessible place where it can be easily seen by the workers.

b.

- (1) The contracting officer shall require that any class of laborers or mechanics, including helpers, which is not listed in the wage determination and which is to be employed under the contract shall be classified in conformance with the wage determination. The contracting officer shall approve an additional classification and wage rate and fringe benefits therefore only when the following criteria have been met:
 - (i) The work to be performed by the classification requested is not performed by a classification in the wage determination; and
 - (ii) The classification is utilized in the area by the construction industry; and
The classification is utilized in the area by the construction industry and
 - (iii) The proposed wage rate, including any bona fide fringe benefits, bears a reasonable relationship to the wage rates contained in the wage determination.
- (2) If the contractor and the laborers and mechanics to be employed in the classification (if known), or their representatives, and the contracting officer agree on the classification and wage rate (including the amount designated for fringe benefits where appropriate), a report of the action taken shall be sent by the contracting officer to the Administrator of the Wage and Hour Division, Employment Standards Administration, U.S. Department of Labor, Washington, DC 20210. The Administrator, or an authorized representative, will approve, modify, or disapprove every additional classification action within 30 days of receipt and so advise the contracting officer or will notify the contracting officer within the 30-day period that additional time is necessary.
- (3) In the event the contractor, the laborers or mechanics to be employed in the classification or their representatives, and the contracting officer do not agree on the proposed classification and wage rate (including the amount designated for fringe benefits, where appropriate), the contracting officer shall refer the questions, including the views of all interested parties and the recommendation of the contracting officer, to the Wage and Hour Administrator for determination. The Wage and Hour Administrator, or an authorized representative, will issue a determination within 30 days of receipt and so advise the contracting officer or will

notify the contracting officer within the 30-day period that additional time is necessary.

- (4) The wage rate (including fringe benefits where appropriate) determined pursuant to paragraphs 1.b.(2) or 1.b.(3) of this section, shall be paid to all workers performing work in the classification under this contract from the first day on which work is performed in the classification.
- c. Whenever the minimum wage rate prescribed in the contract for a class of laborers or mechanics includes a fringe benefit which is not expressed as an hourly rate, the contractor shall either pay the benefit as stated in the wage determination or shall pay another bona fide fringe benefit or an hourly cash equivalent thereof.
 - d. If the contractor does not make payments to a trustee or other third person, the contractor may consider as part of the wages of any laborer or mechanic the amount of any costs reasonably anticipated in providing bona fide fringe benefits under a plan or program, Provided, That the Secretary of Labor has found, upon the written request of the contractor, that the applicable standards of the Davis-Bacon Act have been met. The Secretary of Labor may require the contractor to set aside in a separate account, assets for the meeting of obligations under the plan or program.

2. Withholding

The contracting agency shall upon its own action or upon written request of an authorized representative of the Department of Labor, withhold or cause to be withheld from the contractor under this contract, or any other Federal contract with the same prime contractor, or any other federally-assisted contract subject to Davis-Bacon prevailing wage requirements, which is held by the same prime contractor, so much of the accrued payments or advances as may be considered necessary to pay laborers and mechanics, including apprentices, trainees, and helpers, employed by the contractor or any subcontractor the full amount of wages required by the contract. In the event of failure to pay any laborer or mechanic, including any apprentice, trainee, or helper, employed or working on the site of the work, all or part of the wages required by the contract, the contracting agency may, after written notice to the contractor, take such action as may be necessary to cause the suspension of any further payment, advance, or guarantee of funds until such violations have ceased.

3. Payrolls and basic records

- a. Payrolls and basic records relating thereto shall be maintained by the contractor during the course of the work and preserved for a period of three years thereafter for all laborers and mechanics working at the site of the work. Such records shall contain the name, address, and social security number of each such worker, his or her correct classification, hourly rates of wages paid (including rates of contributions or costs anticipated for bona fide fringe benefits or cash equivalents thereof of the types described in section 1(b)(2)(B) of the Davis-Bacon Act), daily and weekly number of hours worked, deductions made and actual wages paid. Whenever the Secretary of Labor has found under 29 CFR 5.5(a)(1)(iv) that the wages of any laborer or mechanic include the amount of any costs reasonably anticipated in providing benefits under a plan or program

described in section 1(b)(2)(B) of the Davis-Bacon Act, the contractor shall maintain records which show that the commitment to provide such benefits is enforceable, that the plan or program is financially responsible, and that the plan or program has been communicated in writing to the laborers or mechanics affected, and records which show the costs anticipated or the actual cost incurred in providing such benefits. Contractors employing apprentices or trainees under approved programs shall maintain written evidence of the registration of apprenticeship programs and certification of trainee programs, the registration of the apprentices and trainees, and the ratios and wage rates prescribed in the applicable programs.

b.

- (1) The contractor shall submit weekly for each week in which any contract work is performed a copy of all payrolls to the contracting agency. The payrolls submitted shall set out accurately and completely all of the information required to be maintained under 29 CFR 5.5(a)(3)(i), except that full social security numbers and home addresses shall not be included on weekly transmittals. Instead the payrolls shall only need to include an individually identifying number for each employee (e.g., the last four digits of the employee's social security number). The required weekly payroll information may be submitted in any form desired. Optional Form WH-347 is available for this purpose from the Wage and Hour Division Web site at <http://www.dol.gov/esa/whd/forms/wh347instr.htm> or its successor site. The prime contractor is responsible for the submission of copies of payrolls by all subcontractors. Contractors and subcontractors shall maintain the full social security number and current address of each covered worker, and shall provide them upon request to the contracting agency for transmission to the State DOT, the FHWA or the Wage and Hour Division of the Department of Labor for purposes of an investigation or audit of compliance with prevailing wage requirements. It is not a violation of this section for a prime contractor to require a subcontractor to provide addresses and social security numbers to the prime contractor for its own records, without weekly submission to the contracting agency.
- (2) Each payroll submitted shall be accompanied by a "Statement of Compliance," signed by the contractor or subcontractor or his or her agent who pays or supervises the payment of the persons employed under the contract and shall certify the following:
 - (i) That the payroll for the payroll period contains the information required to be provided under §5.5 (a)(3)(ii) of Regulations, 29 CFR part 5, the appropriate information is being maintained under §5.5 (a)(3)(i) of Regulations, 29 CFR part 5, and that such information is correct and complete;
 - (ii) That each laborer or mechanic (including each helper, apprentice, and trainee) employed on the contract during the payroll period has been paid the full weekly wages earned, without rebate, either directly or indirectly, and that no deductions have been made either directly or indirectly from the full wages earned, other than permissible deductions as set forth in Regulations, 29 CFR part 3;

- (iii) That each laborer or mechanic has been paid not less than the applicable wage rates and fringe benefits or cash equivalents for the classification of work performed, as specified in the applicable wage determination incorporated into the contract.
 - (3) The weekly submission of a properly executed certification set forth on the reverse side of Optional Form WH-347 shall satisfy the requirement for submission of the “Statement of Compliance” required by paragraph 3.b.(2) of this section.
 - (4) The falsification of any of the above certifications may subject the contractor or subcontractor to civil or criminal prosecution under section 1001 of title 18 and section 231 of title 31 of the United States Code.
- c. The contractor or subcontractor shall make the records required under paragraph 3.a. of this section available for inspection, copying, or transcription by authorized representatives of the contracting agency, the State DOT, the FHWA, or the Department of Labor, and shall permit such representatives to interview employees during working hours on the job. If the contractor or subcontractor fails to submit the required records or to make them available, the FHWA may, after written notice to the contractor, the contracting agency or the State DOT, take such action as may be necessary to cause the suspension of any further payment, advance, or guarantee of funds. Furthermore, failure to submit the required records upon request or to make such records available may be grounds for debarment action pursuant to 29 CFR 5.12.

4. Apprentices and trainees

- a. Apprentices (Programs of the USDOL).

Apprentices will be permitted to work at less than the predetermined rate for the work they performed when they are employed pursuant to and individually registered in a bona fide apprenticeship program registered with the U.S. Department of Labor, Employment and Training Administration, Office of Apprenticeship Training, Employer and Labor Services, or with a State Apprenticeship Agency recognized by the Office, or if a person is employed in his or her first 90 days of probationary employment as an apprentice in such an apprenticeship program, who is not individually registered in the program, but who has been certified by the Office of Apprenticeship Training, Employer and Labor Services or a State Apprenticeship Agency (where appropriate) to be eligible for probationary employment as an apprentice.

The allowable ratio of apprentices to journeymen on the job site in any craft classification shall not be greater than the ratio permitted to the contractor as to the entire work force under the registered program. Any worker listed on a payroll at an apprentice wage rate, who is not registered or otherwise employed as stated above, shall be paid not less than the applicable wage rate on the wage determination for the classification of work actually performed. In addition, any apprentice performing work on the job site in excess of the ratio permitted under the registered program shall be paid not less than the applicable wage rate on the wage determination for the work actually performed. Where a contractor is performing construction on a project in a locality other than that in which its program

is registered, the ratios and wage rates (expressed in percentages of the journeyman's hourly rate) specified in the contractor's or subcontractor's registered program shall be observed.

Every apprentice must be paid at not less than the rate specified in the registered program for the apprentice's level of progress, expressed as a percentage of the journeymen hourly rate specified in the applicable wage determination. Apprentices shall be paid fringe benefits in accordance with the provisions of the apprenticeship program. If the apprenticeship program does not specify fringe benefits, apprentices must be paid the full amount of fringe benefits listed on the wage determination for the applicable classification. If the Administrator determines that a different practice prevails for the applicable apprentice classification, fringes shall be paid in accordance with that determination.

In the event the Office of Apprenticeship Training, Employer and Labor Services, or a State Apprenticeship Agency recognized by the Office, withdraws approval of an apprenticeship program, the contractor will no longer be permitted to utilize apprentices at less than the applicable predetermined rate for the work performed until an acceptable program is approved.

b. Trainees (Programs of the USDOL).

Except as provided in 29 CFR 5.16, trainees will not be permitted to work at less than the predetermined rate for the work performed unless they are employed pursuant to and individually registered in a program which has received prior approval, evidenced by formal certification by the U.S. Department of Labor, Employment and Training Administration. The ratio of trainees to journeymen on the job site shall not be greater than permitted under the plan approved by the Employment and Training Administration.

Every trainee must be paid at not less than the rate specified in the approved program for the trainee's level of progress, expressed as a percentage of the journeyman hourly rate specified in the applicable wage determination. Trainees shall be paid fringe benefits in accordance with the provisions of the trainee program. If the trainee program does not mention fringe benefits, trainees shall be paid the full amount of fringe benefits listed on the wage determination unless the Administrator of the Wage and Hour Division determines that there is an apprenticeship program associated with the corresponding journeyman wage rate on the wage determination which provides for less than full fringe benefits for apprentices. Any employee listed on the payroll at a trainee rate who is not registered and participating in a training plan approved by the Employment and Training Administration shall be paid not less than the applicable wage rate on the wage determination for the classification of work actually performed. In addition, any trainee performing work on the job site in excess of the ratio permitted under the registered program shall be paid not less than the applicable wage rate on the wage determination for the work actually performed.

In the event the Employment and Training Administration withdraws approval of a training program, the contractor will no longer be permitted to utilize trainees at less than

the applicable predetermined rate for the work performed until an acceptable program is approved.

- c. Equal employment opportunity. The utilization of apprentices, trainees and journeymen under this part shall be in conformity with the equal employment opportunity requirements of Executive Order 11246, as amended, and 29 CFR part 30.
- d. Apprentices and Trainees (programs of the U.S. DOT).

Apprentices and trainees working under apprenticeship and skill training programs which have been certified by the Secretary of Transportation as promoting EEO in connection with Federal- aid highway construction programs are not subject to the requirements of paragraph 4 of this Section IV. The straight time hourly wage rates for apprentices and trainees under such programs will be established by the particular programs. The ratio of apprentices and trainees to journeymen shall not be greater than permitted by the terms of the particular program.

5. Compliance with Copeland Act requirements. The contractor shall comply with the requirements of 29 CFR part 3, which are incorporated by reference in this contract.

6. Subcontracts. The contractor or subcontractor shall insert Form FHWA-1273 in any subcontracts and also require the subcontractors to include Form FHWA-1273 in any lower tier subcontracts. The prime contractor shall be responsible for the compliance by any subcontractor or lower tier subcontractor with all the contract clauses in 29 CFR 5.5.

7. Contract termination: debarment. A breach of the contract clauses in 29 CFR 5.5 may be grounds for termination of the contract, and for debarment as a contractor and a subcontractor as provided in 29 CFR 5.12.

8. Compliance with Davis-Bacon and Related Act requirements. All rulings and interpretations of the Davis-Bacon and Related Acts contained in 29 CFR parts 1, 3, and 5 are herein incorporated by reference in this contract.

9. Disputes concerning labor standards. Disputes arising out of the labor standards provisions of this contract shall not be subject to the general disputes clause of this contract. Such disputes shall be resolved in accordance with the procedures of the Department of Labor set forth in 29 CFR parts 5, 6, and 7. Disputes within the meaning of this clause include disputes between the contractor (or any of its subcontractors) and the contracting agency, the U.S. Department of Labor, or the employees or their representatives.

10. Certification of eligibility.

- a. By entering into this contract, the contractor certifies that neither it (nor he or she) nor any person or firm who has an interest in the contractor's firm is a person or firm ineligible to be awarded Government contracts by virtue of section 3(a) of the Davis-Bacon Act or 29 CFR 5.12(a)(1).
- b. No part of this contract shall be subcontracted to any person or firm ineligible for award

of a Government contract by virtue of section 3(a) of the Davis-Bacon Act or 29 CFR 5.12(a)(1).

- c. The penalty for making false statements is prescribed in the U.S. Criminal Code, 18 U.S.C. 1001.

V. CONTRACT WORK HOURS AND SAFETY STANDARDS ACT

The following clauses apply to any Federal-aid construction contract in an amount in excess of \$100,000 and subject to the overtime provisions of the Contract Work Hours and Safety Standards Act. These clauses shall be inserted in addition to the clauses required by 29 CFR 5.5(a) or 29 CFR 4.6. As used in this paragraph, the terms laborers and mechanics include watchmen and guards.

- 1. Overtime requirements.** No contractor or subcontractor contracting for any part of the contract work which may require or involve the employment of laborers or mechanics shall require or permit any such laborer or mechanic in any workweek in which he or she is employed on such work to work in excess of forty hours in such workweek unless such laborer or mechanic receives compensation at a rate not less than one and one-half times the basic rate of pay for all hours worked in excess of forty hours in such workweek.
- 2. Violation; liability for unpaid wages; liquidated damages.** In the event of any violation of the clause set forth in paragraph (1.) of this section, the contractor and any subcontractor responsible therefor shall be liable for the unpaid wages. In addition, such contractor and subcontractor shall be liable to the United States (in the case of work done under contract for the District of Columbia or a territory, to such District or to such territory), for liquidated damages. Such liquidated damages shall be computed with respect to each individual laborer or mechanic, including watchmen and guards, employed in violation of the clause set forth in paragraph (1.) of this section, in the sum of \$10 for each calendar day on which such individual was required or permitted to work in excess of the standard workweek of forty hours without payment of the overtime wages required by the clause set forth in paragraph (1.) of this section.
- 3. Withholding for unpaid wages and liquidated damages.** The FHWA or the contacting agency shall upon its own action or upon written request of an authorized representative of the Department of Labor withhold or cause to be withheld, from any moneys payable on account of work performed by the contractor or subcontractor under any such contract or any other Federal contract with the same prime contractor, or any other federally-assisted contract subject to the Contract Work Hours and Safety Standards Act, which is held by the same prime contractor, such sums as may be determined to be necessary to satisfy any liabilities of such contractor or subcontractor for unpaid wages and liquidated damages as provided in the clause set forth in paragraph (2.) of this section.
- 4. Subcontracts.** The contractor or subcontractor shall insert in any subcontracts the clauses set forth in paragraph (1.) through (4.) of this section and also a clause requiring the subcontractors to include these clauses in any lower tier subcontracts. The prime contractor shall be responsible for compliance by any subcontractor or lower tier subcontractor with the

clauses set forth in paragraphs (1.) through (4.) of this section.

VI. SUBLETTING OR ASSIGNING THE CONTRACT

This provision is applicable to all Federal-aid construction contracts on the National Highway System.

1. The contractor shall perform with its own organization contract work amounting to not less than 30 percent (or a greater percentage if specified elsewhere in the contract) of the total original contract price, excluding any specialty items designated by the contracting agency. Specialty items may be performed by subcontract and the amount of any such specialty items performed may be deducted from the total original contract price before computing the amount of work required to be performed by the contractor's own organization (23 CFR 635.116).
 - a. The term “perform work with its own organization” refers to workers employed or leased by the prime contractor, and equipment owned or rented by the prime contractor, with or without operators. Such term does not include employees or equipment of a subcontractor or lower tier subcontractor, agents of the prime contractor, or any other assignees. The term may include payments for the costs of hiring leased employees from an employee leasing firm meeting all relevant Federal and State regulatory requirements. Leased employees may only be included in this term if the prime contractor meets all of the following conditions:
 - (1) the prime contractor maintains control over the supervision of the day-to-day activities of the leased employees;
 - (2) the prime contractor remains responsible for the quality of the work of the leased employees;
 - (3) the prime contractor retains all power to accept or exclude individual employees from work on the project; and
 - (4) the prime contractor remains ultimately responsible for the payment of predetermined minimum wages, the submission of payrolls, statements of compliance and all other Federal regulatory requirements.
 - b. "Specialty Items" shall be construed to be limited to work that requires highly specialized knowledge, abilities, or equipment not ordinarily available in the type of contracting organizations qualified and expected to bid or propose on the contract as a whole and in general are to be limited to minor components of the overall contract.
2. The contract amount upon which the requirements set forth in paragraph (1) of Section VI is computed includes the cost of material and manufactured products which are to be purchased or produced by the contractor under the contract provisions.

3. The contractor shall furnish (a) a competent superintendent or supervisor who is employed by the firm, has full authority to direct performance of the work in accordance with the contract requirements, and is in charge of all construction operations (regardless of who performs the work) and (b) such other of its own organizational resources (supervision, management, and engineering services) as the contracting officer determines is necessary to assure the performance of the contract.
4. No portion of the contract shall be sublet, assigned or otherwise disposed of except with the written consent of the contracting officer, or authorized representative, and such consent when given shall not be construed to relieve the contractor of any responsibility for the fulfillment of the contract. Written consent will be given only after the contracting agency has assured that each subcontract is evidenced in writing and that it contains all pertinent provisions and requirements of the prime contract.
5. The 30% self-performance requirement of paragraph (1) is not applicable to design-build contracts; however, contracting agencies may establish their own self-performance requirements.

VII. SAFETY: ACCIDENT PREVENTION

This provision is applicable to all Federal-aid construction contracts and to all related subcontracts.

1. In the performance of this contract the contractor shall comply with all applicable Federal, State, and local laws governing safety, health, and sanitation (23 CFR 635). The contractor shall provide all safeguards, safety devices and protective equipment and take any other needed actions as it determines, or as the contracting officer may determine, to be reasonably necessary to protect the life and health of employees on the job and the safety of the public and to protect property in connection with the performance of the work covered by the contract.
2. It is a condition of this contract, and shall be made a condition of each subcontract, which the contractor enters into pursuant to this contract, that the contractor and any subcontractor shall not permit any employee, in performance of the contract, to work in surroundings or under conditions which are unsanitary, hazardous or dangerous to his/her health or safety, as determined under construction safety and health standards (29 CFR 1926) promulgated by the Secretary of Labor, in accordance with Section 107 of the Contract Work Hours and Safety Standards Act (40 U.S.C. 3704).
3. Pursuant to 29 CFR 1926.3, it is a condition of this contract that the Secretary of Labor or authorized representative thereof, shall have right of entry to any site of contract performance to inspect or investigate the matter of compliance with the construction safety and health standards and to carry out the duties of the Secretary under Section 107 of the Contract Work Hours and Safety Standards Act (40 U.S.C.3704).

VIII. FALSE STATEMENTS CONCERNING HIGHWAY PROJECTS

This provision is applicable to all Federal-aid construction contracts and to all related subcontracts.

In order to assure high quality and durable construction in conformity with approved plans and specifications and a high degree of reliability on statements and representations made by engineers, contractors, suppliers, and workers on Federal-aid highway projects, it is essential that all persons concerned with the project perform their functions as carefully, thoroughly, and honestly as possible. Willful falsification, distortion, or misrepresentation with respect to any facts related to the project is a violation of Federal law. To prevent any misunderstanding regarding the seriousness of these and similar acts, Form FHWA-1022 shall be posted on each Federal-aid highway project (23 CFR 635) in one or more places where it is readily available to all persons concerned with the project:

18 U.S.C. 1020 reads as follows:

"Whoever, being an officer, agent, or employee of the United States, or of any State or Territory, or whoever, whether a person, association, firm, or corporation, knowingly makes any false statement, false representation, or false report as to the character, quality, quantity, or cost of the material used or to be used, or the quantity or quality of the work performed or to be performed, or the cost thereof in connection with the submission of plans, maps, specifications, contracts, or costs of construction on any highway or related project submitted for approval to the Secretary of Transportation; or

Whoever knowingly makes any false statement, false representation, false report or false claim with respect to the character, quality, quantity, or cost of any work performed or to be performed, or materials furnished or to be furnished, in connection with the construction of any highway or related project approved by the Secretary of Transportation; or Whoever knowingly makes any false statement or false representation as to material fact in any statement, certificate, or report submitted pursuant to provisions of the Federal-aid Roads Act approved July 1, 1916, (39 Stat. 355), as amended and supplemented;

Shall be fined under this title or imprisoned not more than 5 years or both."

IX. IMPLEMENTATION OF CLEAN AIR ACT AND FEDERAL WATER POLLUTION CONTROL ACT

This provision is applicable to all Federal-aid construction contracts and to all related subcontracts.

By submission of this bid/proposal or the execution of this contract, or subcontract, as appropriate, the bidder, proposer, Federal-aid construction contractor, or subcontractor, as appropriate, will be deemed to have stipulated as follows:

1. That any person who is or will be utilized in the performance of this contract is not prohibited from receiving an award due to a violation of Section 508 of the Clean Water Act

or Section 306 of the Clean Air Act.

2. That the contractor agrees to include or cause to be included the requirements of paragraph (1) of this Section X in every subcontract, and further agrees to take such action as the contracting agency may direct as a means of enforcing such requirements.

X. CERTIFICATION REGARDING DEBARMENT, SUSPENSION, INELIGIBILITY AND VOLUNTARY EXCLUSION

This provision is applicable to all Federal-aid construction contracts, design-build contracts, subcontracts, lower-tier subcontracts, purchase orders, lease agreements, consultant contracts or any other covered transaction requiring FHWA approval or that is estimated to cost \$25,000 or more – as defined in 2 CFR Parts 180 and 1200.

1. Instructions for Certification – First Tier Participants:

- a. By signing and submitting this proposal, the prospective first tier participant is providing the certification set out below.
- b. The inability of a person to provide the certification set out below will not necessarily result in denial of participation in this covered transaction. The prospective first tier participant shall submit an explanation of why it cannot provide the certification set out below. The certification or explanation will be considered in connection with the department or agency's determination whether to enter into this transaction. However, failure of the prospective first tier participant to furnish a certification or an explanation shall disqualify such a person from participation in this transaction.
- c. The certification in this clause is a material representation of fact upon which reliance was placed when the contracting agency determined to enter into this transaction. If it is later determined that the prospective participant knowingly rendered an erroneous certification, in addition to other remedies available to the Federal Government, the contracting agency may terminate this transaction for cause of default.
- d. The prospective first tier participant shall provide immediate written notice to the contracting agency to whom this proposal is submitted if any time the prospective first tier participant learns that its certification was erroneous when submitted or has become erroneous by reason of changed circumstances.
- e. The terms "covered transaction," "debarred," "suspended," "ineligible," "participant," "person," "principal," and "voluntarily excluded," as used in this clause, are defined in 2 CFR Parts 180 and 1200. "First Tier Covered Transactions" refers to any covered transaction between a grantee or subgrantee of Federal funds and a participant (such as the prime or general contract). "Lower Tier Covered Transactions" refers to any covered transaction under a First Tier Covered Transaction (such as subcontracts). "First Tier Participant" refers to the participant who has entered into a covered transaction with a grantee or subgrantee of Federal funds (such as the prime or general contractor). "Lower Tier Participant" refers any participant who has entered into a covered transaction with a

First Tier Participant or other Lower Tier Participants (such as subcontractors and suppliers).

- f. The prospective first tier participant agrees by submitting this proposal that, should the proposed covered transaction be entered into, it shall not knowingly enter into any lower tier covered transaction with a person who is debarred, suspended, declared ineligible, or voluntarily excluded from participation in this covered transaction, unless authorized by the department or agency entering into this transaction.
- g. The prospective first tier participant further agrees by submitting this proposal that it will include the clause titled "Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion-Lower Tier Covered Transactions," provided by the department or contracting agency, entering into this covered transaction, without modification, in all lower tier covered transactions and in all solicitations for lower tier covered transactions exceeding the \$25,000 threshold.
- h. A participant in a covered transaction may rely upon a certification of a prospective participant in a lower tier covered transaction that is not debarred, suspended, ineligible, or voluntarily excluded from the covered transaction, unless it knows that the certification is erroneous. A participant is responsible for ensuring that its principals are not suspended, debarred, or otherwise ineligible to participate in covered transactions. To verify the eligibility of its principals, as well as the eligibility of any lower tier prospective participants, each participant may, but is not required to, check the Excluded Parties List System website (<https://www.epls.gov/>), which is compiled by the General Services Administration.
- i. Nothing contained in the foregoing shall be construed to require the establishment of a system of records in order to render in good faith the certification required by this clause. The knowledge and information of the prospective participant is not required to exceed that which is normally possessed by a prudent person in the ordinary course of business dealings.
- j. Except for transactions authorized under paragraph (f) of these instructions, if a participant in a covered transaction knowingly enters into a lower tier covered transaction with a person who is suspended, debarred, ineligible, or voluntarily excluded from participation in this transaction, in addition to other remedies available to the Federal Government, the department or agency may terminate this transaction for cause or default.

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Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion – First Tier Participants:

- a. The prospective first tier participant certifies to the best of its knowledge and belief, that it and its principals:
 - (1) Are not presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from participating in covered transactions by any Federal

department or agency;

- (2) Have not within a three-year period preceding this proposal been convicted of or had a civil judgment rendered against them for commission of fraud or a criminal offense in connection with obtaining, attempting to obtain, or performing a public (Federal, State or local) transaction or contract under a public transaction; violation of Federal or State antitrust statutes or commission of embezzlement, theft, forgery, bribery, falsification or destruction of records, making false statements, or receiving stolen property;
- (3) Are not presently indicted for or otherwise criminally or civilly charged by a governmental entity (Federal, State or local) with commission of any of the offenses enumerated in paragraph (a)(2) of this certification; and
- (4) Have not within a three-year period preceding this application/proposal had one or more public transactions (Federal, State or local) terminated for cause or default.

- b. Where the prospective participant is unable to certify to any of the statements in this certification, such prospective participant shall attach an explanation to this proposal.

2. Instructions for Certification - Lower Tier Participants:

(Applicable to all subcontracts, purchase orders and other lower tier transactions requiring prior FHWA approval or estimated to cost \$25,000 or more - 2 CFR Parts 180 and 1200)

- a. By signing and submitting this proposal, the prospective lower tier is providing the certification set out below.
- b. The certification in this clause is a material representation of fact upon which reliance was placed when this transaction was entered into. If it is later determined that the prospective lower tier participant knowingly rendered an erroneous certification, in addition to other remedies available to the Federal Government, the department, or agency with which this transaction originated may pursue available remedies, including suspension and/or debarment.
- c. The prospective lower tier participant shall provide immediate written notice to the person to which this proposal is submitted if at any time the prospective lower tier participant learns that its certification was erroneous by reason of changed circumstances.
- d. The terms "covered transaction," "debarred," "suspended," "ineligible," "participant," "person," "principal," and "voluntarily excluded," as used in this clause, are defined in 2 CFR Parts 180 and 1200. You may contact the person to which this proposal is submitted for assistance in obtaining a copy of those regulations. "First Tier Covered Transactions" refers to any covered transaction between a grantee or subgrantee of Federal funds and a participant (such as the prime or general contract). "Lower Tier Covered Transactions" refers to any covered transaction under a First Tier Covered Transaction (such as subcontracts). "First Tier Participant" refers to the participant who has entered into a covered transaction with a grantee or subgrantee of Federal funds (such as the

prime or general contractor). “Lower Tier Participant” refers any participant who has entered into a covered transaction with a First Tier Participant or other Lower Tier Participants (such as subcontractors and suppliers).

- e. The prospective lower tier participant agrees by submitting this proposal that, should the proposed covered transaction be entered into, it shall not knowingly enter into any lower tier covered transaction with a person who is debarred, suspended, declared ineligible, or voluntarily excluded from participation in this covered transaction, unless authorized by the department or agency with which this transaction originated.
- f. The prospective lower tier participant further agrees by submitting this proposal that it will include this clause titled "Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion-Lower Tier Covered Transaction," without modification, in all lower tier covered transactions and in all solicitations for lower tier covered transactions exceeding the \$25,000 threshold.
- g. A participant in a covered transaction may rely upon a certification of a prospective participant in a lower tier covered transaction that is not debarred, suspended, ineligible, or voluntarily excluded from the covered transaction, unless it knows that the certification is erroneous. A participant is responsible for ensuring that its principals are not suspended, debarred, or otherwise ineligible to participate in covered transactions. To verify the eligibility of its principals, as well as the eligibility of any lower tier prospective participants, each participant may, but is not required to, check the Excluded Parties List System website (<https://www.epls.gov/>), which is compiled by the General Services Administration.
- h. Nothing contained in the foregoing shall be construed to require establishment of a system of records in order to render in good faith the certification required by this clause. The knowledge and information of participant is not required to exceed that which is normally possessed by a prudent person in the ordinary course of business dealings.
- i. Except for transactions authorized under paragraph e of these instructions, if a participant in a covered transaction knowingly enters into a lower tier covered transaction with a person who is suspended, debarred, ineligible, or voluntarily excluded from participation in this transaction, in addition to other remedies available to the Federal Government, the department or agency with which this transaction originated may pursue available remedies, including suspension and/or debarment.

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**Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion--
Lower Tier Participants:**

- 1. The prospective lower tier participant certifies, by submission of this proposal, that neither it nor its principals is presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from participating in covered transactions by any Federal department or agency.

2. Where the prospective lower tier participant is unable to certify to any of the statements in this certification, such prospective participant shall attach an explanation to this proposal.

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XI. CERTIFICATION REGARDING USE OF CONTRACT FUNDS FOR LOBBYING

This provision is applicable to all Federal-aid construction contracts and to all related subcontracts which exceed \$100,000 (49 CFR 20).

1. The prospective participant certifies, by signing and submitting this bid or proposal, to the best of his or her knowledge and belief, that:
 - a. No Federal appropriated funds have been paid or will be paid, by or on behalf of the undersigned, to any person for influencing or attempting to influence an officer or employee of any Federal agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with the awarding of any Federal contract, the making of any Federal grant, the making of any Federal loan, the entering into of any cooperative agreement, and the extension, continuation, renewal, amendment, or modification of any Federal contract, grant, loan, or cooperative agreement.
 - b. If any funds other than Federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any Federal agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with this Federal contract, grant, loan, or cooperative agreement, the undersigned shall complete and submit Standard Form-LLL, "Disclosure Form to Report Lobbying," in accordance with its instructions.
2. This certification is a material representation of fact upon which reliance was placed when this transaction was made or entered into. Submission of this certification is a prerequisite for making or entering into this transaction imposed by 31 U.S.C. 1352. Any person who fails to file the required certification shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each such failure.
3. The prospective participant also agrees by submitting its bid or proposal that the participant shall require that the language of this certification be included in all lower tier subcontracts, which exceed \$100,000 and that all such recipients shall certify and disclose accordingly.

**ATTACHMENT A - EMPLOYMENT AND MATERIALS PREFERENCE FOR
APPALACHIAN DEVELOPMENT HIGHWAY SYSTEM OR APPALACHIAN LOCAL
ACCESS ROAD CONTRACTS**

This provision is applicable to all Federal-aid projects funded under the Appalachian Regional Development Act of 1965.

1. During the performance of this contract, the contractor undertaking to do work which is, or reasonably may be, done as on-site work, shall give preference to qualified persons who regularly reside in the labor area as designated by the DOL wherein the contract work is situated, or the subregion, or the Appalachian counties of the State wherein the contract work is situated, except:
 - a. To the extent that qualified persons regularly residing in the area are not available.
 - b. For the reasonable needs of the contractor to employ supervisory or specially experienced personnel necessary to assure an efficient execution of the contract work.
 - c. For the obligation of the contractor to offer employment to present or former employees as the result of a lawful collective bargaining contract, provided that the number of nonresident persons employed under this subparagraph (1c) shall not exceed 20 percent of the total number of employees employed by the contractor on the contract work, except as provided in subparagraph (4) below.
2. The contractor shall place a job order with the State Employment Service indicating (a) the classifications of the laborers, mechanics and other employees required to perform the contract work, (b) the number of employees required in each classification, (c) the date on which the participant estimates such employees will be required, and (d) any other pertinent information required by the State Employment Service to complete the job order form. The job order may be placed with the State Employment Service in writing or by telephone. If during the course of the contract work, the information submitted by the contractor in the original job order is substantially modified, the participant shall promptly notify the State Employment Service.
3. The contractor shall give full consideration to all qualified job applicants referred to him by the State Employment Service. The contractor is not required to grant employment to any job applicants who, in his opinion, are not qualified to perform the classification of work required.
4. If, within one week following the placing of a job order by the contractor with the State Employment Service, the State Employment Service is unable to refer any qualified job applicants to the contractor, or less than the number requested, the State Employment Service will forward a certificate to the contractor indicating the unavailability of applicants. Such certificate shall be made a part of the contractor's permanent project records. Upon receipt of this certificate, the contractor may employ persons who do not normally reside in the labor area to fill positions covered by the certificate, notwithstanding the provisions of subparagraph (1c) above.

5. The provisions of 23 CFR 633.207(e) allow the contracting agency to provide a contractual preference for the use of mineral resource materials native to the Appalachian region.
6. The contractor shall include the provisions of Sections 1 through 4 of this Attachment A in every subcontract for work which is, or reasonably may be, done as on-site work.

ATTACHMENT 3

FEDERAL PREVAILING WAGE RATES

General Decision Number: VA160135 01/08/2016 VA135

Superseded General Decision Number: VA20150135

State: Virginia

Construction Type: Highway

Counties: Alexandria*, Arlington, Clarke, Culpeper, Fairfax, Fairfax*, Falls Church*, Fauquier, Fredericksburg*, King George, Loudoun, Manassas Park*, Manassas*, Prince William, Spotsylvania, Stafford and Warren Counties in Virginia.

*INDEPENDENT CITIES

HIGHWAY CONSTRUCTION PROJECTS (excluding tunnels, building structures in rest area projects & railroad construction; bascule, suspension & spandrel arch bridges designed for commercial navigation, bridges involving marine construction; and other major bridges).

Note: Under Executive Order (EO) 13658, an hourly minimum wage of \$10.15 for calendar year 2016 applies to all contracts subject to the Davis-Bacon Act for which the solicitation was issued on or after January 1, 2015. If this contract is covered by the EO, the contractor must pay all workers in any classification listed on this wage determination at least \$10.15 (or the applicable wage rate listed on this wage determination, if it is higher) for all hours spent performing on the contract in calendar year 2016. The EO minimum wage rate will be adjusted annually. Additional information on contractor requirements and worker protections under the EO is available at www.dol.gov/whd/govcontracts.

Modification Number	Publication Date
0	01/08/2016

SUVA2013-010 09/20/2013

	Rates	Fringes
ASBESTOS WORKER.....	\$ 16.91	
CARPENTER (STRUCTURE).....	\$ 16.02	
CEMENT MASON/CONCRETE FINISHER...\$	21.71	
ELECTRICIAN.....	\$ 29.27	
FORM SETTER.....	\$ 14.00	
IRONWORKER, REINFORCING.....	\$ 34.18	

IRONWORKER, STRUCTURAL.....	\$ 19.13
LABORER	
Asphalt Raker.....	\$ 15.85
Blaster.....	\$ 35.00
Construction Worker I (Skilled Laborer).....	\$ 15.77
Construction Worker II (Laborer).....	\$ 14.14
Deckhand.....	\$ 13.00
Fence Erector.....	\$ 14.41
Flagger.....	\$ 13.64
Grade Checker.....	\$ 13.42
Guardrail Erector.....	\$ 22.15
Landscape Worker.....	\$ 11.97
Pipe Layer.....	\$ 19.00
Power Tool Operator.....	\$ 15.00
Sign Erector.....	\$ 25.00
MASON (STRUCTURE).....	\$ 17.64
PAINTER.....	\$ 15.00
PLUMBER.....	\$ 25.00
POWER EQUIPMENT OPERATOR:	
Air Compressor.....	\$ 13.50
Asphalt Distributor.....	\$ 18.64
Asphalt Paver.....	\$ 19.35
Backhoe.....	\$ 20.59
Boom/Auger.....	\$ 20.29
Bulldozer (Utility).....	\$ 15.50
Bulldozer.....	\$ 20.40
Concrete Finish Machine Operator.....	\$ 18.54
Concrete Finisher Machine Screed Operator (Bridge)....	\$ 14.60
Concrete Paving Machine Operator.....	\$ 20.75
Concrete Pump Operator.....	\$ 33.00
Concrete Saw Operator.....	\$ 16.00
Crane, Derrick, Dragline (1 cm & under).....	\$ 24.53
Crane, Derrick, Dragline (over 1 cm).....	\$ 25.00
Crusher Tender.....	\$ 14.25
Drill Operator.....	\$ 15.70
Excavator (Gradall).....	\$ 19.32
Front End Loader (2 cm & under).....	\$ 19.00
Front End Loader (over 2 cm).....	\$ 20.42
Hydro Seeder.....	\$ 17.13
Log Skidder Operator.....	\$ 18.50
Mechanic.....	\$ 21.75
Mobile Mixer.....	\$ 17.00
Motor Grader (Fine Grade)...	\$ 27.25
Motor Grader (Rough Grade)..	\$ 13.58

Oiler, Greaser.....	\$ 14.00
Pavement Marking Operator...	\$ 17.00
Pavement Marking Truck Operator.....	\$ 16.72
Pavement Planing Groundman..	\$ 19.75
Pavement Planing Operator...	\$ 19.25
Pile Driver Operator.....	\$ 20.35
Pile Driver, Leadsman.....	\$ 21.32
Pipe Boring/Jacking Machine Operator.....	\$ 16.00
Plant Operator.....	\$ 14.88
Roller (Finish).....	\$ 17.94
Roller (Rough).....	\$ 17.06
Scraper Pan Operator.....	\$ 13.00
Shot Blast Machine Operator..	\$ 16.02
Shovel Operator (2 yds and under).....	\$ 16.00
Shovel Operator (over 2 yds).....	\$ 25.00
Slip-Form Paver.....	\$ 21.00
Slurry Seal Paver Machine Operator.....	\$ 13.75
Slurry Seal Paver Truck Operator.....	\$ 10.32
Stabilizer Operator.....	\$ 15.70
Stone-Spreader.....	\$ 13.35
Subgrade Machine Operator...	\$ 19.00
Tractor Operator, Crawlers..	\$ 12.47
Tractor Operator, Utility...	\$ 12.25
Trenching Machine.....	\$ 29.87
Vacuum Machine.....	\$ 18.20

TRAFFIC SIGNALIZATION:

Traffic Signal Installation.....	\$ 21.16
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TRUCK DRIVER

Fuel & Lubricant Service	
Truck Driver.....	\$ 17.73
Transit Mix Truck Driver....	\$ 15.00
Truck Driver (Multi-Rear Axle).....	\$ 16.69
Truck Driver (Single Rear Axle).....	\$ 17.50
Truck Driver (Tandem Rear Axle).....	\$ 16.91
Truck Driver, Heavy Duty....	\$ 17.29

WELDER.....	\$ 18.15
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WELDERS - Receive rate prescribed for craft performing operation to which welding is incidental.
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Unlisted classifications needed for work not included within the scope of the classifications listed may be added after award only as provided in the labor standards contract clauses (29CFR 5.5 (a) (1) (ii)).

The body of each wage determination lists the classification and wage rates that have been found to be prevailing for the cited type(s) of construction in the area covered by the wage determination. The classifications are listed in alphabetical order of "identifiers" that indicate whether the particular rate is a union rate (current union negotiated rate for local), a survey rate (weighted average rate) or a union average rate (weighted union average rate).

Union Rate Identifiers

A four letter classification abbreviation identifier enclosed in dotted lines beginning with characters other than "SU" or "UAVG" denotes that the union classification and rate were prevailing for that classification in the survey. Example: PLUM0198-005 07/01/2014. PLUM is an abbreviation identifier of the union which prevailed in the survey for this classification, which in this example would be Plumbers. 0198 indicates the local union number or district council number where applicable, i.e., Plumbers Local 0198. The next number, 005 in the example, is an internal number used in processing the wage determination. 07/01/2014 is the effective date of the most current negotiated rate, which in this example is July 1, 2014.

Union prevailing wage rates are updated to reflect all rate changes in the collective bargaining agreement (CBA) governing this classification and rate.

Survey Rate Identifiers

Classifications listed under the "SU" identifier indicate that no one rate prevailed for this classification in the survey and the published rate is derived by computing a weighted average rate based on all the rates reported in the survey for that classification. As this weighted average rate includes all rates reported in the survey, it may include both union and non-union rates. Example: SULA2012-007 5/13/2014. SU indicates the rates are survey rates based on a weighted average calculation of rates and are not majority rates. LA indicates the State of Louisiana. 2012 is the year of survey on which these classifications and rates are based. The next number, 007 in the example, is an internal number used in producing the wage determination. 5/13/2014 indicates the survey completion date for the classifications and rates under that identifier.

Survey wage rates are not updated and remain in effect until a new survey is conducted.

Union Average Rate Identifiers

Classification(s) listed under the UAVG identifier indicate that no single majority rate prevailed for those classifications; however, 100% of the data reported for the classifications was union data. EXAMPLE: UAVG-OH-0010 08/29/2014. UAVG indicates that the rate is a weighted union average rate. OH indicates the state. The next number, 0010 in the example, is an internal number

used in producing the wage determination. 08/29/2014 indicates the survey completion date for the classifications and rates under that identifier.

A UAVG rate will be updated once a year, usually in January of each year, to reflect a weighted average of the current negotiated/CBA rate of the union locals from which the rate is based.

WAGE DETERMINATION APPEALS PROCESS

1.) Has there been an initial decision in the matter? This can be:

- * an existing published wage determination
- * a survey underlying a wage determination
- * a Wage and Hour Division letter setting forth a position on a wage determination matter
- * a conformance (additional classification and rate) ruling

On survey related matters, initial contact, including requests for summaries of surveys, should be with the Wage and Hour Regional Office for the area in which the survey was conducted because those Regional Offices have responsibility for the Davis-Bacon survey program. If the response from this initial contact is not satisfactory, then the process described in 2.) and 3.) should be followed.

With regard to any other matter not yet ripe for the formal process described here, initial contact should be with the Branch of Construction Wage Determinations. Write to:

Branch of Construction Wage Determinations
Wage and Hour Division
U.S. Department of Labor
200 Constitution Avenue, N.W.
Washington, DC 20210

2.) If the answer to the question in 1.) is yes, then an interested party (those affected by the action) can request review and reconsideration from the Wage and Hour Administrator (See 29 CFR Part 1.8 and 29 CFR Part 7). Write to:

Wage and Hour Administrator
U.S. Department of Labor
200 Constitution Avenue, N.W.
Washington, DC 20210

The request should be accompanied by a full statement of the interested party's position and by any information (wage payment data, project description, area practice material, etc.) that the requestor considers relevant to the issue.

3.) If the decision of the Administrator is not favorable, an interested party may appeal directly to the Administrative Review Board (formerly the Wage Appeals Board). Write to:

Administrative Review Board
U.S. Department of Labor
200 Constitution Avenue, N.W.
Washington, DC 20210

4.) All decisions by the Administrative Review Board are final.

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END OF GENERAL DECISION

ATTACHMENT 4

STANDARD FEDERAL EQUAL EMPLOYMENT OPPORTUNITY CONSTRUCTION CONTRACT SPECIFICATIONS (EXECUTIVE ORDER 11246)

1. As, used in these specifications:
 - a. "Covered area" means the geographical area described in the solicitation from which this contract resulted;
 - b. "Director" means Director, Office of Federal Contract Compliance Programs, United States Department of Labor, or any person to whom the Director delegates authority;
 - c. "Employer identification number" means the Federal Social Security number used on the Employer's Quarterly Federal Tax Return, U. S. Treasury Department Form 941;
 - d. "Minority" includes:
 - (i) Black (all persons having origins in any of the Black African racial groups not of Hispanic origin);
 - (ii) Hispanic (all persons of Mexican, Puerto Rican, Cuban, Central or South American or other Spanish Culture or origin, regardless of race);
 - (iii) Asian and Pacific Islander (all persons having origins in any of the original peoples of the Far East, Southeast Asia, the Indian Subcontinent, or the Pacific Islands); and
 - (iv) American Indian or Alaskan Native (all persons having origins in any of the original peoples of North America and maintaining identifiable tribal affiliations through membership and participation or community identification).
2. Whenever the Contractor, or any Subcontractor at any tier, subcontracts a portion of the work involving any construction trade, it shall physically include in each subcontract in excess of \$10,000 the provisions of these specifications and the Notice which contains the applicable goals for minority and female participation and which is set forth in the solicitations from which this contract resulted.
3. If the Contractor is participating (pursuant to 41 CFR 60-4.5) in a Hometown Plan approved by the U. S. Department of Labor in the covered area either individually or through an association, its affirmative action obligations on all work in the Plan area (including goals and timetables) shall be in accordance with that Plan for those trades which have unions participating in the Plan. Contractors must be able to demonstrate their participation in and compliance with the provisions of any such Hometown Plan. Each Contractor or Subcontractor participating in an approved Plan is individually required to comply with its obligations under the EEO clause, and to make a good faith effort to achieve each goal under the Plan in each trade in which it has employees. The overall good faith performance by other Contractors and Subcontractors toward a goal in an approved Plan does not excuse any covered Contractor's or Subcontractor's failure to take good faith efforts to achieve the Plan goals and timetables.
4. The Contractor shall implement the specific affirmative action standards provided in paragraphs 7 a through p of these specifications. The goals set forth in the solicitation from which this contract resulted are expressed as percentages of the total hours of employment and training of minority and female utilization the Contractor should reasonably be able to achieve in each construction trade in which it has employees in the covered area. Covered construction Contractors performing contracts in geographical areas where they do not have a Federal or federally assisted construction contract shall apply the minority and female goals established for the geographical area where the contract is

being performed. Goals are published periodically in the Federal Register in notice form, and such notices may be obtained from any Office of Federal Contract Compliance Programs office or any Federal procurement contracting officer. The Contractor is expected to make substantially uniform progress toward its goals in each craft during the period specified.

5. Neither the provisions of any collective bargaining agreement, nor the failure by a union with whom the Contractor has a collective bargaining agreement, to refer either minorities or women shall excuse the Contractor's obligations under these specifications, Executive Order 11246, or the regulations promulgated pursuant thereto.
6. In order for the nonworking training hours of apprentices and trainees to be counted in meeting the goals, such apprentices and trainees must be employed by the Contractor during the training period, and the Contractor must have made a commitment to employ the apprentices and trainees at the completion of their training, subject to the availability of employment opportunities. Trainees must be trained pursuant to training programs approved by the U. S. Department of Labor.
7. The Contractor shall take specific affirmative actions to ensure equal employment opportunity. The evaluation of the Contractor's compliance with these specifications shall be based upon its effort to achieve maximum results from its actions. The Contractor shall document these efforts fully, and shall implement affirmative action steps at least as extensive as the following:
 - a. Ensure and maintain a working environment free of harassment, intimidation, and coercion at all sites, and in all facilities at which the Contractor's employees are assigned to work. The Contractor, where possible, will assign two or more women to each construction project. The Contractor shall specifically ensure that all foremen, superintendents and other on-site supervisory personnel are aware of and carry out the Contractor's obligation to maintain such a working environment, with specific attention to minority or female individuals working at such sites in such facilities.
 - b. Establish and maintain a current list of minority and female recruitment sources, provide written notification to minority and female recruitment sources and to community organizations when the Contractor or its unions have employment opportunities available, and maintain a record of the organizations' responses.
 - c. Maintain a current file of the names, addresses and telephone numbers of each minority and female off the street applicant and minority or female referral from a union, a recruitment source or community organization and of what action was taken with respect to each such individual. If such individual was sent to the union hiring hall for referral and was not referred back to the Contractor by the union, or if referred, not employed by the Contractor, this shall be documented in the file with the reason therefor, along with whatever additional actions the Contractor may have taken.
 - d. Provide immediate written notification to the Director when the union or unions which the Contractor has a collective bargaining agreement has not referred to the Contractor a minority person or woman sent by the Contractor, or when the Contractor has other information that the union referral process has impeded the Contractor's efforts to meet its obligations.
 - e. Develop on-the-job training opportunities and/or participate in training programs for the area which expressly include minorities and women, including upgrading programs and apprenticeship and trainee programs relevant to the Contractor's employment needs, especially those programs funded or approved by the Department of Labor. The Contractor shall provide notice of these programs to the sources compiled under 7b above.
 - f. Disseminate the Contractor's EEO policy by providing notice of the policy to unions and training programs and requesting their cooperation in assisting the Contractor in meeting its EEO obligations; by including it in any policy manual and collective bargaining agreement; by publicizing it in the company newspaper, annual report. etc.; by specific review of the policy with all

- management personnel and with all minority and female employees at least once a year; and by posting the company EEO policy on bulletin boards accessible to all employees at each location where construction work is performed.
- g. Review, at least annually, the company's EEO policy and affirmative action obligations under these specifications with all employees having any responsibility for hiring, assignment, layoff, termination, or other employment decisions including specific review of these items with onsite supervisory personnel such as Superintendents, General Foremen, etc. prior to the initiation of construction work at any job site. A written record shall be made and maintained identifying the time and place of these meetings, persons attending, subject matter discussed and disposition of the subject matter.
 - h. Disseminate the Contractor's EEO policy externally by including it in any advertising in the news media, specifically including minority and female news media, and providing written notification to and discussing the Contractor's EEO policy with other Contractors and Subcontractors with whom the Contractor does or anticipates doing business.
 - i. Direct its recruitment efforts, both oral and written, to minority, female and community organizations, to schools with minority and female students and to minority and female recruitment and training organizations serving the Contractor's recruitment area and employment needs. Not later than one month prior to the date for the acceptance of applications for apprenticeship or other training by any recruitment source, the Contractor shall send written notification to organizations such as the above, describing the openings, screening procedures and tests to be used in the selection process.
 - j. Encourage present minority and female employees to recruit other minority persons and women and, where reasonable, provide after school, summer and vacation employment to minority and female youth both on the site and in other areas of Contractor's workforce.
 - k. Validate all tests and other selection requirements where there is an obligation to do so under 41 CFR Part 60-3.
 - l. Conduct, at least annually, an inventory and evaluation at least of all minority and female personnel for promotional opportunities and encourage these employees to seek or to prepare for, through appropriate training. etc. such opportunities.
 - m. Ensure that seniority practices, job classifications, work assignments and other personnel practices, do not have a discriminatory effect by continually monitoring all personnel and employment related activities to ensure that the EEO policy and the Contractor's obligations under these specifications are being carried out.
 - n. Ensure that all facilities and company activities are non-segregated, except that separate or single-user toilet and necessary changing facilities shall be provided to assure privacy between the sexes.
 - o. Document and maintain a record of all solicitations of offers for subcontracts from minority and female construction contractors and suppliers, including circulation of solicitations to minority and female contractor associations and other business associations.
 - p. Conduct a review, at least annually, of all supervisors' adherence to and performance under the Contractor's EEO policies and affirmative action obligations.
8. Contractors are encouraged to participate in voluntary associations which assist in fulfilling one or more of their affirmative action obligations (7a through p). The efforts of a contractor association, joint contractor-union, contractor-community, or other similar group of which the contractor is a member and participant, may be asserted as fulfilling any one or more of its obligations under 7a through p of

these Specifications provided that the contractor actively participates in the group, makes every effort to assure that the group has a positive impact on the employment of minorities and women in the industry, ensures that the concrete benefits of the program are reflected in the Contractor's minority and female workforce participation, makes a good faith effort to meet its individual goals and timetables and can provide access to documentation which demonstrates the effectiveness of actions taken on behalf of the Contractor. The obligation to comply, however, is the Contractor's and failure of such a group to fulfill an obligation shall not be a defense for the Contractor's noncompliance.

9. A single goal for minorities and separate single goal for women have been established. The Contractor, however, is required to provide equal employment opportunity and to take affirmative action for all minority groups, both male and female and all women, both minority and non-minority. Consequently, the Contractor may be in violation of the Executive Order if a particular group is employed in a substantially disparate manner (for example, even though the Contractor has achieved its goals for women generally, the Contractor may be in violation of the Executive Order if a specific minority group of women is underutilized).

Nondiscrimination programs require that Federal-aid recipients, subrecipients, and contractors prevent discrimination and ensure nondiscrimination in all of their programs and activities, whether those programs and activities are federally funded or not. The factors prohibited from serving as a basis for action or inaction which discriminates include race, color, national origin, sex, age, and handicap/disability. The efforts to prevent discrimination must address, but not be limited to a program's impacts, access, benefits, participation, treatment, services, contracting opportunities, training opportunities, investigations of complaints, allocations of funds, prioritization of projects, and the functions of right-of-way, research, planning, and design.

10. The Contractor shall not enter into any Subcontract with any person or firm debarred from Government contracts pursuant to Executive Order 11246.
11. The Contractor shall carry out such sanctions and penalties for violation of these specifications and the Equal Opportunity Clause, including suspension, termination and cancellation of existing subcontracts as may be imposed or ordered pursuant to Executive Order 11246, as amended, and its implementing regulations by the Office of Federal Contract Compliance Programs. Any Contractor who fails to carry out such sanctions and penalties shall be in violation of these specifications and Executive Order 11246, as amended.
12. The Contractor, in fulfilling its obligations under these specifications shall implement specific affirmative action steps, at least as extensive as those standards prescribed in paragraph 7 of these specifications, so as to achieve maximum results from its efforts to ensure equal employment opportunity. If the Contractor fails to comply with the requirements of the Executive Order, the implementing regulations, or these specifications, the Director will proceed in accordance with 41 CFR 60-4.8.
13. The Contractor shall designate a responsible official to monitor all employment related activity, to ensure that the company EEO policy is being carried out, to submit reports relating to the provisions hereof as may be required by the Government and to keep records. Records shall at least include for each employee the name, address, telephone numbers, construction trade, union affiliation if any, employee identification number when assigned, social security number, race, sex, status (e.g., mechanic, apprentice, trainee, helper, or laborer), dates of changes in status, hours worked per week in the indicated trade, rate of pay, and locations at which the work was performed. Records shall be maintained in an easily understandable and retrievable form; however, to the degree that existing records satisfy this requirement, Contractor shall not be required to maintain separate records.
14. Nothing herein provided shall be construed as a limitation upon the application of other laws which establish different standards of compliance or upon the application of requirements for the hiring of local or other area residents (e.g., those under the Public Works Employment Act of 1977 and the Community Development Block Grant Program).

15. In addition to the reporting requirements set forth elsewhere in this contract, the contractor and the subcontractors holding subcontracts, not including material suppliers, of \$10,000 or more, shall submit for every month of July during which work is performed, employment data as contained under Form PR 1391 (Appendix C to 23 CFR, Part 230), and in accordance with the instructions included thereon.

ATTACHMENT A

Economic Area	Goal (Percent)
Virginia:	
021 Roanoke-Lynchburg, VA	
SMSA Counties:	
4640 Lynchburg, VA.	19.3
VA Amherst; VA Appomattox; VA Campbell; VA Lynchburg.	
6800 Roanoke, VA.....	10.2
VA Botetourt; VA Craig; VA Roanoke; VA Roanoke City; VA Salem	
Non-SMSA Counties.....	12.0
VA Alleghany; VA Augusta; VA Bath; VA Bedford; VA Bland; VA Carroll;	
VA Floyd; VA Franklin; VA Giles; VA Grayson; VA Henry; VA Highland;	
VA Montgomery; VA Nelson; VA Patrick; VA Pittsylvania; VA Pulaski;	
VA Rockbridge; VA Rockingham; VA Wythe; VA Bedford City; VA Buena Vista; VA Clifton	
Forge; VA Covington; VA Danville; VA Galax; VA Harrisonburg;	
VA Lexington; VA Martinsville; VA Radford; VA Staunton; VA Waynesboro; WV Pendleton.	
022 Richmond, VA:	
SMSA Counties:	
6140 Petersburg - Colonial Heights - Hopewell, VA	30.6
VA Dinwiddie; VA Prince George; VA Colonial Heights; VA Hopewell;	
VA Petersburg.	
6760 Richmond,	24.9
VA Charles City; VA Chesterfield; VA Goochland, VA Hanover; VA Henrico; VA New Kent;	
VA Powhatan; VA Richmond.	
Non-SMSA Counties	27.9
VA Albermarle; VA Amelia; VA Brunswick; VA Buckingham, VA Caroline;	
VA Charlotte; VA Cumberland; VA Essex; VA Fluvanna; VA Greene;	
VA Greensville; VA Halifax; VA King and Queen; VA King William;	
VA Lancaster; VA Louisa; VA Lunenburg; VA Madison; VA .Mecklenburg;	
VA Northumberland; VA Nottoway; VA Orange; VA Prince Edward;	
VA Richmond; VA Sussex; VA Charlottesville; VA Emporia; VA South Boston	
023 Norfolk - Virginia Beach - Newport News VA:	
SMSA Counties:	
5680 Newport News- Hampton, VA	27.1
VA Gloucester; VA James City; VA York; VA Hampton; VA Newport News;	
VA Williamsburg.	
5720 Norfolk - Virginia Beach - Portsmouth, VA - NC	26.6
NC Currituck; VA Chesapeake; VA Norfolk; VA Portsmouth; VA Suffolk;	
VA Virginia Beach.	
Non-SMSA Counties	29.7
NC Bertie; NC Camden; NC Chowan; NC Gates; NC Hertford;	
NC Pasquotank; NC Perquimans; VA Isle of Wight; VA Matthews;	
VA Middlesex; VA Southampton; VA Surry; VA Franklin.	
Washington, DC:	
020 Washington, DC.	
SMSA Counties:	
8840 Washington, DC - MD – VA	28.0
DC District of Columbia; MD Charles; MD Montgomery MD Prince Georges;	
VA Arlington; VA Fairfax; VA Loudoun; VA Prince William	
VA Alexandria; VA Fairfax City; VA Falls Church.	

Non- SMSA Counties	25.2
MD Calvert; MD Frederick; MD St. Marys; MD Washington; VA Clarke; VA Culpeper; VA Fauquier; VA Frederick; VA King George; VA Page; VA Rappahannock; VA Shenandoah; VA Spotsylvania; VA Stafford; VA Warren; VA Westmoreland; VA Fredericksburg; VA Winchester WV Berkeley; WV Grant; WV Hampshire; WV Hardy; WV Jefferson; WV Morgan.	
Tennessee:	
052 Johnson City - Kingsport - Bristol, TN – VA	
SMSA Counties:	
3630 Johnson City - Kingsport -Bristol, TN-VA.....	2.6
TN Carter; TN Hawkins; TN Sullivan; TN Washington; VA Scott; VA Washington; VA Bristol.	
Non-SMSA Counties	3.2
TN Greene; TN Johnson; VA Buchanan; VA Dickenson; VA Lee; VA Russell; VA Smyth; VA Tazewell; VA Wise; VA Norton; WV McDowell; WV Mercer.	

ATTACHMENT 5
NOTICE OF REQUIREMENT FOR AFFIRMATIVE ACTION TO ENSURE
EQUAL EMPLOYMENT OPPORTUNITY (EXECUTIVE ORDER 11246)

1. **General.** In addition to the affirmative action requirements of Attachment 4 titled “Standard Federal Equal Employment Opportunity Construction Contract Specifications” as set forth elsewhere in this Contract, the Offeror's or Bidder's attention is called to the "Equal Opportunity Clause" set forth herein.
2. **Goals.**
 - a. The goals for female and minority participation, expressed in percentage terms of the Contractor's aggregate work force in each trade on all construction works in the covered area, are as follows:

Females - 6.9%
Minorities - See Attachment "A"
 - b. The goals are applicable to all the Contractor's construction work (whether or not it is Federal or federally assisted) performed in the covered area, whether or not it is Federal or federally assisted. If the Contractor performs construction work in a geographical area located outside of the covered area, it shall apply the goals established for such geographical area where the work is actually performed. With regard to this second area, the Contractor also is subject to the goals for both its federally involved and non-federally involved construction.
 - c. The Contractor's compliance with the Executive Order and the regulations in 41 CFR Part 60-4 shall be based on its implementation of the Standard Federal Equal Employment Opportunity Construction Contract Specifications and its efforts to meet the goals. Equal Opportunity Clause, The hours of minority and female employment and training must be substantially uniform throughout the length of the contract, and in each trade, and the Contractor shall make a good faith effort to employ minorities and women evenly on each of its projects. The transfer of minority or female employees or trainees from Contractor to Contractor or from project to project for the sole purpose of meeting the Contractor's goals shall be a violation of the contract, the Executive Order and the regulations in 41 CFR Part 60-4. Compliance with the goals will be measured against the total work hours performed.
3. **Subcontracting.** The Contractor shall provide written notification to the Department within 10 working days of award of any construction subcontract in excess of \$10,000 at any tier for construction works under this contract. The notification shall list the name, address and telephone number of the subcontractor, employer identification number, estimated dollar amount of the subcontract, estimated starting and completion dates of the subcontract and the geographical area in which the contract is to be performed.
4. **Reports.** The Contractor is hereby notified that he may be subject to the Office of Federal Contract Compliance Programs (OFCCP) reporting and record keeping requirements as provided for under Executive Order 11246 as amended. OFCCP will provide direct notice to the contractor as to the specific reporting requirements that he will be expected to fulfill.

ATTACHMENT 6

CERTIFICATION REGARDING USE OF CONTRACT FUNDS FOR LOBBYING

By signing and submitting its proposal or bid, and by executing the Contract or Subcontract, the prospective Design-Build Contractor and Subcontractors (at all tiers) shall be deemed to have signed and delivered the following:

1. The prospective Design-Build Contractor and Subcontractor(s) certifies, to the best of its knowledge and belief, that:
 - a. No Federal appropriated funds have been paid or will be paid, by or on behalf of the undersigned, to any person for influencing or attempting to influence an officer or employee of any Federal agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with the awarding of any Federal contract, the making of any Federal grant, the making of any Federal loan, the entering into of any cooperative agreement, and the extension, continuation, renewal, amendment, or modification of any Federal contract, grant, loan, or cooperative agreement.
 - b. If any funds other than Federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any Federal agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with this Federal contract, grant, loan, or cooperative agreement, the undersigned shall complete and submit Standard Form-LLL, "Disclosure Form to Report Lobbying," in accordance with its instructions, and shall include a copy of said form in its proposal or bid, or submit it with the executed Contract or Subcontract.
2. This certification is a material representation of fact upon which reliance was placed when this transaction was made or entered into. Submission of this certification is a prerequisite for making or entering into this transaction imposed by 31 U.S.C. 1352. Any person who fails to file the required certification shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each such failure.
3. The Design-Build Contractor and Subcontractor(s) shall require that the language of this certification be included in all lower tier Subcontracts which exceed \$100,000 and that all such recipients shall certify and disclose accordingly.
4. The undersigned certifies or affirms the truthfulness and accuracy of each statement of its certification and disclosure, if any. In addition, the undersigned understands and agrees that the provisions of 31 U.S.C. §3801, et seq., apply to this certification and disclosure, if any.

[Note: Pursuant to 31 U.S.C. § 1352(c)(1)-(2)(A), any person who makes a prohibited expenditure or fails to file or amend a required certification or disclosure form shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each expenditure or failure.]

ATTACHMENT 7

COMPLIANCE WITH BUY AMERICA REQUIREMENTS

The Design-Build Contractor shall comply with the Federal Highway Administration (FHWA) Buy America Requirement in 23 CFR 635.410, which permits FHWA participation in the Contract only if domestic steel and iron will be used on the Project. To be considered domestic, all steel and iron used and all products manufactured from steel and iron must be produced in the United States and all manufacturing processes, including application of a coating, for these materials must occur in the United States. Coating includes all processes that protect or enhance the value of the material to which the coating is applied. This requirement does not preclude a minimal use of foreign steel and iron materials, provided the cost of such materials does not exceed 0.1% of the contract price under the Contract.

Concurrently with execution of the Contract, the Design-Build Contractor has completed and submitted, or shall complete and submit, to the Department a Buy America Certificate, in format below. After submittal, the Design-Build Contractor is bound by its original certification.

A false certification is a criminal act in violation of 18 U.S.C. 1001. Should this Contract be investigated, the Design-Build Contractor has the burden of proof to establish that it is in compliance.

At the Design-Build Contractor's request, the Department may, but is not obligated to, seek a waiver of Buy America requirements if grounds for the waiver exist. However, the Design-Build Contractor certifies that it will comply with the applicable Buy America requirements if a waiver of those requirements is not available or not pursued by the Department. A request for a waiver shall be treated as a Concessionaire request for a Deviation under the Agreement.

BUY AMERICA CERTIFICATE

The undersigned certifies on behalf of itself and all proposed subcontractors (at all tiers) that only domestic steel and iron will be used in the Project.

A. The Design-Build Contractor shall comply with the Federal Highway Administration (“FHWA”) Buy America Requirements of 23 CFR 635.410, which permits FHWA participation in the Contract only if domestic steel and iron will be used on the Project. To be considered domestic, all steel and iron used and all products manufactured from steel and iron must be produced in the United States, and all manufacturing processes, including application of a coating, for these materials must occur in the United States. Coating includes all processes which protect or enhance the value of the material to which the coating is applied. This requirement does not preclude a minimal use of foreign steel and iron materials, provided the cost of such materials does not exceed 0.1% of the Contract Price.

B. A false certification is a criminal act in violation of 18 U.S.C. 1001. Should this Contract be investigated, the Concessionaire has the burden of proof to establish that it is in compliance.

C. At the Design-Build Contractor’s request, the Department may, but is not obligated to, seek a waiver of Buy America requirements if grounds for the waiver exist. However, the Design-Build Contractor certifies that it will comply with the applicable Buy America requirements if a waiver of those requirements is not available or not pursued by the Department.

DESIGN-BUILD CONTRACTOR	
SIGNATURE	
NAME (Printed or Typed)	
TITLE	
DATE	

ATTACHMENT 8

S102CF2-0813

VIRGINIA DEPARTMENT OF TRANSPORTATION SPECIAL PROVISION

USE OF DOMESTIC MATERIAL

July 26, 2013

SECTION 102.05 PREPARATION OF BID of the Specifications is amended to include the following:

In accordance with the provisions of Section 635.410(b) of Title 23 CFR, hereinafter referred to as "Buy America", except as otherwise specified, all iron and steel products (including miscellaneous steel items such as fasteners, nuts, bolts and washers) to be permanently incorporated for use on federal aid projects shall be produced in the United States of America regardless of the percentage they exist in the manufactured product or final form they take. Therefore, "Domestically produced in the United States of America" means all manufacturing processes must occur in the United States of America, to mean, in one of the 50 States, the District of Columbia, Puerto Rico or in the territories and possessions of the United States. Manufacturing processes are defined as any process which alters or modifies the chemical content, physical size or shape or final finish of iron or steel material) such as rolling, extruding, bending, machining, fabrication, grinding, drilling, finishing, or coating whereby a raw material or a reduced iron ore material is changed, altered or transformed into a steel or iron item or product which, because of the process, is different from the original material. For the purposes of satisfying this requirement "coating" is defined as the application of epoxy, galvanizing, painting or any other such process that protects or enhances the value of the material. Materials used in the coating process need not be domestic materials.

For the purposes herein the manufacturing process is considered complete when the resultant product is ready for use as an item in the project (e.g. fencing, posts, girders, pipe, manhole covers, etc.) or is incorporated as a component of a more complex product by means of further manufacturing. Final assembly of a product may occur outside of the United States of America provided no further manufacturing process takes place.

Raw materials such as iron ore, pig iron, processed, pelletized and reduced iron ore, waste products (including scrap, that is, steel or iron no longer useful in its present form from old automobiles, machinery, pipe, railroad rail, or the like and steel trimmings from mills or product manufacturing) and other raw materials used in the production of steel and/or iron products may, however, be imported. Extracting, handling, or crushing the raw materials which are inherent to the transporting the materials for later use in the manufacturing process are exempt from Buy America. The use of foreign source steel or iron billet is not acceptable under the provisions of Buy America. For the purposes of this provision all steel or iron material not meeting the criteria as domestically produced in the United States of America will be considered as "foreign" material. All iron and steel items will be classified hereinafter as "domestic" or "foreign", identified by and subject to the provisions herein.

Domestically produced iron or steel ingots or billets shipped outside the United States of America for any manufacturing process and returned for permanent use in a project would not comply with "Buy America" requirements.

Buy America provisions do not apply to iron or steel products used temporarily in the construction of a project such as temporary sheet piling, temporary bridges, steel scaffolding, falsework or such temporary material or product or material that remains in place for the Contractor's convenience.

Section 635.410(b) of Title 23 CFR permits a minimal amount of steel or iron material to be incorporated in the permanent work on a federal-aid contract. The cost of such materials or products

must not exceed one-tenth of one percent of the contract amount or \$2500, whichever is greater. The cost of the foreign iron or steel material is defined as its monetary value delivered to the job site

and supported by invoices or bill of sale to the Contractor. This delivered to site cost must include transportation, assembly, installation and testing.

In the event the total cost of all "foreign" iron and steel product or material does not exceed one-tenth of one percent of the total contract cost or \$2,500, whichever is greater, the use of such material meeting the limitations herein will not be restricted by the domestic requirements herein. However, by signing the bid, the Bidder certifies that such cost does not exceed the limits established herein.

Waivers:

With prior concurrence from Federal Highway Administration (FHWA) headquarters, the Federal Highway Division Administrator may grant a waiver to specific projects provided it can be demonstrated:

1. that the use of domestic steel or iron materials would be inconsistent with the public interest; or
2. materials or products requested for use are not produced in the United States in sufficient or reasonably available quantities and are of satisfactory quality for use in the permanent work.

The waiver request shall be submitted with supportive information to include:

1. Project number\description, project cost, waiver item, item cost, country of origin for the product, reason for the waiver, and
2. Analysis of redesign of the project using alternative or approved equal domestic products

In order to grant such a waiver, the request for the waiver must be published in the Federal Register for a period not less than 15 days or greater than 60 days prior to waiving such requirement. An initial 15 day comment period to the waiver will be available to the public by means of the FHWA website: <http://www.fhwa.dot.gov/construction/contracts/waivers.cfm>. Following that initial 15day period of review and comment the request for waiver will be published by the FHWA in the Federal Register. The effective date of the FHWA finding, either to approve or deny the waiver request, will be 15 days following publication in the Federal Register.

Only the FHWA Administrator may grant nationwide waivers which still are subject to the public rulemaking and review process.

Alternative Bidding Procedures:

An alternative bidding procedure may be employed to justify the use of foreign iron and\or steel. To qualify under this procedure, the total project is bid using two alternatives, one based on the use of domestic products and the other, the use of corresponding foreign source steel and\or iron materials.

In accordance with the provisions of Section 103.02 the Contract will be awarded to the lowest responsive and responsible bidder who submits the lowest total bid based on furnishing domestic iron or steel unless such total exceeds the lowest total bid based on furnishing foreign iron and\or steel by more than 25 percent, in which case the award will be made to the lowest responsive and responsible bidder furnishing foreign iron and\or steel based upon furnishing verifiable supportive data. The bidder shall submit a bid based on permanently incorporating only domestic iron and\or steel in the construction of the project. The bidder may also submit a bid for the same proposed contract based on being allowed to permanently incorporate corresponding foreign iron and\or steel materials meeting the other contract requirements into the work on the contract. If he chooses to submit such a bid, that alternate bid shall clearly indicate which foreign iron and\or steel items will be permanently installed in the work as well as contain prices for all other items listed in the corresponding domestic

proposal to complete a total "Foreign" bid.

In the event the contract is awarded to the bidder furnishing foreign iron and/or steel materials or items the provision for price adjustment of steel items will be permitted, however, price fluctuations shall use the U.S. index as stated in the Special Provision for Price Adjustment For Steel. The Contractor must indicate which corresponding eligible steel items he chooses price adjustment to apply. In the event the contract is awarded to a bidder furnishing foreign iron and/or steel items and during the life of that contract the Contractor discovers he cannot furnish foreign iron and/or steel material as originally anticipated and agreed upon, he shall be responsible to honor the total bid price and furnish such iron and/or steel materials meeting the contract requirements from other sources as necessary to complete the work.

In the event the Contractor proposes to furnish "foreign" iron and steel and can verify a savings in excess of 25 percent of the overall project cost if bid using domestic materials, the Contractor shall submit a second complete paper bid proposal clearly marked "Foreign" including Form C-7 and supportive data supplement on all sheets. Supportive data shall list, but not be limited to, origin of material, best price offer, quantity and complete description of material, mill analysis, evidence or certification of conformance to contract requirements, etc. The "Foreign" bid shall be completed using the best price offer for each corresponding bid item supplying foreign material in the alternative bid and submit the same with the Contractor's "Domestic" bid. The Contractor shall write the word "Foreign" by the bid total shown on Form C-7 as well as last page of Schedule of Items showing the total bid amount. The bidder shall also contact the State Contract Engineer to inform him that he is also submitting an alternate "Foreign" paper bid.

The information listed on the supportive data sheet(s) will be used to provide the basis for verification of the required cost savings. In the event comparison of the prices given, or corrected as provided in Section 103.01 of the Specifications, shows that use of "foreign" iron and steel items does not represent a cost savings exceeding the aforementioned 25 percent, "domestic" iron and/or steel and prices given there for shall be used and the "100 percent Domestic Items Total" shall be the Contractor's bid.

Certification of Compliance:

Where domestic material is supplied, prior to incorporation into the Work, the Contractor shall furnish to the Department a certificate of compliance (such as may be furnished by steel mill test reports) that all steel and/or iron products supplied to the project except as may be permitted (one-tenth of one percent of the total contract cost or \$2,500, whichever is greater) and permanently incorporated into the work satisfies the domestic requirements herein. This certification shall contain a definitive statement about the origin of all products covered under the provisions of Buy America as stated herein.

In lieu of the Contractor providing personal certification, the Contractor may furnish a stepped certification in which each handler of the product, such as supplier, fabricator, manufacturer, processor, etc. furnishes an individual certification that their step in the process was domestically performed.

ATTACHMENT 9

CERTIFICATION OF NONDISCRIMINATION IN EMPLOYMENT

By signing this Contract, the Contractor certifies that he has participated in a previous contract or subcontract subject to the equal opportunity clause, as required by Executive Orders 10925, 11114, or 11246, or if he has not participated in a previous contract of this type, or if he has had previous contract or subcontracts and has not filed, he will file with the Joint Reporting Committee, the Director of the Office of Federal Contract Compliance, a Federal Government contracting or administering agency, or the former President's Committee on Equal Employment Opportunity, all reports due under the applicable filing requirements.

Note: The above certification is required by the Equal Employment Opportunity Regulations of the Secretary of Labor (41 CFR 60-1.7(b)(1)), and must be submitted by bidders and proposed subcontractors only in connection with contracts and subcontracts which are subject to the equal opportunity clause. Contracts and subcontracts which are exempt from the equal opportunity clause are set forth in 41 CFR 60-1.5. (Generally only contracts or subcontracts of \$10,000 or under are exempt.)

Currently, Standard Form 100 (EEO-1) is the only report required by the Executive Orders or their implementing regulations.

Proposed prime contractors and subcontractors who have participated in a previous contract or subcontract subject to the Executive Orders and have not filed the required reports should note that 41 CFR 60-1.7(b)(1) prevents the award of contracts and subcontracts unless such contractor submits a report covering the delinquent period or such other period specified by the Federal Highway Administration or by the Director, Office of Federal Contract Compliance, U.S. Department of Labor.

ATTACHMENT 10

ON-THE-JOB TRAINING PROGRAM FOR FEDERAL-AID HIGHWAY CONSTRUCTION PROJECTS

This training special provision is the Department's implementation of 23 U.S.C. § 140 (a). The primary objective of this provision is to train and upgrade minorities and women toward journey worker status. This training commitment is not intended and shall not be used to discriminate against any applicant for training, whether a member of a minority group or not.

As part of the Design-Build Contractor's equal employment opportunity affirmative action program, training shall be provided as follows:

1. The Design-Build Contractor shall ensure that on-the-job training (OJT) aimed at developing full journey worker status in the type of trade or job classification involved is provided.
2. The Department has assigned a project-specific trainee goal in accordance with the following guidelines as set forth in 23 C.F.R. §230.111:
 - 1) Dollar value of the contract;
 - 2) Duration of the contract;
 - 3) Geographic location;
 - 4) Availability of minorities, women, and disadvantaged for training;
 - 5) The potential for effective training;
 - 6) Type of work;
 - 7) Total normal work force that the average proposer could be expected to use;
 - 8) The need for additional journeymen in the area;
 - 9) Recognition of the suggested minimum goal for the State; and
 - 10) A satisfactory ratio of trainees to journeymen expected to be on the Concessionaire's work force during normal operations.
3. The OJT program trainee goal for this project is 24 trainees.
4. The Design-Build Contractor will have fulfilled its responsibilities under this provision when acceptable training has been provided to the number of trainees assigned to this project.
5. In the event that the Design-Build Contractor subcontracts a portion of the contract work, it shall determine if any of the trainees are to be trained by the subcontractor. The Design-Build Contractor should insure that this training special provision is made applicable to such subcontract. However, the Design-Build Contractor shall retain the primary responsibility for meeting the training requirements imposed by this special provision.
6. The Design-Build Contractor shall make every effort to ensure minorities and women are enrolled and trained in the program. The Design-Build Contractor shall conduct systematic and direct recruitment through public and private sources likely to yield minority and

- women trainees to the extent that such persons are available within a reasonable area of recruitment.
7. It is the intention of this provision that training is to be provided in the construction crafts. Training is permissible in lower level management positions such as office engineers, estimators, timekeepers, etc., where the training is oriented toward construction applications. Some offsite training is permissible as long as the training is an integral part of an approved training program and does not comprise a significant part of the overall training.
 8. The Department and the Federal Highway Administration (FHWA) shall approve a training program if it meets the equal employment opportunity obligations of the Concessionaire and aims to train and upgrade employees to journey worker status.
 9. The Department's OJT Program has been designed to ensure that the trainee consistently receives the level and quality of training necessary to perform as a journey worker in his/her respective skilled trade classification. Standard training programs for each skilled construction trade classification are located in the OJT program manual.
 10. Apprenticeship programs registered with the U.S. Department of Labor, Bureau of Apprenticeship and Training, or with a State apprenticeship agency recognized by the Bureau, or training programs approved but not necessarily sponsored by the U.S. Department of Labor, Manpower Administration, Bureau of Apprenticeship and Training shall also be considered acceptable provided the program is being administered in a manner consistent with the equal employment obligations of Federal-aid highway construction contracts.
 11. The number of trainees shall be distributed among the work classifications on the basis of the Design-Build Contractor's needs and the availability of journey worker in the various classifications.
 12. No employee shall be employed as a trainee in any classification in which he or she has successfully completed a training course leading to journey worker status or in which he or she has been employed as a journey worker. The Design-Build Contractor may satisfy this requirement by including appropriate questions in the employee application or by other suitable means. Regardless of the method used, the Design-Build Contractor's records should document the findings in each case.
 13. At or before full Notice to Proceed, the Concessionaire must submit the Contractor OJT Plan form to the Department's Office of Civil Rights (OCR). The plan shall specify how the Concessionaire intends to satisfy its goal by including the following information: the type of apprentice or training program, number of trainees, type of training, and length of training.
 14. The trainee(s) shall begin training on the project after full Notice to Proceed and remain on the project as long as training opportunities exist or until the training is completed.
 15. The trainees will be paid at minimum, 60% of the appropriate journey worker's rate specified in the contract for the first half of the training period, 75% for the third quarter of

the training period, and 90 percent for the last quarter of the training period. However, if the apprentices or trainees are enrolled in another program approved by the Department of Labor or other agency, such appropriate rates shall apply.

16. The OCR must approve all proposed apprentices and trainees before training begins. The Design-Build Contractor must submit the Trainee Enrollment Form in order for training to be counted toward the project goal and be eligible for reimbursement. The Design-Build Contractor shall provide each trainee with a copy of the training program he or she will follow.
17. On a weekly basis, the Design-Build Contractor shall submit Form C-67 (Weekly Trainee Report) to the Department and the OCR. The weekly reporting form will include the required training information and certification that the information is accurate and complete. If a trainee is terminated, the Concessionaire is required to notify the Department immediately.
18. The Design-Build Contractor shall provide each trainee with a certification showing the type and length of training satisfactorily completed.
19. If requested, the Design-Build Contractor may be reimbursed 80 cents per hour of training for each trainee working on this project and whose participation towards the OJT project goal has been approved.

This reimbursement will be made regardless of whether the Design-Build Contractor receives additional training program funds from other sources, provided such other program requirements do not specifically prohibit the Design-Build Contractor from receiving other reimbursement. Reimbursement for offsite training indicated above may only be made to the Design-Build Contractor if the trainees are concurrently employed on a federal-aid project and when the Concessionaire contributes to the cost of the training, or provides the instruction to the trainee, or pays the trainee's wages during the offsite training period.

No payment shall be made to the Design-Build Contractor if either the failure to provide the required training or the failure to hire the trainee as a journeyman is caused by the Design-Build Contractor and evidences a lack of good faith on the part of the Design-Build Contractor in meeting the requirements of this Special Training Provision.

20. Detailed program reporting requirements and procedures, reporting forms, and the list of approved training classifications are found in the OJT program manual, which can be obtained upon request by contacting the OCR.

PART 4
GENERAL CONDITIONS

PART 4

**General Conditions of Contract
Between
Concessionaire and Design-Builder**

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Article 1 General

1.1 Mutual Obligations

1.1.1 Concessionaire and Design-Builder commit at all times to cooperate fully with each other, and proceed on the basis of trust and good faith, to permit each party to realize the benefits afforded under the 395 Contract Documents.

1.2 Basic Definitions

1.2.1 For the purposes of the 395 Contract Documents, the words and terms are defined in Exhibit 1.2.1, 395 Project Specific Terms.

Article 2 Design-Builder's Services and Responsibilities

2.1 General

2.1.1 Design-Builder's Representative shall be reasonably available to Concessionaire and shall have the necessary expertise and experience required to supervise the 395 Work. Design-Builder's Representative shall communicate regularly with Concessionaire and shall be vested with the authority to act on behalf of Design-Builder.

2.1.2 Design-Builder will attend a kick-off meeting with Concessionaire to discuss issues affecting the administration of the 395 Work and to implement the necessary procedures, including those relating to submittals and payment, to facilitate the ability of the parties to perform their obligations under the 395 Contract Documents. Concessionaire will notify Design-Builder of the time and location of the kick-off meeting. All Key Personnel shall participate in this kick-off meeting.

2.1.3 Design-Builder shall provide Concessionaire with the Baseline Schedule, Schedule Updates, Schedule Revisions, monthly reports and Final As-Built Schedule set forth in Section 1.4 of the Part 2 (395 Project Information and Technical Requirements).

2.1.4 Design-Builder shall, at its sole cost and expense, perform all services associated with the acquisition of any other properties that are necessary, or that Design-Builder deems necessary, to enable Design-Builder to perform the 395 Work.

2.1.5 Design-Builder shall provide management for the 395 Work in accordance with the organization chart set forth in the Proposal. Design-Builder acknowledges the importance of its "Key Personnel". "Key Personnel" shall include the Design-Build Project Manager (the "**Design-Builder's Representative**"), Safety Manager, Quality Assurance Manager, Design Manager, ITS Design Manager, Construction Manager, and ITS Construction Manager (collectively, "**Key Personnel**"). Job duties and responsibilities of Key Personnel shall not be delegated to others for the duration of the 395 Contract. Design-Builder shall not change or substitute any Key Personnel

except due to voluntary or involuntary termination of employment, retirement, death, disability, incapacity, or as otherwise approved by Concessionaire. None of the Key Personnel may be withdrawn from the 395 Project without prior written approval of Concessionaire, with it being understood and agreed that Design-Builder will provide Concessionaire with at least thirty (30) days written notice of any request to withdraw any Key Personnel. Concessionaire will have the right to review the qualifications of each individual to be appointed to a Key Personnel position and to approve or disapprove use of such individual in such position prior to the commencement of any 395 Work by such individual. Design-Builder shall remove or replace, or have removed or replaced, any personnel performing the 395 Work if Concessionaire has a reasonable objection to such person.

2.1.6 Design-Builder shall be responsible for acquiring additional 395 Project Right of Way in accordance with Part 2 (395 Project Information and Technical Requirement) Section 1.6 (Right of Way) and the 395 Contract Documents.

The 395 Contract Price does not include the Department's 395 Right of Way Costs. Such costs will be paid directly by the Department to the applicable landowner following the submittal of a written request by the Design-Builder and all necessary supporting documentation. The 395 Contract Price is deemed to include any and all other costs associated with acquisition of 395 Project Right of Way, including but not limited to the Design-Builder 395 Right of Way Costs.

Design-Builder waives any right to seek an adjustment in the 395 Contract Price or 395 Contract Time(s) associated with right-of-way or easement acquisition, including but not limited to claims based on reliance on any information depicted in the RFP Documents or Supplemental Information. For the avoidance of doubt, Design-Builder acknowledges that it has been advised that: (a) the right-of-way limits shown on the RFP Documents are not based on a survey and, consequently, may need to be adjusted by Design-Builder during the design process; and (b) the 395 Express Lanes Right-of-Way Report included as RFP Supplemental Information made available to Design-Builder during the proposal process, is not reliable for determining the specific right-of-way that will be required for the 395 Project.

Design-Builder shall maintain all parts of the 395 Project Right of Way until care, custody and control is transferred to Concessionaire or the Department, as applicable, in accordance with the terms of the 395 Contract Documents.

2.1.7 Design-Builder shall submit its QA/QC Plan to the Concessionaire for review in accordance with Part 2 (395 Project Information and Technical Requirements).

2.1.8 Design-Builder shall coordinate and lead all monthly progress meetings. During such meetings, progress during the prior month shall be reviewed. Design-Builder shall collect information from Design Consultants and any key Subcontractors responsible for work completed during the specified duration and work scheduled during the upcoming reporting duration. The monthly meetings shall be attended by all Key Personnel, as well as any other individuals that Concessionaire may require. Meetings will occur monthly beginning the month after Design-Builder's receipt of Concessionaire's Limited Notice to Proceed (LNTP). Design-Builder shall be responsible for preparing, maintaining and distributing minutes of the meetings to all attendees for review. The meeting minutes shall be provided to the Concessionaire within two (2) days of the

monthly progress meeting.

2.1.9 Design-Builder shall perform the 395 Work in accordance with: (a) the 395 Contract Documents; (b) applicable Legal Requirements and Governmental Approvals; and (c) the degree of skill and judgment prevailing on the 395 Design-Build Contract Date that is expected to be exercised by prudent, skilled and experienced contractors and design professionals on similar projects in the Commonwealth of Virginia, taking into consideration safety, operational requirements, level of service, and life cycle costs. Notwithstanding the above, if any of (a), (b) or (c) in the preceding sentence conflict, Design-Builder shall be obligated to perform the 395 Work in accordance with the more stringent standard.

2.1.10 Within sixty (60) days after the Commencement Date, Concessionaire and Design-Builder shall develop and adopt written policies establishing ethical standards of conduct for Design-Builder's directors, officers and supervisory or management personnel in dealing with the Department and employment relations. Design-Builder shall comply with and enforce such policies. Without limiting the foregoing, Design-Builder further agrees: (i) no gifts, gratuities, or favors of any nature whatsoever will be given or offered by it to personnel of the Department; and (ii) it will not employ personnel of the Department for any services during the term of the 395 Design-Build Contract without the prior written consent of the Department. If the Department determines, after investigation, that Design-Builder or any of its employees, representatives, or agents of any person acting in its behalf have violated this provision, Design-Builder may, at the discretion of the Department, be disqualified from bidding on future contracts with the Department for a period of six (6) months from the date of the Department's determination of such a violation. Any implicated employees, agents, or representatives of Design-Builder may be prohibited from working on any contract awarded by the Department for the period of disqualifications.

2.2 Scope Validation and Identification of Scope Issues

2.2.1 Scope Validation Period. The term "**Scope Validation Period**" is the period of time that begins on Design-Builder's receipt of Concessionaire's LNTP and extends for ninety (90) days from such date of receipt. During the Scope Validation Period, Design-Builder shall thoroughly review and compare all of the then-existing 395 Contract Documents, including without limitation the RFP Documents and the Proposal, to verify and validate Design-Builder's proposed design concept and identify any defects, errors, or inconsistencies in the RFP Documents that affect Design-Builder's ability to complete its proposed design concept within the 395 Contract Price and/or 395 Contract Time(s) (collectively referred to as "**Scope Issues**"). The term "Scope Issue" shall not be deemed to include items that Design-Builder should have reasonably discovered prior to the 395 Design-Build Contract Date.

2.2.2 Scope Validation Period for Non-Accessible Areas of the Site. The parties recognize that Design-Builder may be unable to conduct the additional investigations contemplated by Section 4.2.2 below because it will not have access to certain areas of the Site within the Scope Validation Period set forth in Section 2.2.1 above. Design-Builder shall notify Concessionaire at the meeting set forth in Section 2.1.2 of all such non-accessible areas and the dates upon which such areas are expected to become accessible. If Concessionaire agrees that such areas are non-accessible, then, for the limited purpose of determining Scope Issues that directly arise from geotechnical evaluations for such areas, the term "**Scope Validation Period**" shall be deemed to

be the thirty (30) day period after the date the specified area becomes accessible for purposes of conducting the geotechnical evaluation. Design-Builder hereby acknowledges that the areas within the Right of Way that will be necessary for the sound barrier scope of work will not be considered as “non-accessible” for purposes of extending the Scope Validation Period, notwithstanding that the final locations of sound barriers may be determined after the expiration of the Scope Validation Period. Design-Builder also hereby acknowledges that bridge substructure components including beams, underside of the deck, bearing locations, and abutments will not be considered “non-accessible” for purposes of extending the Scope Validation Period.

2.2.3 Submission Requirements for Scope Issues. If Design-Builder intends to seek relief for a Scope Issue, it shall promptly, but in no event later than the expiration of the Scope Validation Period, provide Concessionaire in writing with a notice (“**General Notice**”) of the existence of such Scope Issue, which General Notice shall generally explain the basis for such Scope Issue. Within twenty-one (21) days of the General Notice of a Scope Issue, but no later than 90 days after the commencement of the Scope Validation Period, the Design-Builder shall provide Concessionaire with documentation that specifically explains its support for the Scope Issue (“**Supporting Documentation**”), which Supporting Documentation shall include, among other things: (a) the assumptions that Design-Builder made during the preparation of its proposal that form the basis for its allegation, along with documentation verifying that it made such assumptions in developing its proposal; (b) an explanation of the defect, error or inconsistency in the RFP Documents that Design-Builder could not have reasonably identified prior to the 395 Design-Build Contract Date; and (c) the specific impact that the alleged Scope Issue has had on Design-Builder’s price and time to perform the 395 Work. For the avoidance of doubt: (1) Design-Builder shall not be entitled to raise in its Supporting Documentation any Scope Issues that were not previously addressed in a General Notice; and (2) Design-Builder shall have no right to seek any relief for any Scope Issues that have not been specifically identified in a General Notice provided to Concessionaire during the Scope Validation Period.

2.2.4 Resolution of Scope Issues. Within a reasonable time after Concessionaire’s receipt of the Supporting Documentation described in Section 2.2.3 above, the parties shall meet and confer to discuss the resolution of such Scope Issues. If Concessionaire agrees that Design-Builder has identified a valid Scope Issue that materially impacts Design-Builder’s price or time to perform the 395 Work, a 395 Work Order shall be issued in accordance with Article 9 hereof. If Concessionaire disagrees that Design-Builder has identified a valid Scope Issue that materially impacts Design-Builder’s price or time to perform the 395 Work, then Design-Builder’s recourse shall be as set forth in Article 10. Notwithstanding anything to the contrary in the 395 Contract Documents or as a matter of law, Design-Builder shall have the burden of proving that the alleged Scope Issue could not have been reasonably identified prior to the 395 Design-Build Contract Date and that such Scope Issue materially impacts its price or time to perform the 395 Work. The Concessionaire and Design-Builder shall endeavor to resolve all valid Scope Issues within 30 days of the completion of the respective Scope Validation Periods established in Sections 2.2.1 and 2.2.2.

2.2.5 Design-Builder’s Assumption of Risk of Scope Issues. The Parties acknowledge that the purpose of the Scope Validation Period is to enable Design-Builder to identify those Scope Issues that could not reasonably be identified prior to the 395 Design-Build Contract Date. By executing this 395 Design-Build Contract, Design-Builder acknowledges that the Scope Validation Period is

a reasonable time to enable Design-Builder to identify Scope Issues that will materially impact Design-Builder's price or time to perform the 395 Work. After the expiration of the Scope Validation Period, with the sole exception of those Scope Issues made the subject of a General Notice during the Scope Validation Period and subject to valid requests for 395 Work Orders in accordance with Section 2.2.3 above, the parties agree as follows:

.1 Design-Builder shall assume and accept all risks, costs, and responsibilities of any Scope Issue arising from or relating to the 395 Contract Documents, including but not limited to conflicts within or between the RFP Documents and Proposal;

.2 Design-Builder shall be deemed to have expressly warranted that the 395 Contract Documents existing as of the end of the Scope Validation Period are sufficient to enable Design-Builder to complete the design and construction of the 395 Project without any increase in the 395 Contract Price or extension to the 395 Contract Time(s); and

.3 Concessionaire expressly disclaims any responsibility for, and Design-Builder expressly waives its right to seek any increase in the 395 Contract Price or extension to the 395 Contract Time(s) for, any Scope Issue associated with any of the 395 Contract Documents, including but not limited to the RFP Documents.

2.2.6 Waiver of Rights. The failure of Design-Builder to meet the submission requirements required under Section 2.2.3 above for a Scope Issue, including but not limited to the times for providing notice and documentation of the Scope Issue, shall conclusively constitute a waiver of Design-Builder's rights to seek relief for such Scope Issue.

2.2.7 Failure of Technical Proposal to Meet Requirements of the 395 Contract Documents. Notwithstanding anything to the contrary in this Section 2.2 or elsewhere in the 395 Contract Documents, Concessionaire shall have no responsibility in the event Design-Builder's Proposal fails to meet the requirements of the 395 Contract Documents, regardless of whether: (a) Concessionaire modified the RFP Documents to permit Design-Builder to implement a technical approach; (b) Concessionaire accepted Design-Builder's Proposal; or (c) any other action or inaction of Concessionaire is alleged by Design-Builder.

2.3 Design Professional Services

2.3.1 Design-Builder shall, consistent with applicable state licensing laws, provide through qualified, licensed design professionals employed by Design-Builder, or procured from qualified, independent licensed Design Consultants, the necessary design services, including architectural, engineering, surveying, and other design professional services, for the preparation of the required drawings, specifications and other design submittals to permit Design-Builder to complete the 395 Work consistent with the 395 Contract Documents. All design professional services shall be performed by professionals properly licensed in the Commonwealth of Virginia and who are well-versed in the Concessionaire's design standards and practices.

2.3.2 No Design Consultant is intended to be, nor shall any Design Consultant be deemed to be, a third-party beneficiary of this 395 Design-Build Contract. Concessionaire is intended to be and

shall be deemed a third-party beneficiary of all contracts between Design-Builder and any Design Consultant. In the event that this 395 Design-Build Contract is terminated, Design-Builder shall, upon the written demand of Concessionaire, assign such contracts to Concessionaire.

2.3.3 Design-Builder shall incorporate all obligations and understandings of the 395 Contract Documents applicable to design services in its respective contracts with any Design Consultant, and require that such obligations be flowed down to lower-tiered Design Consultants, including the obligations relative to ownership of the 395 Work Product set forth in Article 4 of the 395 Design-Build Contract.

2.4 Design Development Services

2.4.1 Design-Builder shall be responsible for the professional quality, technical accuracy, timely completion and coordination of all drawings, specifications and other design submissions required to be developed by Design-Builder under the 395 Contract Documents and shall, without additional compensation, correct or revise any errors, omissions or other deficiencies in such design submissions.

2.4.2 Design-Builder shall, consistent with any applicable provision of the 395 Contract Documents, provide Concessionaire with five (5) sets of interim design submissions, in accordance with the Part 2 (395 Project Information and Technical Requirements). On or about the time of the scheduled submissions, Design-Builder and Concessionaire shall meet and confer about the submissions, with Design-Builder identifying during such meetings, among other things, the evolution of the design and any significant changes or deviations from the 395 Contract Documents, or, if applicable, previous design submissions. Minutes of the meetings will be maintained by Design-Builder and provided to all attendees for review. Following the design review meeting, Concessionaire shall review and provide comments on the interim design submissions within twenty-one (21) days after receipt of the required submissions. Design-Builder shall promptly revise and modify all such submittals so as to fully reflect all comments and shall deliver to Concessionaire revised submittals for review and comment (and approval as the case may be).

2.4.3 Design-Builder shall submit to Concessionaire Construction Documentation in accordance with Part 2 (395 Project Information and Technical Requirements).

2.4.4 Concessionaire's review, comment and/or approval of interim design submissions and the Construction Documentation are for the purpose of establishing Design-Builder's compliance with the requirements of the Contract Documentation and mutually establishing a conformed set of 395 Contract Documents compatible with the requirements of the 395 Work. Concessionaire's review, comment and/or approval of any interim or final design submission (including but not limited to the Construction Documentation) shall not be deemed to transfer any liability from Design-Builder to Concessionaire.

2.4.5 To the extent not prohibited by the 395 Contract Documents or Legal Requirements, Design-Builder may, with the prior agreement of Concessionaire, prepare design submittals and Construction Documentation for a portion of the 395 Work to permit procurement and construction

to proceed on that portion of the 395 Work prior to completion of the Construction Documentation for the entire 395 Work.

2.5 Legal Requirements

2.5.1 Design-Builder shall keep fully informed of and perform the 395 Work in accordance with all Legal Requirements. Design-Builder shall provide all notices, and execute and file the documents, statements and/or affidavits applicable to the 395 Work as required by the Legal Requirements. Design-Builder shall permit Concessionaire's examination of any records made subject to such examination by any applicable Legal Requirements.

2.5.2 Design-Builder may request, by submission of a 395 Work Order request, that the 395 Contract Price and/or 395 Contract Time(s) shall be adjusted to compensate Design-Builder for the effects of any changes in the Legal Requirements enacted after the 395 Design-Build Contract Date, affecting the performance of the 395 Work. Such effects may include, without limitation, revisions Design-Builder is required to make to the Construction Documentation because of changes in Legal Requirements. Notwithstanding anything to the contrary, the relief afforded by this Section 2.5 shall not apply to changes in any tax laws, with Design-Builder bearing the risk of such changes.

2.6 Governmental Approvals

2.6.1 Except as identified in Section 3.5.1, Design-Builder shall obtain and pay for all necessary Governmental Approvals required for the prosecution of the 395 Work by any Governmental Unit. If any such Governmental Approval is required to be formally issued in the name of Concessionaire, Design-Builder shall undertake all efforts to obtain such Governmental Approvals subject to Concessionaire's reasonable cooperation with Design-Builder, including execution and delivery of appropriate applications and other documentation in forms approved by Concessionaire. Design-Builder shall deliver to Concessionaire, promptly after Design-Builder's receipt, a copy of each such Governmental Approval, with a listing of the status of all such Governmental Approvals included in the monthly reports required by Section 1.4 of the Part 2 (395 Project Information and Technical Requirements).

2.6.2 Design-Builder shall provide reasonable assistance to Concessionaire in obtaining those Governmental Approvals that are Concessionaire's responsibility, and no construction activity will commence until: (i) all Governmental Approvals required for the relevant construction activity (including any activity that may disturb the Site) have been obtained; (ii) Concessionaire has been notified that such Governmental Approvals have been obtained; and (iii) Concessionaire has, after reviewing the validity and scope of the Governmental Approval, authorized Design-Builder to proceed.

2.6.3 Design-Builder shall ensure that the 395 Work conforms to the requirements and stipulations of all Governmental Approvals. Any violations of or noncompliance with any Governmental Approval, including but not limited to suspensions caused by Design-Builder violating or not being in compliance with a Governmental Approval, shall be at the sole risk of Design-Builder, and shall not be a basis for adjusting the 395 Contract Price and/or 395 Contract Time(s).

2.6.4 Design-Builder shall provide reasonable assistance to Concessionaire in obtaining all other Governmental Approvals that are Concessionaire's responsibility, which assistance may include providing information, documents, design, schedules, and plans associated with such Governmental Approvals.

2.7 Design-Builder's Construction Phase Services

2.7.1 Unless otherwise provided in the 395 Contract Documents to be the responsibility of Concessionaire, TTMS Contractor, or a Separate Contractor, Design-Builder shall provide through itself or Subcontractors the necessary supervision, labor, inspection, testing, start-up, material, equipment, machinery, temporary utilities and other temporary facilities to permit Design-Builder to complete construction of the 395 Project consistent with the 395 Contract Documents.

2.7.2 Design-Builder shall perform all construction activities efficiently and with the requisite expertise, skill and competence to satisfy the requirements of the 395 Contract Documents, and shall maintain or cause to be maintained all licenses required of the Design-Builder or its employees in connection with the 395 Work. Design-Builder shall at all times exercise complete and exclusive control over the means, methods, sequences and techniques of construction.

2.7.3 Design-Builder shall employ only Subcontractors who are duly licensed and qualified to perform the 395 Work lawfully in the Commonwealth of Virginia and consistent with the 395 Contract Documents. Design-Builder shall not use any Subcontractor to whom Concessionaire has a reasonable objection, and shall obtain Concessionaire's written consent before making any substitutions or additions to Subcontractors previously identified to Concessionaire as being members of Design-Builder's 395 Project team, including those who may have been identified in the Proposal.

2.7.4 Design-Builder assumes responsibility to Concessionaire for the proper performance of the 395 Work of Subcontractors and any acts and omissions in connection with such performance. Design-Builder shall provide Concessionaire prompt notice of any material breach of its obligations related to the 395 Work by any Subcontractor, which notice shall in any no event be later than seven (7) days after Design-Builder discovers such material breach. Nothing in the 395 Contract Documents is intended or deemed to create any legal or contractual relationship between Concessionaire and any Subcontractor or Sub-Subcontractor, including but not limited to any third-party beneficiary rights.

2.7.5 Design-Builder shall coordinate the activities of all Subcontractors. If Concessionaire performs other work on the 395 Project or at the Site with the TTMS Contractor and Separate Contractors under Concessionaire's control, Design-Builder agrees to reasonably cooperate and coordinate its activities with those of such contractors so that the 395 Project can be completed in an orderly and coordinated manner without unreasonable disruption.

2.7.6 Design-Builder shall keep the Site reasonably free from debris, trash and construction wastes to permit Design-Builder to perform its construction services efficiently, safely and without interfering with the use of adjacent land areas. Upon Final Completion of the 395 Work, or a portion of the 395 Work, Design-Builder shall remove all debris, trash, construction wastes,

materials, equipment, machinery and tools arising from the 395 Work or applicable portions thereof to permit Concessionaire to occupy the 395 Project or a portion of the 395 Project for its intended use.

2.7.7 Design-Builder shall be responsible for the safety and security of the Site, including any and all materials, equipment, and machinery on the Site, until Final Completion of the 395 Work.

2.8 Design-Builder's Responsibility for Project Safety

2.8.1 Design-Builder recognizes the importance of performing the 395 Work in a safe manner so as to prevent damage, injury or loss to: (i) all individuals at the Site, whether working or visiting; (ii) the 395 Work, including materials and equipment incorporated into the 395 Work or stored on-Site or off-Site; and (iii) all other property at the Site or adjacent thereto. Design-Builder assumes responsibility for implementing and monitoring all safety precautions and programs related to the performance of the 395 Work. Design-Builder shall, prior to commencing construction, designate a Safety Representative with the necessary qualifications and experience to supervise the implementation and monitoring of all safety precautions and programs related to the 395 Work. Unless otherwise required by the 395 Contract Documents, Design-Builder's Safety Representative shall be an individual stationed at the Site who may have responsibilities on the 395 Project in addition to safety. The Safety Representative shall make routine daily inspections of the Site and shall hold weekly safety meetings with Design-Builder's personnel, Subcontractors and others as applicable. Design-Builder shall provide minutes of each safety meeting to Concessionaire within five (5) days of such meeting.

2.8.2 Design-Builder shall provide a Health, Safety and Security (HS&S) Plan for Concessionaire's review in accordance with Part 2 (395 Project Information and Technical Requirements).

2.8.3 Design-Builder and Subcontractors shall comply with: (i) all Legal Requirements relating to safety; (ii) Design-Builder's HS&S Plan; and (iii) any Concessionaire-specific safety requirements set forth in the 395 Contract Documents, provided that such Concessionaire-specific requirements do not violate any applicable Legal Requirement. Design-Builder will immediately report in writing any safety-related injury, loss, damage or accident arising from the 395 Work to Concessionaire's Representative and, to the extent mandated by Legal Requirements, to all Governmental Units having jurisdiction over safety-related matters involving the 395 Project or the 395 Work.

2.8.4 Concessionaire shall have the right to immediately suspend any or all 395 Work if Design-Builder fails to comply with its obligations hereunder.

2.8.5 Design-Builder's responsibility for safety under this Section 2.8 is not intended in any way to relieve Subcontractors and Sub-Subcontractors of their own contractual and legal obligations and responsibility for: (i) complying with all Legal Requirements, including those related to health and safety matters; and (ii) taking all necessary measures to implement and monitor all safety precautions and programs to guard against injury, losses, damages or accidents resulting from their performance of the 395 Work.

2.9 Design-Builder's Warranty

2.9.1 Design-Builder warrants to Concessionaire, the Department, and the 395 Financing Parties that the construction, including all materials and equipment furnished as part of the construction, shall be new unless otherwise specified in the 395 Contract Documents, of good quality, in conformance with the 395 Contract Documents and free of defects in materials and workmanship. Design-Builder's warranty obligation excludes defects caused by abuse, damage, alterations, or failure to maintain the 395 Work by persons other than Design-Builder or anyone for whose acts Design-Builder may be liable. All warranties received by the Design-Builder from Subcontractors shall be passed through to Concessionaire in full. Nothing in this warranty is intended to limit any manufacturer's warranty which provides Concessionaire with greater warranty rights than set forth in this Section 2.9 or the 395 Contract Documents. Design-Builder will provide Concessionaire with all manufacturers' warranties prior to the Final Completion Date or Project Component Final Completion Date associated with a specific Project Component if that work is completed before the Final Completion Date.

2.10 Correction of Defective 395 Work

2.10.1 Design-Builder agrees to correct any 395 Work that is found to not be in conformance with the 395 Contract Documents, including that part of the 395 Work subject to Section 2.9 hereof, within a period of two (2) years from the date of Final Completion of the 395 Work or the Project Component Final Completion Date for any Project Component(s) of the 395 Work completed prior to the Final Completion Date, or within such longer period to the extent required by the 395 Contract Documents or applicable Legal Requirements or Government Approvals (the "**Warranty Period**").

2.10.2 Design-Builder shall, within seven (7) days of receipt of written notice from Concessionaire or the QA Manager that the 395 Work is not in conformance with the 395 Contract Documents, take meaningful steps to commence correction of such nonconforming 395 Work, including the correction, removal or replacement of the nonconforming 395 Work and any damage caused to other parts of the 395 Work affected by the nonconforming 395 Work. If Design-Builder fails to commence the necessary steps within such seven (7) day period, Concessionaire, in addition to any other remedies provided under the 395 Contract Documents, may provide Design-Builder with written notice that Concessionaire will commence correction of such nonconforming 395 Work with its own forces. If Concessionaire does perform such corrective 395 Work, Design-Builder shall be responsible for all reasonable costs incurred by Concessionaire in performing such correction. If the nonconforming 395 Work creates an emergency requiring an immediate response, the seven (7) day periods identified herein shall be deemed inapplicable.

2.10.3 The two (2) year period referenced in Section 2.10.1 above applies only to Design-Builder's obligation to correct nonconforming 395 Work and is not intended to constitute a period of limitations for any other rights or remedies Concessionaire may have regarding Design-Builder's other obligations under the 395 Contract Documents.

2.11 Concessionaire's Rights to Direct Design-Builder

2.11.1 When any act, omission, or other action of Design-Builder occurs that violates the requirements, conditions, or terms of the 395 Contract Documents; or affects the health, safety, or welfare of the public or natural resources, Concessionaire will have the right, but not the obligation, to direct Design-Builder to take prompt action to repair, replace, or restore the damage or injury within a time frame established by Concessionaire. If Design-Builder fails to make such repair, replacement, or restoration within the established time frame, Concessionaire will have the damage or injury repaired, replaced, or restored and will deduct the cost of such repair, replacement, or restoration (plus 25% for supervisory and administrative personnel costs) from monies due Design-Builder.

Article 3

Concessionaire's Services and Responsibilities

3.1 Duty to Cooperate

3.1.1 Concessionaire shall, throughout the performance of the 395 Work, cooperate with Design-Builder and perform its responsibilities, obligations and services in a timely manner to facilitate Design-Builder's timely and efficient performance of the 395 Work and so as not to delay or interfere with Design-Builder's performance of its obligations under the 395 Contract Documents.

3.1.2 Concessionaire shall provide timely reviews and (where required) approvals of submittals, interim design submissions and Construction Documentation consistent with the turnaround times set forth in Design-Builder's schedule, provided, however that, unless stated otherwise in the 395 Contract Documents, Concessionaire shall have twenty-one (21) days after receipt of such submissions to act upon such submissions. This Section 3.1.2 shall not be construed to apply to the acquisition of Governmental Approvals by either the Design-Builder or the Concessionaire.

3.1.3 Concessionaire's Representative will participate in monthly progress meetings for the duration of the 395 Project.

3.2 Furnishing of Services and Information

3.2.1 Concessionaire has provided the RFP Documents for Design-Builder to consider in developing the Proposal and for executing the 395 Work. Design-Builder shall thoroughly review and compare all such documents during the Scope Validation Period and, to the extent that any Scope Issues arise, Concessionaire shall consider such issues in accordance with Section 2.2 above.

3.3 Financial Information

3.3.1 Not Used.

3.3.2 Design-Builder shall cooperate with the reasonable requirements of Concessionaire's lenders or other financial sources. Notwithstanding the preceding sentence, after the Notice to Proceed Date, Design-Builder shall have no obligation to execute for Concessionaire or

Concessionaire's lenders or other financial sources any documents or agreement that require Design-Builder to assume obligations or responsibilities greater than those existing obligations Design-Builder has under the 395 Contract Documents.

3.4 Concessionaire's Representative

3.4.1 Concessionaire's Representative shall be responsible for providing Concessionaire-supplied information and approvals in a timely manner to permit Design-Builder to fulfill its obligations under the 395 Contract Documents. Concessionaire's Representative shall also provide Design-Builder with prompt notice if it observes any failure on the part of Design-Builder to fulfill its contractual obligations, including any errors, omissions or defects in the performance of the 395 Work.

3.5 Governmental Approvals

3.5.1 The Department will obtain and pay for the following Governmental Approvals:

- .1** 395 Express Lanes Finding of No Significant Impact (FONSI) by April 30, 2017.
- .2** Duke-Edsall Widening Categorical Exclusion by April 30, 2017.
- .3** 395 Express Lanes Interchange Modification Report by the Amended and Restated Agreement Date.
- .4** Duke-Edsall Widening Interchange Modification Report by the Amended and Restated Agreement Date.
- .5** Other FHWA Approvals Necessary for the Initiation of the 395 Project by the Amended and Restated Agreement Date.
- .6** Commonwealth Transportation Board Approvals of the 395 Project by the Amended and Restated Agreement Date.
- .7** Authorizations and Permit(s) Necessary for 395 Project Work on the Pentagon Reservation and Mark Center property within 120 days of the Design-Builder fulfilling its obligations with respect to this approval in Sections 1.8.14 and 1.11.7 of Part 2 (395 Project Information and Technical Requirements).

3.5.2 If any of the Government Approvals listed in Section 3.5.1 are not provided to the Design-Builder by the dates specified, the Design-Builder shall be entitled to an extension of the 395 Contract Time and adjustment to the 395 Contract Price for any delays in Design-Builder's performance that are directly attributable to the Department's failure to obtain and pay for these Government Approvals on a timely basis.

3.5.3 Concessionaire shall provide reasonable assistance to Design-Builder in obtaining all other Governmental Approvals that are Design-Builder's responsibility.

3.6 Separate Contractors

3.6.1 Design-Builder hereby acknowledges that Concessionaire, Concessionaire's Affiliates, and/or the Department has, or may in the future have, concurrent contracts with Separate Contractors for performance of other work, including but not limited to operations and maintenance work, on, near, or within the same geographical area of the 395 Work. Design-Builder shall not impede or limit access to such work by Separate Contractors.

3.6.2 When separate contracts are awarded, contractors shall not hinder the work being performed by other contractors. Design-Builder and Separate Contractors shall cooperate with each other. In case of dispute, the Concessionaire will be the referee and its decision will be binding on all parties.

3.6.3 When contracts are awarded to Separate Contractor(s), Design-Builder and the Separate Contractor(s), in conference with the Concessionaire, shall establish a written joint schedule of operations and incorporate it into the Baseline Schedule as described in Section 1.4 of the Part 2 (395 Project Information and Technical Requirements). The schedule shall be based on the limitations of the individual contracts and the joining of the work of one contract with the others. The schedule shall set forth the approximate dates and sequences for the several items of work to be performed and shall ensure completion within the contract time limit. Concessionaire Representative may allow modifications of the schedule when it determines, in its sole discretion, that there are benefits in doing so.

3.6.4 Any modification of the schedule shall be in writing, mutually agreed to and signed by the Design-Builder following consultation with the Separate Contractor(s), and shall be binding on the Design-Builder and/or Separate Contractor(s) in the same manner as the original 395 Design-Build Contract.

3.6.5 If the Design-Builder and/or Separate Contractor(s) fail to agree on a joint schedule of operations, they shall submit their individual schedules to the Concessionaire, who will prepare a schedule that will be binding on the Design-Builder and Separate Contractor(s).

3.6.6 The joint schedule and any modification thereof shall become a part of each contract involved. The failure of Design-Builder and/or Separate Contractor to abide by the terms of the joint schedule will be justification for declaring, as applicable, the Design-Builder and/or Separate Contractor in default of his contract.

3.6.7 Design-Builder and/or Separate Contractor shall assume all liability, financial or otherwise, in connection with his contract and shall protect and save harmless Concessionaire from any and all damages and claims that may arise because of any inconvenience, delay, or loss he experiences as a result of the presence and operations of other Separate Contractors working in or near the work covered by his contract. He shall also assume all responsibility for any of his work not completed because of the presence or operation of any Separate Contractor.

3.6.8 Except for an extension of the 395 Contract Time(s), the Concessionaire will not be responsible for any inconvenience, delay, or loss experienced by the Design-Builder as a result of his failure to gain access to the work at the time contemplated because of the actions or inactions

of a Separate Contractor. When the failure to gain access is not due to any fault or negligence of the Design-Builder, an extension of the 395 Contract Time(s) will be allowed on the basis of the amount of time delayed.

3.6.9 The Concessionaire will not assume any responsibility to Design-Builder for acts, failures, or omissions of any Separate Contractor that delays its work or otherwise except as provided herein.

3.7 TTMS Contractor

3.7.1 The 395 Project's TTMS scope of work will be performed by the TTMS Contractor under a direct contract with the Concessionaire. Design-Builder acknowledges that the 395 Project's success is dependent upon the ability of Design-Builder and the TTMS Contractor to perform their respective obligations in a cooperative, collaborative and integrated manner. To help accomplish this, Concessionaire, Design-Builder and TTMS Contractor agree to follow the TTMS Interface Plan set forth in Exhibit 3.7.1 in their mutual execution of the 395 Project and will reasonably cooperate with each other to meet the mutual goals of successful and timely completion of their respective work and the 395 Project as a whole.

3.7.2 Although the TTMS scope of work does not form part of the 395 Work, Design-Builder shall be responsible for: (a) scheduling and coordinating all work and services of the TTMS Contractor; (b) directly obtaining all information it requires from the TTMS Contractor to perform the 395 Work; and (c) providing all information the TTMS Contractor requires to perform its work. In performing its scheduling and coordination services, Design-Builder shall consider the reasonable requirements of the TTMS Contractor, recognizing that each party not only has contractual obligations to complete its work timely, but that the ability of the Concessionaire to use the 395 Project for its intended purpose requires the timely completion of both the 395 Work and the TTMS scope of work. Consequently, both the Design-Builder and the TTMS Contractor shall make reasonable accommodations to their schedules to meet the reasonable needs of the other party.

3.7.3 Design-Builder acknowledges that it has made full allowance for complying with its obligations relative to the TTMS Contractor in the 395 Contract Price. If Design-Builder believes that it is being adversely affected in its performance of the 395 Work as a result of actions or inactions of the TTMS Contractor, then Design-Builder shall follow the processes set forth in the TTMS Interface Plan and Articles 8 and/or 10 of these General Conditions.

3.7.4 For the avoidance of doubt, Design-Builder shall not have any liability for the acts or omissions of the TTMS Contractor, nor shall the TTMS Contractor have any liability for the acts or omissions of Design-Builder.

Article 4
Hazardous Environmental Conditions and Differing Site Conditions

4.1 Hazardous Environmental Conditions

4.1.1 General Obligations

.1 Unless specifically stated to the contrary in the Part 2 (395 Project Information and Technical Requirements) of the RFP, Design-Builder will be responsible for the management, treatment, handling, storage, monitoring, remediation, removal, transport and/or disposal of any Hazardous Environmental Conditions that are encountered on, in or under the Site.

.2 Design-Builder shall notify the Concessionaire prior to implementing any Remedial Actions contained in Design-Builder's Environmental Management Plan for Known Pre-Existing Hazardous Materials.

.3 If Design-Builder encounters any Unknown Pre-Existing Hazardous Materials the presence of which constitutes a Hazardous Environmental Condition, then Design-Builder will promptly notify Concessionaire and, in consultation with the Concessionaire, will develop a Remedial Action Plan setting out the scope of the Remedial Actions that Design-Builder proposes to take in relation to the relevant Hazardous Environmental Condition, such actions to include, but not be limited to: (i) conducting such further investigations as may be necessary or appropriate to determine the nature and extent of the Hazardous Materials and submitting copies of such data and reports to Concessionaire for its review and approval, (ii) taking reasonable steps, including in the case of excavation, construction, reconstruction or rehabilitation, modifications and/or construction techniques, to avoid or minimize excavation or dewatering in areas with Hazardous Materials, (iii) preparing and obtaining Governmental Approvals for remedial action plans, including Concessionaire approval, (iv) carrying out the Remedial Action Plan, including, as necessary, disposal of the Hazardous Materials and (v) timely informing Concessionaire of all such actions.

.4 Before any Remedial Actions for Unknown Pre-Existing Hazardous Materials are taken that would inhibit Concessionaire's ability to ascertain the nature and extent of the Hazardous Environmental Condition, Design-Builder will afford Concessionaire the opportunity to inspect areas and locations that require Remedial Actions; *provided*, that in the case of a sudden release of any Unknown Pre-Existing Hazardous Materials, Design-Builder may take all reasonable actions necessary to stabilize and contain the release without prior notice or inspection, but will promptly notify Concessionaire of the sudden release and its location.

.5 Design-Builder will obtain all Governmental Approvals relating to all Remedial Actions. Design-Builder will be solely responsible for compliance with such Governmental Approvals and applicable Legal Requirements concerning or relating to Hazardous Materials. In carrying out Remedial Actions that are compensable by Concessionaire pursuant to Section 4.1.2, Design-Builder will not take any steps or actions which impair Concessionaire's potential claims for indemnity and contribution, statutory or otherwise.

.6 Unless directed otherwise by Concessionaire, Design-Builder will seek to recover costs from any available reimbursement program or from any third party responsible for generating or otherwise creating or contributing to conditions that led to the need for Remedial Action. Without limiting the preceding sentence, Design-Builder will seek pre-approval and pursue reimbursement from the Virginia Petroleum Storage Tank Fund (VPSTF) for qualifying expenses incurred during the course of investigation, containment, management, mitigation or remediation activities on petroleum storage tank releases. The parties will cooperate with and notify each other with respect to activities undertaken pursuant to this Section 4.1.1.6.

.7 Except as provided in Section 4.1.2 below, Design-Builder will bear all costs and expenses of preparing and complying with any Remedial Action Plan, of complying with Legal Requirements and obtaining and complying with Governmental Approvals pertaining to Hazardous Materials, and otherwise of carrying out Remedial Actions.

4.1.2 Pre-Existing Hazardous Materials

.1 Concessionaire will reimburse, to the extent permitted by the Legal Requirements, Design-Builder for Design-Builder's costs for Remedial Actions with respect to any Unknown Pre-Existing Hazardous Materials, the presence of which constitutes a Hazardous Environmental Condition.

.2 Concessionaire will assume, to the extent permitted by the Legal Requirements, responsibility for third-party claims against Design-Builder for personal injury, damages or harm to property or business due to any Pre-Existing Hazardous Materials, the presence of which constitutes a Hazardous Environmental Condition, and all related penalties, fines and administrative or civil sanctions arising out of or related to such Pre-Existing Hazardous Materials; except to the extent Design-Builder is obliged to indemnify Concessionaire pursuant to Section 4.1.3 below.

.3 Design-Builder will provide cost estimates with respect to such Remedial Actions which may be reimbursed by Concessionaire, for Concessionaire's review and approval prior to proceeding with any such Remedial Actions, subject to Section 4.1.1.3 above.

.4 Concessionaire reserves the right to perform Remedial Actions for Unknown Pre-Existing Hazardous Materials in lieu of, and as replacement for, Design-Builder's Remedial Action obligations subject to Section 4.1.1.2 above.

.5 Design-Builder will be entitled to submit a request for a 395 Work Order in accordance with these General Conditions of Contract, to an adjustment in its 395 Contract Price and/or 395 Contract Time(s) to the extent Design-Builder's cost and/or time of performance have been adversely impacted by the presence, removal or remediation of Unknown Pre-Existing Hazardous Materials that constitute a Hazardous Environmental Condition.

4.1.3 Design-Builder's Indemnification Obligations Regarding Hazardous Materials

.1 Design-Builder will indemnify, protect, defend and hold harmless and release each 395 Project Indemnitee from and against any and all claims against the 395 Project Indemnitees by a person not party to the 395 Design-Build Contract, including reasonable attorney's fees, expert witness fees and court costs suffered or incurred by such 395 Project Indemnitee, to the extent caused by:

(A) Hazardous Materials introduced to or brought onto the Site by Design-Builder or its Subcontractors;

(B) failure of Design-Builder or any of its Subcontractors to comply with any requirement of the 395 Contract Documents relating to Hazardous Materials (including any failure to perform any Remedial Action required in accordance with Section 4.1.1 above) or to otherwise comply with applicable Legal Requirements and Governmental Approvals; or

(C) the exacerbation, release, spreading, migration, or toxicity of Hazardous Materials due to the negligence, omission, recklessness, or willful misconduct of Design-Builder or any of its Subcontractors.

.2 Design-Builder shall defend such claims in accordance with Section 7 below.

.3 Design-Builder's obligations under this Section 4.1.3 will not apply to claims to the extent caused by the negligence, recklessness, or willful misconduct of any 395 Project Indemnitee.

4.2 Inspection of Site Conditions

4.2.1 Design-Builder represents and warrants that it has, as of the 395 Design-Build Contract Date, ascertained the nature and location of the 395 Work, the character and accessibility of the Site, the existence of obstacles to construction, the availability of facilities and utilities, the location and character of existing or adjacent work or structures, the surface and subsurface conditions, and other general and local conditions (including labor) which might affect its performance of the 395 Work or the cost thereof.

4.2.2 Design-Builder will, after its receipt of Concessionaire's LNTP, undertake such testing, inspections and investigations as may be necessary to perform its obligations under the 395 Contract Documents, including but not limited to: additional geotechnical evaluations, utility investigations or Hazardous Materials studies. If Design-Builder intends to conduct additional testing, inspections, investigations or geotechnical evaluations to supplement or corroborate the information contained in the RFP Documents, it shall do so during the Scope Validation Period. Any Scope Issues that arise from such evaluations shall be treated in the manner set forth in Section 2.2 above. All reports or analyses generated by Design-Builder's testing, inspections and investigations, including but not limited to additional geotechnical testing, shall be furnished to Concessionaire promptly after such reports or analyses are generated.

4.3 Differing Site Conditions

4.3.1 Concealed or latent physical conditions or subsurface conditions at the Site that: (i) materially differ from the conditions indicated in the RFP Documents (as such conditions may be further described through reports or analyses undertaken during the Scope Validation Period); or (ii) are of an unusual nature, differing materially from the conditions ordinarily encountered and generally recognized as inherent in the 395 Work are collectively referred to herein as “**Differing Site Conditions.**” If Design-Builder encounters a Differing Site Condition, Design-Builder will be entitled to submit a request for a 395 Work Order for an adjustment in the 395 Contract Price and/or 395 Contract Time(s) to the extent Design-Builder’s cost and/or time of performance are adversely impacted by the Differing Site Condition as allowed for herein.

4.3.2 Upon encountering a Differing Site Condition, Design-Builder shall provide prompt written notice to Concessionaire of such condition, which notice shall not be later than fourteen (14) days after such condition has been encountered. Design-Builder shall, to the extent reasonably possible, provide such notice before the Differing Site Condition has been substantially disturbed or altered.

4.3.3 Design-Builder shall not be entitled to any adjustment in the 395 Contract Price and/or 395 Contract Time(s) due to impacts of Differing Site Conditions not identified during the Scope Validation Period.

Article 5 **Insurance and Bonds**

5.1 Design-Builder’s Insurance Requirements

5.1.1 Design-Builder shall procure and maintain the insurance coverages required by Exhibit 5.1.1.

5.2 Bonds and Other Performance Security

5.2.1 Design-Builder shall procure performance and payment bonds executed by a surety acceptable to Concessionaire, each in the amount of one hundred percent (100%) of the 395 Contract Price, and in accordance with all other requirements of the 395 Contract Documents, including the Division I Amendments.

5.2.2 If the Design-Builder is structured as a limited liability company, partnership or joint venture, the bonding approach used will ensure that the members of such organizations will have joint and several liability for the performance of the 395 Work required for the 395 Project. A single 100% performance bond and a single 100% payment bond shall be provided regardless of any co-surety relationship.

Article 6 **Payment**

6.1 Schedule of Payments

6.1.1 Design-Builder shall submit to Concessionaire, for its review and approval, and as part of its submission of the Baseline Schedule, the Earned Value Schedule indicating the Design-Builder's anticipated monthly earnings schedule in accordance with Section 1.4 of the Part 2 (395 Project Information and Technical Requirements). Concessionaire reserves the right to withhold approval for all or part of Design-Builder's Applications for Payment, except for approved Early Works payments, until such time Design-Builder furnishes an approved Baseline Schedule.

6.1.2 The parties agree that progress payments for 395 Work performed prior to Concessionaire's approval of the Baseline Schedule is based on the Early Works Earned Value Schedule agreed by the parties.

6.1.3 Neither the Earned Value Schedule included in the Design-Builder's Baseline Schedule nor payments made under Section 6.1.2 above shall exceed the monthly payment schedule unless Concessionaire specifically approves this in writing.

6.2 Monthly Progress Payments

6.2.1 Prior to the fifteenth (15th) day of each month, Design-Builder shall submit a draft Application for Payment for Concessionaire's concurrence for all 395 Work performed as of the first day of such month and coinciding with the progress reflected in the monthly Baseline Schedule update. The mutually agreed upon Application for Payment details shall then be submitted formally on or before the fifteenth (15th) day of the month. The Application for Payment shall be accompanied by all supporting documentation required by the 395 Contract Documents and/or established at the meeting required by Section 2.1.2 hereof. Payment shall be made in accordance with the following earned value calculation:

.1 Design-Builder shall identify each activity, and the value in dollars of such activity, in accordance with Section 6.1.1 above. Applications for Payment shall be made based on either a mutually agreeable earned value calculation or, if the parties are unable to reach mutual agreement, the following earned values:

.1 Design-Builder shall earn twenty percent (20%) of the value of an activity upon initiation of the respective activity.

.2 Design-Builder shall earn eighty percent (80%) of the value of an activity upon completion of the respective activity.

.2 QA/QC shall be an integral part of each activity. As part of each Application for Payment that includes completed activities, Design-Builder shall submit with the Application for Payment evidence of the QA/QC reviews, including any checklists, summary data, high-level/outline calculations or design checks, and evaluations of the work and the qualifications of the responsible personnel that completed the work, etc., that the relevant QA or QC reviewer relied

on to make its determination the Work is complete and conforms to the requirements of the 395 Contract Documents. Furthermore, the QAM shall: (a) verify that the design included in each activity has been completed in accordance with the 395 Contract Documents; (b) certify that the construction included in each activity has been completed in accordance with the 395 Contract Documents; and (c) certify that all required QA/QC tests, measurements, permits or other requirements have been completed and all non-conformance reports relative to the respective activity have been resolved. The QAM's certification for monthly Application of Payment for construction activities shall include the following statement: *As the Quality Assurance Manager, I certify, to the best of my knowledge, information and belief based upon and to the extent of: (i) current on-site observations and field testing required to be performed; and (ii) material certifications and test reports, that each 395 Work Package shown herein as complete has been completed in accordance with the 395 Contract Documents, and that all required QA/QC tests, measurements, permits or other requirements have been completed and all non-conformance reports relative to a respective 395 Work Package have been resolved except for the attached list of open issues.*

6.2.2 The Application for Payment may request payment for equipment and materials not yet incorporated into the 395 Project, provided that: (i) Concessionaire, in its sole discretion, agrees that it is willing to allow payment for such equipment and materials; (ii) Concessionaire is satisfied that the equipment and materials are suitably stored at either the Site or another acceptable location; (iii) the equipment and materials are protected by suitable insurance; and (iv) upon payment, Concessionaire will receive the equipment and materials free and clear of all liens and encumbrances.

6.2.3 The Application for Payment shall constitute Design-Builder's representation that the 395 Work has been performed consistent with the 395 Contract Documents, has progressed to the point indicated in the Application for Payment, and that title to all 395 Work will pass to Concessionaire free and clear of all claims, liens, encumbrances, and security interests upon the incorporation of the 395 Work into the 395 Project, or upon Design-Builder's receipt of payment, whichever occurs earlier.

6.2.4 If required by the Concessionaire, the Application for Payment shall be made using the Concessionaire's approved electronic procurement and invoicing system (Ariba). The Design-Builder shall (at the Design-Builder's expense): (a) register with Ariba; (b) accept and comply with the standard terms and conditions relating to the Concessionaire's use of the Ariba system; and (c) send invoices related to the 395 Design-Build Contract via the Ariba system. The Ariba system can be accessed via the following web address: <https://service.ariba.com/Supplier.aw>. The Design-Builder shall pay the yearly registration fee throughout the duration of the 395 Project.

6.2.5 In each Application for Payment, Design-Builder shall (a) certify to Concessionaire that the 395 Project, the 395 Project Right of Way and any and all interests and estates therein, and all improvements and materials placed on the 395 Project Site, are, to the extent of the most recent payment received by Design-Builder, free from any and all claims, liens, security interests or encumbrances in the nature of mechanics', labor or materialmen's liens or otherwise, arising out of or in connection with performance by Design-Builder, or any Subcontractor in excess of \$50,000, of the 395 Work, and (b) provide an interim lien waiver, in the form of Exhibit 6.2.5(a) hereto, of Design-Builder's lien claims, to the extent of the most recent payment received by

Design-Builder, and interim lien waivers, in the form of Exhibit 6.2.5(b) hereto, from each Subcontractor with a Subcontract in excess of \$50,000, to the extent of the most recent payment received by Design-Builder, as are necessary to support Design-Builder's certificate. If any claim, lien, security interest or encumbrance is filed or notification of withholding money for labor or material furnished under the 395 Contract Documents is served on Concessionaire, the Department or any 395 Financing Party, Concessionaire may withhold from any payment or other amount payable to Design-Builder under the 395 Contract Documents or otherwise, an amount sufficient to discharge any or all such liens or claims, unless Design-Builder shall furnish a bond in form, substance and amount reasonably satisfactory to Concessionaire, the Department and the 395 Financing Parties to protect Concessionaire, the 395 Project, 395 Project Right of Way, and the 395 Project Site against such liens or claims, and, after thirty (30) days from the time such lien or claim is made, unless Design-Builder shall have furnished a bond as described above, Concessionaire may discharge such lien or claim with the moneys withheld, whereupon for purposes of the 395 Contract Documents such moneys shall be deemed to have been paid to Design-Builder hereunder. In addition, Design-Builder shall deliver to Concessionaire a final release and waiver of liens, in the form of Exhibit 6.2.5(c) hereto, from each Subcontractor with a Subcontract in excess of \$50,000 on the payment date next following the date on which final payment to such Subcontractor is made.

6.3 Withholding of Payments

6.3.1 On or before the date established in the 395 Design-Build Contract, Concessionaire shall pay Design-Builder all amounts properly due. If Concessionaire determines that Design-Builder is not entitled to all or part of an Application for Payment, it will notify Design-Builder in writing at least seven (7) days prior to the date payment is due. The notice shall indicate the specific amounts Concessionaire intends to withhold, the reasons and contractual basis for the withholding, and the specific measures Design-Builder must take to rectify Concessionaire's concerns. Design-Builder and Concessionaire will attempt to resolve Concessionaire's concerns prior to the date payment is due. If the parties cannot resolve such concerns, Design-Builder may pursue its rights under the 395 Contract Documents, including those under Article 10 hereof.

6.3.2 Notwithstanding anything to the contrary in the 395 Contract Documents, Concessionaire shall pay Design-Builder all undisputed amounts in an Application for Payment within the times required by the 395 Design-Build Contract.

6.4 Right to Stop 395 Work and Interest

6.4.1 If Concessionaire wrongfully fails to pay Design-Builder any amount that becomes due, Design-Builder, in addition to all other remedies provided in the 395 Contract Documents, may stop 395 Work pursuant to Section 11.3 hereof. All payments due and unpaid shall bear interest at the rate set forth in the 395 Design-Build Contract.

6.4.2 Should any of the events set forth in Section 6.4.1 above occur, before exercising its rights under this section, Design-Builder shall provide Concessionaire with written notice that Design-Builder will stop work unless said event is cured within ten (10) days from Concessionaire's receipt of Design-Builder's notice. If Concessionaire does not cure the problem within such ten (10) day period, Design-Builder may stop work. In such case, Design-Builder shall be entitled to

make a claim for adjustment to the 395 Contract Price and 395 Contract Time(s) to the extent it has been adversely impacted by such stoppage.

6.5 Design-Builder's Payment Obligations

6.5.1 Design-Builder will pay Design Consultants and Subcontractors, in accordance with its contractual obligations to such parties, all the amounts Design-Builder has received from Concessionaire on account of their work. Design-Builder will impose similar requirements on Design Consultants and Subcontractors to pay those parties with whom they have contracted. Design-Builder will indemnify and defend Concessionaire against any claims for payment and mechanic's liens as set forth in Section 7.2.1 hereof.

6.6 Completion

6.6.1 The Design-Builder shall have charge and care thereof and shall take every precaution against damage to any part of the 395 Work thereof by action of the elements or from any other cause. The Design-Builder shall rebuild, repair, restore, and make good on damage to any portion of the 395 Work occasioned by any of the foregoing causes and shall bear the expense thereof. The Design-Builder's obligations under this Section 6.6.1 for a specific Project Component shall cease once the Final Completion Date has been achieved for such Project Component, provided, however, that in the case of the 395 Express Lanes Work, the Design-Builder's obligations under this Section 6.6.1 shall cease as of the date Concessionaire has provided a signed Service Commencement Certificate to Design-Builder.

6.6.2 (Not Used)

6.6.3 Upon obtaining Final Completion, Design-Builder will provide Concessionaire with a Final Application for Payment. Concessionaire shall make final payment by the time required in the 395 Design-Build Contract. At the time of submission of its Final Application for Payment, Design-Builder shall provide the following information:

.1 a final lien waiver, in the form of Exhibit 6.6.3, of all liens that Design-Builder may have against Concessionaire, the 395 Project and the 395 Project Right of Way, and an affidavit that there are no claims, or obligations or liens outstanding or unsatisfied for labor, services, material, equipment, taxes or other items performed, furnished or incurred for or in connection with the 395 Work which will in any way affect Concessionaire's interests;

.2 a general release executed by Design-Builder waiving, upon receipt of final payment by Design-Builder, all claims, except those claims previously made in writing to Concessionaire and remaining unsettled at the time of final payment, which claims shall be specifically listed in an attachment to the general release;

.3 consent of Design-Builder's surety to final payment;

.4 all operating manuals, warranties and other deliverables required by the 395 Contract Documents, including the project records required by Section 11.1.10 of the 395 Design-Build Contract; and

.5 certificates of insurance confirming that required coverages will remain in effect consistent with the requirements of the 395 Contract Documents.

6.6.4 Upon making final payment, Concessionaire waives all claims against Design-Builder except claims relating to: (i) Design-Builder's failure to satisfy its payment obligations, if such failure affects Concessionaire's interests; (ii) Design-Builder's failure to complete the 395 Work consistent with the 395 Contract Documents, including defects appearing after final payment; and (iii) the terms of any special warranties and indemnifications required by the 395 Contract Documents.

Article 7 **Indemnification**

7.1 Patent and Copyright Infringement

7.1.1 Design-Builder shall defend any action or proceeding brought against any 395 Project Indemnitee based on any claim that the 395 Work, or any part thereof, or the operation or use of the 395 Work or any part thereof, constitutes infringement of any United States patent or copyright, now or hereafter issued. The 395 Project Indemnitee shall give prompt written notice to Design-Builder of any such action or proceeding and will reasonably provide authority, information and assistance in the defense of same. Design-Builder shall indemnify and hold harmless 395 Project Indemnitees from and against all damages and costs, including but not limited to attorneys' fees and expenses awarded against 395 Project Indemnitees or Design-Builder in any such action or proceeding. Design-Builder agrees to keep the 395 Project Indemnitees informed of all developments in the defense of such actions.

7.1.2 If a 395 Project Indemnitee is enjoined from the operation or use of the 395 Work, or any part thereof, as the result of any patent or copyright suit, claim, or proceeding, Design-Builder shall at its sole expense take reasonable steps to procure the right to operate or use the 395 Work. If Design-Builder cannot so procure such right within a reasonable time, Design-Builder shall promptly, at Design-Builder's option and at Design-Builder's expense: (i) modify the 395 Work so as to avoid infringement of any such patent or copyright; or (ii) replace said 395 Work with 395 Work that does not infringe or violate any such patent or copyright.

7.1.3 Sections 7.1.1 and 7.1.2 above shall not be applicable to any suit, claim or proceeding based on infringement or violation of a patent or copyright: (i) relating solely to a particular process or product of a particular manufacturer specified by Concessionaire and not offered or recommended by Design-Builder to Concessionaire; or (ii) arising from modifications to the 395 Work by Concessionaire after acceptance of the 395 Work.

7.2 Payment Claim Indemnification

7.2.1 Providing that Concessionaire is not in breach of its contractual obligation to make payments to Design-Builder for the 395 Work, Design-Builder shall indemnify, defend and hold harmless 395 Project Indemnitees from any claims or mechanic's liens brought against any 395

Project Indemnitees or against the 395 Project as a result of the failure of Design-Builder, Design Consultants, Subcontractors, anyone employed directly or indirectly by any of them or anyone for whose acts any of them may be liable, to pay for any services, materials, labor, equipment, taxes or other items or obligations furnished or incurred for or in connection with the 395 Work. Within three (3) days of receiving written notice from a 395 Project Indemnitees that such a claim or mechanic's lien has been made and/or filed, Design-Builder shall commence to take the steps necessary to resolve and/or discharge said claim or lien, including, if necessary, the furnishing of a mechanic's lien bond. If Design-Builder fails to do so, the 395 Project Indemnitees will have the right to resolve and/or discharge the claim or lien and hold Design-Builder liable for costs and expenses incurred, including attorneys' fees.

7.3 Design-Builder's General Indemnification

7.3.1 Design-Builder, to the fullest extent permitted by law, shall indemnify, hold harmless and defend 395 Project Indemnitees from and against claims, losses, damages, liabilities, including attorneys' fees and expenses, for: (i) for any liabilities or damages to the extent resulting from the acts or omissions of Design-Builder, Design Consultants, Subcontractors, anyone employed directly or indirectly by any of them or anyone for whose acts any of them may be liable; and (ii) any violation of Sections 2.5, 2.6, or 2.8 hereof by Design-Builder, Design Consultants, Subcontractors, anyone employed directly or indirectly by any of them or anyone for whose acts any of them may be liable, (iii) any actual or alleged inverse condemnation, trespass, nuisance or similar taking of or harm to real property committed or caused by a Design-Builder Party in connection with the 395 Project arising from any actual or alleged (A) failure by Design-Builder to comply with, observe or perform any of the covenants, obligations, agreements, terms or conditions in this Agreement; (B) breach by Design-Builder of its representations or warranties set forth in this Agreement or (C) misconduct, negligence or other culpable act, error or omission of a Design-Builder Party; provided, however, that the Design-Builder will not be required to indemnify, defend or hold harmless a 395 Project Indemnitee from and against any Losses actually suffered or incurred by such 395 Project Indemnitee due to third party claims that are based upon any actual inverse condemnation arising from the establishment of the 395 Project Right of Way as defined in the 395 Contract Documents and any real estate right outside the 395 Project Right of Way acquired pursuant to this Agreement.

7.3.2 If an employee of Design-Builder, Design Consultants, Subcontractors, anyone employed directly or indirectly by any of them or anyone for whose acts any of them may be liable, has a claim against a 395 Project Indemnitee, Design-Builder's indemnity obligation set forth in Section 7.3.1 above shall not be limited by any limitation on the amount of damages, compensation or benefits payable by or for Design-Builder, Design Consultants, Subcontractors, or other entity under any employee benefit acts, including 395 Workers' compensation or disability acts.

7.4 Defense and Indemnification Procedures

7.4.1 If Concessionaire receives notice of or otherwise has actual knowledge of a claim which it believes is within the scope of Design-Builder's indemnification under the 395 Contract Documents, it shall by writing as soon as practicable: (i) inform Design-Builder of such claim; (ii) send to Design-Builder a copy of all written materials Concessionaire has received asserting such claim and (iii) notify Design-Builder that either: (i) the defense of such claim is being tendered to Design-Builder; or (ii) Concessionaire has elected to conduct its own defense for a reason set forth below.

7.4.2 If the insurer under any applicable insurance policy accepts tender of defense, Design-Builder and Concessionaire shall cooperate in the defense as required by the insurance policy. If no defense is provided by insurers under potentially applicable insurance policies, then the following provisions shall apply.

7.4.3 If the defense is tendered to Design-Builder, it shall within forty-five (45) days of said tender deliver to Concessionaire a written notice stating that Design-Builder: (i) accepts the tender of defense and confirms that the claim is subject to full indemnification hereunder without any "reservation of rights" to deny or disclaim full indemnification thereafter; (ii) accepts the tender of defense but with a "reservation of rights" in whole or in part; or (iii) rejects the tender of defense if it reasonably determines it is not required to indemnify against the claim under the 395 Contract Documents. If such notice is not delivered within such forty-five (45) days, the tender of defense shall be deemed rejected.

7.4.4 If Design-Builder accepts the tender of defense, Design-Builder shall have the right to select legal counsel for the 395 Project Indemnitees, subject to reasonable approval of the Concessionaire, and Design-Builder shall otherwise control the defense of such claim, including settlement, and bear the fees and costs of defending and settling such claim. During such defense: (i) Design-Builder shall at Design-Builder's expense, fully and regularly inform Concessionaire of the progress of the defense and of any settlement discussions; and (ii) Concessionaire shall, at Design-Builder's expense for all of Concessionaire's reasonable out-of-pocket third party expenses, fully cooperate in said defense, provide to Design-Builder all materials and access to personnel it requests as necessary for defense, preparation and trial and which or who are under the control of or reasonably available to Concessionaire and maintain the confidentiality of all communications between it and Design-Builder concerning such defense to the extent allowed by law.

7.4.5 Concessionaire shall be entitled to select its own legal counsel and otherwise control the defense of such claim if: (i) the defense is tendered to Design-Builder and it refuses the tender of defense, or fails to accept such tender within forty-five (45) days, or reserves any right to deny or disclaim such full indemnification thereafter; or (ii) Concessionaire, at the time it gives notice of the claim or at any time thereafter, reasonably determines that: (a) a conflict exists between it and the Design-Builder which prevents or potentially prevents Design-Builder from presenting a full and effective defense; or (b) Design-Builder is otherwise not providing an effective defense in connection with the claim and Design-Builder lacks the financial capability to satisfy potential liability or to provide an effective defense. Concessionaire may assume its own defense pursuant

to the above by delivering to Design-Builder written notice of such election and the reasons therefore.

7.4.6 If Concessionaire is entitled and elects to conduct its own defense pursuant hereto, all reasonable costs and expenses it incurs in investigating and defending and claim for which it is entitled to indemnification hereunder (and any settlements or judgments resulting therefrom) shall be reimbursed by Design-Builder after completion of the proceeding.

7.4.7 If Concessionaire is entitled to and elects to conduct its own defense, then it shall have the right to settle or compromise the claim with the Design-Builder's prior written consent, which shall not be unreasonably withheld or delayed, or with approval of the court, and with the full benefit of the Design-Builder's indemnity. Notwithstanding the foregoing, if the Concessionaire elects to conduct its own defense and it is later determined that no indemnification obligation existed as to the particular claim, the Concessionaire shall pay its own costs and expenses relating thereto. In addition, if the Concessionaire elects to conduct its own defense because it perceives a conflict of interest, the Concessionaire shall pay its own costs and expenses relating thereto.

Article 8 **Time**

8.1 Obligation to Achieve the 395 Contract Times

8.1.1 Design-Builder agrees that it will commence performance of the 395 Work and achieve the 395 Contract Time(s) in accordance with Article 5 of Part 3 (395 Design-Build Contract).

8.2 Delays to the 395 Work

8.2.1 If Design-Builder is delayed in the performance of the 395 Work due to acts, omissions, conditions, events, or circumstances beyond its control and due to no fault of its own, Subcontractors, Design Consultants, or those for whom Design-Builder, Subcontractors, or Design Consultants are responsible, Design-Builder may submit a request for a 395 Work Order that the 395 Contract Time(s) for performance be reasonably extended by 395 Work Order. By way of example, events that Concessionaire may consider for an extension of the 395 Contract Time(s) include acts or omissions of Concessionaire or anyone under Concessionaire's control (including separate contractors), changes in the 395 Work, Differing Site Conditions, Hazardous Materials, wars, floods in excess of the base flood (as defined in the Division 1 Amendment), hurricane force winds, tornados, labor disputes, and earthquakes that cause ground accelerations in excess of AASHTO bridge design standards for the Site. It is specifically understood that other than floods in excess of the base flood, hurricane force winds and tornados, Design-Builder assumes the risk, and will not be entitled a time extension for any delays caused by weather or conditions resulting from weather.

8.2.2 In addition to Design-Builder's right to a time extension for those events set forth in Section 8.2.1 above, Design-Builder shall also be entitled to submit a request of a 395 Work Order for an appropriate adjustment of the 395 Contract Price provided, however, that the 395 Contract Price shall not be adjusted for those events set forth in Section 8.2.1 above that are beyond the control

of both Design-Builder and Concessionaire, including the events of wars, floods in excess of the base flood (as defined in the Division 1 Amendment), hurricane force wind, tornados, labor disputes, and earthquakes that cause ground accelerations in excess of AASHTO bridge design standards for the Site.

8.2.3 As a condition precedent to Design-Builder receiving an extension of the 395 Contract Time(s), Design-Builder shall demonstrate that: (i) notice has been given by Design-Builder as provided in these General Conditions; (ii) the delay impacts the critical path (as reflected on the most recent approved monthly Baseline Schedule update) and is outside the reasonable control of Design-Builder; (iii) Design-Builder's performance would not have been concurrently delayed or interrupted by any event other than those identified in Section 8.2.1 above; (iv) Design-Builder, in view of all the circumstances, has exercised reasonable efforts to avoid the delay and did not cause the delay; and (v) Design-Builder has complied with the requirements of Section 8.3 below. Delays of Subcontractors shall be deemed to be within the reasonable control of Design-Builder, unless such delays are themselves excusable in accordance with the provisions of Section 8.2.1.

8.2.4 Should Concessionaire have a reasonable belief that the 395 Contract Time(s) will not be met for causes that do not constitute an excusable delay under Section 8.2.1 above, Concessionaire has the right, but not the obligation, to so notify Design-Builder, and Design-Builder shall then work additional overtime, engage additional personnel and take such other measures as necessary to complete the 395 Work within the 395 Contract Time(s). Design-Builder shall bear all costs related to such overtime, additional personnel and other measures.

8.2.5 Notwithstanding the right of Design-Builder to receive a time extension pursuant to Section 8.2.1, Design-Builder agrees that if it encounters an excusable delay, it will, if directed by Concessionaire, develop and implement a recovery schedule and plan to improve progress and take such measures to overcome such delay.

8.3 Schedule Impact Analysis for Proposed Time Extensions

8.3.1 If Design-Builder claims that any event, including but not limited to a change in the 395 Work, justifies an extension to the 395 Contract Time(s), Design-Builder shall submit to Concessionaire a written Schedule Impact Analysis (SIA) in accordance with Section 1.4 of the Part 2 (395 Project Information and Technical Requirements). Upon approval by Concessionaire, the event shall be included in the next Baseline Schedule update.

8.3.2 Activity delays shall not automatically mean that an extension of the 395 Contract Time(s) is warranted or due Design-Builder. Design-Builder recognizes that certain events will not affect existing critical activities or cause non-critical activities to become critical, and that such events may result in only absorbing a part of the available total float that may exist within an activity chain of the net 395 Work, thereby not causing any effect on the 395 Contract Time.

8.3.3 Float is not for the exclusive use or benefit of either Concessionaire or Design-Builder, but rather shall be used for the benefit of the overall 395 Project. Activity splitting or float suppression techniques will not be permitted. Extension of the 395 Contract Time(s) will be granted only to the extent the equitable time adjustments to the activity or activities affected by the event exceeds the total float of a critical activity or path and extends the 395 Contract Time(s).

8.3.4 Two (2) copies of each SIA shall be submitted in accordance with the following along with a written proposal for any requested time extension:

- .1** Within seven (7) days after receipt of a written change order.
- .2** Within ten (10) days from the beginning of any other event claimed to give rise to a delay.
- .3** Within the time period required for the filing of a written notice of claim pursuant to Article 10 Contract Adjustments and Disputes.

8.3.5 In cases where Design-Builder does not submit a SIA within the time requirements stated above, it shall be considered a waiver of any request for an extension of the 395 Contract Time(s).

8.3.6 Approval or rejection of each SIA by Concessionaire shall be made within ten (10) days after receipt of each SIA, unless subsequent meetings and negotiations are necessary. Upon approval, a copy of the SIA signed by Concessionaire shall be returned to Design-Builder, and incorporated into the next Baseline Schedule update.

8.3.7 The SIA related to a change order shall be incorporated into and attached to the applicable change order.

Article 9

Changes to the 395 Contract Price and Time

9.1 395 Work Orders

9.1.1 A **395 Work Order** (change order), is a written instrument, issued after the 395 Design-Build Contract Date signed by Concessionaire and Design-Builder, stating their agreement upon all of the following:

- .1** The scope of the change in the 395 Work;
- .2** The amount of the adjustment to the 395 Contract Price; and
- .3** The extent of the adjustment to the 395 Contract Time(s).

9.1.2 All changes in the 395 Work authorized by applicable 395 Work Order shall be performed under the applicable conditions of the 395 Contract Documents. Concessionaire and Design-Builder shall negotiate in good faith and as expeditiously as possible the appropriate adjustments for such changes.

9.1.3 If Concessionaire requests a proposal for a change in the 395 Work from Design-Builder and subsequently elects not to proceed with the change, a 395 Work Order shall be issued to

reimburse Design-Builder for reasonable costs incurred for estimating services, design services and services involved in the preparation of proposed revisions to the 395 Contract Documents.

9.2 Contract Change Directive

9.2.1 A **Contract Change Directive** (CCD) is a written order prepared and signed by Concessionaire, directing a change in the 395 Work prior to agreement on an adjustment in the 395 Contract Price and/or the 395 Contract Time(s).

9.2.2 Concessionaire and Design-Builder shall negotiate in good faith and as expeditiously as possible the appropriate adjustments for the Contract Change Directive. Upon reaching an agreement, the parties shall prepare and execute an appropriate 395 Work Order reflecting the terms of the agreement.

9.2.3 The Concessionaire may issue a CCD by unilateral 395 Work Order, subject further to the terms of Section 9.4.1.3.

9.3 Minor Changes in the 395 Work

9.3.1 Minor changes in the 395 Work do not involve an adjustment in the 395 Contract Price and/or 395 Contract Time(s) and do not materially and adversely affect the 395 Work, including the design, quality, performance and workmanship required by the 395 Contract Documents. Design-Builder may make minor changes in the 395 Work consistent with the intent of the 395 Contract Documents, provided, however that Design-Builder shall promptly inform Concessionaire, in writing, of any such changes and record such changes on the documents maintained by Design-Builder.

9.4 395 Contract Price Adjustments

9.4.1 The increase or decrease in 395 Contract Price resulting from a change in the 395 Work shall be determined by one or more of the following methods:

.1 Unit prices set forth in the 395 Design-Build Contract or as subsequently agreed to between the parties;

.2 A mutually accepted, lump sum, properly itemized and supported by sufficient substantiating data to permit evaluation by Concessionaire;

.3 Costs, fees and any other markups set forth in accordance with Section 109.05 of the Division 1 Amendments; and

.4 If an increase or decrease cannot be agreed to as set forth in items .1 through .3 above and Concessionaire issues a Contract Change Directive, the cost of the change of the 395 Work shall be determined by the reasonable expense and savings in the performance of the 395 Work resulting from the change, including a reasonable overhead and profit, as may be set forth in the 395 Design-Build Contract. If the net result of both additions and deletions to the 395 Work is an increase in the 395 Contract Price, overhead and profit shall be calculated on the basis of the

net increase to the 395 Contract Price. If the net result of both additions and deletions to the 395 Work is a decrease in the 395 Contract Price, there shall be no overhead or profit adjustment to the 395 Contract Price. Design-Builder shall maintain a documented, itemized accounting evidencing the expenses and savings associated with such changes.

9.4.2 If unit prices are set forth in the 395 Contract Documents or are subsequently agreed to by the parties, but application of such unit prices will cause substantial inequity to Concessionaire or Design-Builder because of differences in the character or quantity of such unit items as originally contemplated, such unit prices shall be equitably adjusted. Design-Builder shall bear the burden of proving that there is a substantial inequity in the unit rates.

9.5 Emergencies

9.5.1 In any emergency affecting the safety of persons and/or property, Design-Builder shall act, at its discretion, to prevent threatened damage, injury or loss. Any change in the 395 Contract Price and/or 395 Contract Time(s) on account of emergency work shall be determined as provided in this Article 9.

Article 10 **Contract Adjustments and Disputes**

10.1 Requests for Contract Adjustments and Relief

10.1.1 If Design-Builder believes that it is entitled to an adjustment to the 395 Contract Price or 395 Contract Times or other relief for any occurrence arising out of or related to the 395 Work or 395 Project, including the acts or omissions of Concessionaire, it shall submit a written request to Concessionaire stating the basis for such 395 Contract Price or 395 Contract Time adjustment or relief. Such request shall be submitted: (a) prior to Design-Builder incurring any cost or expense, or performing any work on which the request is based; and (b) in accordance with any specific requirements contained in applicable sections of these General Conditions of Contract or, absent any specific requirement, then within a reasonable time, not to exceed twenty-one (21) days, after the time of the occurrence giving rise to the request for 395 Contract Price or 395 Contract Time adjustment or relief or after Design-Builder reasonably should have recognized the occurrence giving rise to the request for 395 Contract Price or 395 Contract Time adjustment or relief, whichever is later. Such request shall include sufficient information to advise Concessionaire of the facts and circumstances giving rise to the request for 395 Contract Price or 395 Contract Time adjustment or relief, the specific contractual adjustment or relief requested and the basis for Design-Builder's entitlement to the adjustment or relief.

10.2 Dispute Resolution

10.2.1 Good Faith Efforts to Resolve Disputes. The parties shall make good faith efforts to resolve any claim, dispute or controversy arising out of or relating to this Agreement, including but not limited to those arising out of or related to the breach, termination or invalidity of this Agreement, and those arising in tort or contract (collectively "**Disputes**").

10.2.2 Negotiations between Representatives. Design-Builder and Concessionaire will attempt to resolve all Disputes through best efforts and good faith negotiations between Design-Builder's Representative and Concessionaire's Representative ("**Project Representatives**"). Prior to any meetings between the 395 Project Representatives, the parties will exchange relevant information that will assist the 395 Project Representatives in resolving the Dispute. All negotiations and discussions pursuant to this Section 10.2.2 shall be deemed compromise and settlement negotiations, subject to all evidentiary rules under applicable law.

10.3 Arbitration

10.3.1 Except as set forth in Section 10.5 below, all Disputes that have not been resolved through the process set forth in Section 10.2 shall be resolved by arbitration conducted in accordance with the then-prevailing American Arbitration Association's Construction Industry Rules ("**AAA Rules**") for arbitration and the procedures set forth in this Section 10.3. To the extent there is a conflict between the AAA Rules and this Section 10.3, this Section 10.3 shall govern.

10.3.2 The arbitration shall be held in the Commonwealth of Virginia or such other location if the parties mutually agree. If the aggregate amount of a Party's claims or counterclaims, exclusive of interest, costs and attorney's fees, does not exceed Five Hundred Thousand Dollars (\$500,000), the arbitration shall be conducted before a single arbitrator in accordance with the applicable procedures of the AAA Rules. Otherwise, the arbitration shall be conducted in accordance with the Large Case Construction Rules of the AAA, before a panel of three (3) arbitrators, with each Party selecting one arbitrator and the third arbitrator, who shall be the Chair of the panel, being selected by the two Party-appointed arbitrators. The AAA shall be empowered to appoint any arbitrator not named in accordance with the procedure herein or to appoint a Chair pursuant to the AAA Rules should the Party-appointed arbitrators not be able to agree upon a Chair within a reasonable time. The award of the arbitrators will be final and binding on both parties and may be enforced in any court having jurisdiction over the party against which enforcement is sought.

10.3.3 If aggregate amount of a Party's claims or counterclaims exceeds \$2,000,000, exclusive of interest, costs and attorney's fees), or if the claim or counterclaim seeks any equitable remedy, including injunctive relief or specific performance, then such claims shall not be subject to arbitration, but rather shall be subject to judicial resolution in accordance with Section 10.5 below.

10.4 Consequential Damages

10.4.1 Notwithstanding anything herein to the contrary (except as set forth in Section 10.4.2 below), neither Design-Builder nor Concessionaire shall be liable to the other for any consequential losses or damages, whether arising in contract, warranty, tort (including negligence), strict liability or otherwise, including but not limited to losses of use, profits, business, reputation or financing.

10.4.2 The consequential damages limitation set forth in Section 10.4.1 above will not affect the payment of liquidated damages set forth in Article 5 of Part 3 (395 Design-Build Contract), which both parties recognize has been established, in part, to reimburse Concessionaire for some damages that might otherwise be deemed to be consequential.

10.5 Judicial Resolution

10.5.1 Each Party hereby agrees that any action referred to judicial process in accordance with the provisions of Section 10.3.3 shall be instituted in a court of competent jurisdiction in the Commonwealth of Virginia, which shall be the sole and exclusive jurisdiction and venue for any legal action between the parties arising out of or relating to this Contract.

10.5.2 Each of the parties hereby irrevocably consents to such jurisdiction and irrevocably waives any objections, including, without limitation, any objection to the laying of venue or based on the grounds of forum non conveniens, which it may now or hereafter have to the bringing of any such action or proceeding in such jurisdiction. The foregoing is without prejudice to the right of any prevailing party to seek enforcement of any judgment rendered in a court in any jurisdiction where the losing party or its property may be located. Each of the parties also consents to the exclusive jurisdiction of such Virginia courts for purposes of aid in support of arbitration and the enforcement of any arbitral award made under the provisions of Section 10.3.2.

10.5.3 THE PARTIES HEREBY KNOWINGLY, VOLUNTARILY, AND INTENTIONALLY WAIVE ANY RIGHTS THEY MAY HAVE TO A TRIAL BY JURY IN ANY LITIGATION ARISING OUT OF OR RELATED TO THIS AGREEMENT.

10.6 Voluntary Mediation. If the Dispute has not been resolved by the 395 Project Representatives within a reasonable time, then either Design-Builder or Concessionaire may suggest to the other that the Dispute be referred to mediation. If the other Party is interested in pursuing mediation, then it shall consult with the other to determine the processes and conditions associated with the mediation, including but not limited to the exchange of reasonable information and documents relating to the Dispute and the names of potential mediators. It is expected that the costs of the mediator will be shared equally by both parties. For the avoidance of doubt, mediation is voluntary and will not be a condition precedent to arbitration or the institution of judicial proceedings.

10.7 Attorneys' Fees and Costs. Each party shall bear its own expenses of any arbitration or judicial process, including but not limited to attorney's fees, provided, however, that if the arbitrator(s) or court determines that the claim or defense of a Party was frivolous (i.e. without justifiable merit), then it shall have the right to award such attorney's fees and other costs as it may deem appropriate.

10.7 Survival. The provisions of this Article 10 shall survive the termination of this 395 Design-Build Contract. All provisions of the 395 Contract Documents which are expressly or by implication to come into or continue in force and effect after the expiration or termination of this Agreement shall remain in effect and be enforceable following such expiration or termination.

10.8 Common Issue in Dispute under the Comprehensive Agreement. Notwithstanding any other provision in the 395 Contract Documents to the contrary, if any issue that materializes into a Dispute is also the subject of a concurrent dispute under the Comprehensive Agreement, the parties shall cause the Dispute arising hereunder to be consolidated with the dispute resolution process occurring pursuant to the Comprehensive Agreement, the terms of which are set forth in Exhibit 10.8. If Design-Builder elects not to consolidate the applicable Dispute as set forth the in

preceding sentence, or for any other reason the applicable Dispute is not consolidated with the concurrent dispute under the Comprehensive Agreement, then any ongoing proceeding regarding such Dispute shall be stayed pending final resolution of the dispute under the Comprehensive Agreement, which resolution, to the extent it resolves the issues related to the Dispute hereunder, shall be binding on the parties for all purposes of the 395 Contract Documents. Whether or not a Dispute arising hereunder has been consolidated with a concurrent dispute under the Comprehensive Agreement, until the expiration of the Warranty Period, Design-Builder shall be permitted to attend meetings of the “**Steering Committee**” established under Section 21.01 of the Comprehensive Agreement with respect to any dispute under the Comprehensive Agreement. In addition, for so long as any Dispute related to the 395 Work exists, Design-Builder shall be permitted to attend meetings of the Steering Committee. .

Article 11 **Stop 395 Work and Termination for Cause**

11.1 Concessionaire’s Right to Stop 395 Work

11.1.1 Concessionaire may, without cause and for its convenience, order Design-Builder in writing to stop and suspend the 395 Work. Such suspension shall not exceed one hundred and eighty (180) consecutive days or aggregate more than one hundred and eighty (180) days during the duration of the 395 Project.

11.1.2 Design-Builder is entitled to seek an adjustment of the 395 Contract Price and/or 395 Contract Time(s) if its cost or time to perform the 395 Work has been adversely impacted by any suspension or stoppage of work by Concessionaire, by requesting a 395 Work Order.

11.1.3 In case of suspension of work, Concessionaire shall issue instructions and directions to Design-Builder as to the implementation of the suspension, which may include directing Design-Builder to develop a maintenance and transition plan. Unless specifically directed otherwise by Concessionaire, Design-Builder shall, during the suspension period, continue to have full responsibility for the 395 Project, including but not limited to its obligations to take such precautions as may be necessary to prevent damage to the 395 Work, comply with Governmental Approvals, and ensure public safety. Such obligations include, but are not limited to, erosion control and drainage and erection of any necessary temporary structures, signs, or other facilities.

11.2 Concessionaire’s Right to Perform and Terminate for Cause

11.2.1 If Design-Builder fails to do any of the following:

- .1** begin the 395 Work upon receipt of Concessionaire’s LNTP or NTP;
- .2** provide a sufficient number of skilled workers, equipment, or supply the materials required by the 395 Contract Documents;
- .3** comply with applicable Legal Requirements;

- .4 timely pay, without cause, Design Consultants or Subcontractors;
- .5 prosecute the 395 Work with promptness and diligence to ensure that the 395 Work is completed by the 395 Contract Time(s), as such times may be adjusted; or
- .6 perform material obligations under the 395 Contract Documents;
- .7 failure to complete the 395 Work by the 395 Long Stop Date; or
- .8 failure to make timely payments of any amount due to the Concessionaire under the 395 Design-Build Contract.

then Design-Builder may be declared in default and Concessionaire, in addition to any other rights and remedies provided in the 395 Contract Documents or by law, shall have the rights set forth in Section 11.2.2 below.

11.2.2 If any of the conditions set forth in Section 11.2.1 above exists, Concessionaire will give written notice to Design-Builder and its surety of the condition. If, subject to the terms of the 395 Direct Agreement, within ten (10) days after such notice, Design-Builder or its surety fails to cure, or reasonably commence to cure, such condition to the satisfaction of Concessionaire, then Concessionaire may then, or at any time thereafter, send a second written notice to Design-Builder declaring Design-Builder in default. To the extent that an event set forth in Section 11.2.1 is reasonably capable of cure, the period for any such cure shall not extend beyond the reasonable period required to implement such cure, which shall in no event longer be than 90 days from the date of the original Concessionaire's notice. Upon declaring Design-Builder in default, Concessionaire shall have the right, among other things, to terminate this 395 Design-Build Contract for default.

11.2.3 Upon terminating this 395 Design-Build Contract for default, Concessionaire will have the right to, in addition to any other right available at law, take possession, for the purpose of completing the 395 Work, of all materials, equipment, scaffolds, tools, appliances and other items thereon, which have been purchased or provided for the performance of the 395 Work, all of which Design-Builder hereby transfers, assigns and sets over to Concessionaire for such purpose, and to employ any person or persons to complete the 395 Work and provide all of the required labor, services, materials, equipment and other items. Design-Builder specifically agrees that it will assign all subcontracts and any other agreements with Design Consultants to Concessionaire, upon Concessionaire's written demand that it do so. In the event of such termination, Design-Builder shall not be entitled to receive any further payments under the 395 Contract Documents until Final Completion. At such time, if the unpaid balance of the 395 Contract Price exceeds the cost and expense incurred by Concessionaire in completing the 395 Work, such excess shall be paid by Concessionaire to Design-Builder, subject to the terms of the 395 Direct Agreement. If Concessionaire's cost and expense of completing the 395 Work exceeds the unpaid balance of the 395 Contract Price, then Design-Builder shall be obligated to pay the difference to Concessionaire. Such costs and expense shall include not only the cost of completing the 395 Work, but also losses, damages, costs and expense, including attorneys' fees and expenses, incurred by Concessionaire

in connection with the re-procurement and defense of claims arising from Design-Builder's default.

11.2.4 If Concessionaire improperly terminates the 395 Design-Build Contract for cause, the termination for cause will be converted to a termination for convenience in accordance with the provisions of Article 8 of the 395 Design-Build Contract.

11.2.5 Concessionaire shall have the right, upon the occurrence of any of the conditions set forth in Section 11.2.1 above, and regardless of whether or not Design-Builder is declared in default and/or terminated, to communicate with Design-Builder's surety and compel such surety to cure such conditions.

11.3 Design-Builder's Right to Stop 395 Work

11.3.1 Design-Builder may, in addition to any other rights afforded under the 395 Contract Documents or at law, stop work for Concessionaire's failure to pay amounts properly due under Design-Builder's Application for Payment.

11.3.2 Should any of the events set forth in Section 11.3.1 above occur, before exercising its rights under this section, Design-Builder shall provide Concessionaire with written notice that Design-Builder will stop work unless said event is cured within fifteen (15) days from Concessionaire's receipt of Design-Builder's notice. If Concessionaire does not cure the problem within such fifteen (15) day period, Design-Builder may stop work. In such case, Design-Builder shall be entitled to make a claim for adjustment to the 395 Contract Price and 395 Contract Time(s) to the extent it has been adversely impacted by such stoppage.

11.4 Design-Builder's Right to Terminate for Cause

11.4.1 Design-Builder, in addition to any other rights and remedies provided in the 395 Contract Documents or by law, may terminate the 395 Design-Build Contract for cause for the following reasons:

.1 The 395 Work has been stopped for one hundred eighty (180) consecutive days, or more than one hundred eighty (180) days during the duration of the 395 Project, because of court order, any Governmental Unit having jurisdiction over the 395 Work, or orders by Concessionaire under Section 11.1.1 hereof, provided that such stoppages are not due to the acts or omissions of Design-Builder or anyone for whose acts Design-Builder may be responsible.

.2 Concessionaire's failure to provide Design-Builder with any information, permits or approvals that are Concessionaire's or Department's responsibility under the 395 Contract Documents which result in the 395 Work being stopped for one hundred eighty (180) consecutive days, or more than one hundred eighty (180) days during the duration of the 395 Project, even though Concessionaire has not ordered Design-Builder in writing to stop and suspend the 395 Work pursuant to Section 11.1.1 hereof.

.3 Concessionaire's failure to cure the problems set forth in Section 11.3.1 above after Design-Builder has stopped the 395 Work.

11.4.2 Upon the occurrence of an event set forth in Section 11.4.1 above, Design-Builder may provide written notice to Concessionaire that it intends to terminate the 395 Design-Build Contract unless the problem cited is cured, or commenced to be cured, within ten (10) days of Concessionaire's receipt of such notice. If Concessionaire fails to cure, or reasonably commence to cure, such problem, then Design-Builder may give a second written notice to Concessionaire of its intent to terminate within an additional ten (10) day period. If Concessionaire, within such second ten (10) day period, fails to cure, or reasonably commence to cure, such problem, then Design-Builder may declare, subject to the terms of the 395 Direct Agreement, the 395 Design-Build Contract terminated for default by providing written notice to Concessionaire of such declaration. In such case, Design-Builder shall be entitled to recover in the same manner as if Concessionaire had terminated the 395 Design-Build Contract for its convenience under Article 8 of the 395 Design-Build Contract.

11.5 Bankruptcy of Design-Builder

11.5.1 If Design-Builder institutes or has instituted against it a case under the United States Bankruptcy Code, such event may impair or frustrate Concessionaire's ability to perform its obligations under the 395 Contract Documents. Accordingly, should such event occur:

.1 Design-Builder, its trustee or other successor, shall furnish, upon request of Concessionaire, adequate assurance of the ability of Design-Builder to perform all future material obligations under the 395 Contract Documents, which assurances shall be provided within ten (10) days after receiving notice of the request; and

.2 Concessionaire shall have the right to terminate the 395 Design-Build Contract if the applicable case under the United States Bankruptcy Court has not been dismissed within thirty (30) days of its filing.

11.5.2 The rights and remedies under Section 11.5.1 above shall not be deemed to limit the ability of Concessionaire to seek any other rights and remedies provided by the 395 Contract Documents or by law, including its ability to seek relief from any automatic stays under the United States Bankruptcy Code. It shall also not limit the ability of Concessionaire to seek recourse against Design-Builder's surety, who shall be obligated to perform notwithstanding the bankruptcy proceedings against Design-Builder.

Article 12 Miscellaneous

12.1 Assignment

12.1.1 Neither party shall have the right, power or authority to assign or delegate the 395 Design-Build Contract or any portion thereof, either voluntarily or involuntarily, or by operation of law, without prior written consent, which may be granted or withheld in the sole discretion of such other party; provided that Concessionaire may assign all of its rights and interests in and under this Agreement to the 395 Financing Parties as collateral security for its obligations. Upon request by

Concessionaire, on or before the 395 Financial Close Date, Design-Builder shall enter into a direct agreement substantially in the form of Exhibit 12.1.1 with Concessionaire and the Financing Parties or their agent (the “**395 Direct Agreement**”), which will provide for Contractor’s consent to Concessionaire’s assignment of all its right, title, and interest in, to and under the 395 Design-Build Contract to the 395 Financing Parties as collateral security for Concessionaire’s obligations under agreements with the 395 Financing Parties; the 395 Financing Parties may further assign such rights without Design-Builder’s consent thereto in connection with the exercise of remedies against Concessionaire. Concessionaire also may assign to a State Party or a non-profit special purpose entity established by the Commonwealth to deliver the 395 Project any or all of its rights under this 395 Design-Build Contract and the other 395 Contract Documents without Design-Builder’s consent. Nothing in this Section 12.1.1 shall be deemed to preclude Design-Builder from subcontracting portions of the 395 Work in accordance with the terms of the 395 Design-Build Contract and these General Conditions.

12.2 Successorship

12.2.1 Design-Builder and Concessionaire intend that the provisions of the 395 Contract Documents are binding upon the parties, their employees, agents, heirs, successors and assigns.

12.3 Governing Law

12.3.1 The 395 Design-Build Contract and all 395 Contract Documents shall be governed by and construed in accordance with the laws of the Commonwealth of Virginia.

12.4 Severability

12.4.1 If any provision or any part of a provision of the 395 Contract Documents shall be finally determined to be superseded, invalid, illegal, or otherwise unenforceable pursuant to any applicable Legal Requirements, such determination shall not impair or otherwise affect the validity, legality, or enforceability of the remaining provision or parts of the provision of the 395 Contract Documents, which shall remain in full force and effect as if the unenforceable provision or part were deleted.

12.5 No Waiver

12.5.1 The failure of either Design-Builder or Concessionaire to insist, in any one or more instances, on the performance of any of the obligations required by the other under the 395 Contract Documents shall not be construed as a waiver or relinquishment of such obligation or right with respect to future performance.

12.6 No Third-Party Beneficiary Status

12.6.1 The 395 Contract Documents and all rights thereunder are intended for the benefit of the Concessionaire and Design-Builder, the 395 Financing Parties, the Department and the 395 Project Indemnitees, and shall not imply or create any rights on the part of, or obligations to, another person, including members of the public, third-party beneficiary status hereunder. .

12.7 Headings

12.7.1 The headings used in these General Conditions of Contract, or any other Contract Document, are for ease of reference only and shall not in any way be construed to limit or alter the meaning of any provision.

12.8 Notice

12.8.1 Whenever the 395 Contract Documents require that notice be provided to the other party, notice will be deemed to have been validly given: (i) if delivered in person to the individual intended to receive such notice; (ii) four (4) days after being sent by registered or certified mail, postage prepaid to the address indicated in the 395 Design-Build Contract; or (iii) if transmitted by facsimile, by the time stated in a machine generated confirmation that notice was received at the facsimile number of the intended recipient, provided, however, that the intended recipient is present to receive the facsimile and the transmittal is immediately followed by a hard copy delivered in accordance with (i) or (ii) above.

Unless otherwise permitted by the 395 Design-Build Contract, any notices provided in accordance with this Section 12.8.1 shall be sent to the following addresses:

From Design-Builder to Concessionaire:

95 Express Lanes LLC
6440 General Green Way
Alexandria, VA 22312
Attention: Mr. Kevin Ginnerty
Telephone: 571-419-6100
Fax: 571-419-6101

With a copy to:

Transurban (USA) Inc.
6440 General Green Way
Alexandria, VA 22312
Attention: Mr. Karl Rohrer
Telephone: 571-419-6100
Fax: 571-419-6101

From Concessionaire to Design-Builder:

The Lane Construction Corporation
14500 Avion Parkway, Suite 200
Chantilly, VA 20151
Attention: Mr. Jason Tracy
Telephone: 703-222-5670
Fax: 703-222-5960

With a copy to:

The Lane Construction Corporation
300 Bilmar Drive, Suite 150
Pittsburgh, PA 15205
Attention: Mr. Dennis Luzier
Telephone: 412-875-3370
Fax: 412-875-3371

12.9 Amendments

12.9.1 The 395 Contract Documents may not be changed, altered, or amended in any way except in writing signed by a duly authorized representative of each party, and in the event any change, alteration, or amendment deviates from, or conflicts with, the Second Amendment to the Comprehensive Agreement or the Technical Requirements set forth therein, the Department must approve such change, alteration, or amendment.

12.9.2 Design-Builder agrees to cooperate with the Concessionaire in the negotiation and execution of reasonable amendments or additions to the 395 Design-Build Contract required by any of the 395 Financing Parties providing debt financing for the construction of the 395 Project. Any proposed amendment or addition which would in any material respect increase Design-Builder's costs or expose it to greater risk without appropriate compensation will not be considered reasonable.

12.10 Coordination and Cooperation with the Department and 395 Financing Parties.

Design-Builder acknowledges that the Department and the 395 Financing Parties shall have the right to review and approve this Agreement and that they may require as a condition to such approval certain rights for their benefit, including the rights (a) to receive notices of default by Design-Builder and notices of inspections and tests, (b) to review payments, (c) to approve Service Commencement and/or Final Completion, and (d) to have the Financing Parties' Technical Advisers inspect the progress of the 395 Project and the Design-Builder's 395 Work. Design-Builder agrees cooperate with each of the Department and the Financing Parties to the extent reasonably required in order for Concessionaire to obtain any necessary Department approvals and to obtain financing for the 395 Project.

12.11 Confidentiality. Each Party shall hold in confidence for a period ending five (5) years after the earlier of (i) Final Completion of the entire 395 Project or (ii) the earlier termination hereof, any confidential information (marked as such) supplied to it by the other party or otherwise related to the 395 Contract Documents or the 395 Project. Design-Builder shall inform its Subcontractors, suppliers, vendors and employees of its obligations under this Section 12.12 and shall require each of its Subcontractors, suppliers, vendors and employees to execute confidentiality arrangements substantially in the form of this Section 12.11.

Notwithstanding the foregoing, each Party may disclose the following categories of information or any combination thereof:

- (i) information which was in the public domain prior to receipt thereof by such party or which subsequently becomes part of the public domain by publication or otherwise except by a wrongful act of such Party or, in the case of Design-Builder, any Subcontractor;
- (ii) information that such party can show was lawfully in its possession prior to receipt thereof from the other party through no breach of any confidentiality obligation;
- (iii) information received by such party from a third party having no obligation of confidentiality with respect thereto;
- (iv) information at any time developed independently by such party provided it is not developed from otherwise confidential information;
- (v) information disclosed pursuant to and in conformity with the Law or a judicial order or in connection with any legal proceedings or arbitration procedures; and
- (vi) information required to be disclosed under securities laws applicable to publicly traded companies and their subsidiaries or reporting required by a Governmental Authority if such party informs the other party of the need for such disclosure and, if reasonably requested by the other party, seeks, through a protective order or other appropriate mechanism, to maintain the confidentiality of such information.

12.11.1 Confidential Department of Defense Information. The Department, through the federal Department of Defense, will provide information regarding the location of utilities and other underground assets in and around the Pentagon Reservation for use in connection with the 395 Project. The Concessionaire will protect and keep confidential any documents marked by the federal Department of Defense “for official use only” as required by United States government policy, specifically 32 CFR Part 2001 and Department of Defense Manual Number 5200.01, Volume 4, and will not share such documents with any individuals or entities not directly involved in the 395 Project. Further, documents marked ‘for official use only’ must be destroyed or returned to the federal Department of Defense, Washington Headquarters Services after 395 Final Completion. DOCUMENTS MARKED FOR OFFICIAL USE ONLY MAY BE EXEMPT FROM PRODUCTION UNDER THE FEDERAL FREEDOM OF INFORMATION ACT (5 U.S.C. 552, as amended) AND THE VIRGINIA FREEDOM OF INFORMATION ACT (Code of Virginia (1950) § 2.2-3700 et seq., as amended) AND SHALL BE LABELED AS SUCH.”

12.12 Recourse Limited to Certain Concessionaire’s Assets. Concessionaire and Design-Builder acknowledge that Concessionaire has entered into the 395 Design-Build Contract entirely on its own behalf, and that, except with regard to claims of fraud substantiated in a final, non-appealable adjudication, Design-Builder shall have no recourse against any parent, subsidiary or affiliate company of Concessionaire, or against any partners, shareholders, members, owners, joint venturers, officers, directors, employees, agents, successors or assigns of any thereof for any reason. In addition, Design-Builder shall have no recourse against Concessionaire assets existing prior to the execution of the 395 Design-Build Contract, and specifically, Design-Builder shall have no recourse against any assets or revenues of Concessionaire relating to the Concessionaire’s operation of the 95 Express Lanes as set forth in the Comprehensive Agreement.

12.13 Exhibits

12.13.1 The following exhibits, are made part of, and incorporated into these General Conditions of Contract.

EXHIBIT 1.2.1 – 395 PROJECT SPECIFIC TERMS

EXHIBIT 3.7.1 – TTMS INTERFACE PLAN

EXHIBIT 5.1.1 – INSURANCE REQUIRMENTS

EXHIBIT 6.2.5(a) – FORM OF DESIGN-BUILDER INTERIM LIEN WAIVER

EXHIBIT 6.2.5(b) – FORM OF SUBCONTRACTOR INTERIM LIEN WAIVER

EXHIBIT 6.2.5(c) – FORM OF SUBCONTRACTOR FINAL LIEN WAIVER

EXHIBIT 6.6.3 – FORM OF DESIGN-BUILDER FINAL LIEN WAIVER

EXHIBIT 10.8 – COMPREHENSIVE AGREEMENT DISPUTE RESOLUTION
PROVISION

EXHIBIT 12.1.1 – FORM OF 395 DIRECT AGREEMENT

**END OF PART 4
GENERAL CONDITIONS OF CONTRACT**

EXHIBIT 1.2.1

395 PROJECT SPECIFIC TERMS

395 Contract Documents are defined in Article 2 of Part 3 (395 Design-Build Contract)

395 Contract Price shall mean the value set forth in Section 6.1 of Part 3 (395 Design-Build Contract)

395 Design-Build Contract refers to Part 3 of the 395 Contract Documents and means the executed, lump sum agreement for the 395 Project between Concessionaire and Design-Builder.

395 Design-Build Contract Date is the date that the 395 Design-Build Contract is executed by both parties.

395 Direct Agreement shall have the meaning provided in Part 4, Section 12.1.1.

395 Environmental Assessment means the approved Environmental Assessment document (and supporting technical reports) for the 395 Express Lanes Work dated September 2016.

395 Final Completion Recovery Plan shall have the meaning provided in Section 5.2.2 of Part 3 (395 Design-Build Contract).

395 Financial Close has the meaning set forth in the Amended and Restated Comprehensive Agreement.

395 Financial Close Date means the date on which Financial Close occurs under the Amended and Restated Comprehensive Agreement.

395 Financing Parties means (i) any and all lenders providing the construction, interim or long-term financing (including a leveraged lease or any other refinancing thereof) for the 395 Project, and any trustee or agent acting on their behalf, and (ii) any and all equity investors providing leveraged lease financing or refinancing for the 395 Project, and any trustee or agent acting on their behalf.

395 Financing Parties' Technical Advisors means BTY US, LLC, as appointed by the 395 Financing Parties.

395 FONSI means the Finding of No Significant Impact for the 395 Express Lanes Work issued by FHWA.

395 Long Stop Date means the date that is 365 calendar days after the Scheduled Final Completion Date; provided that a new 395 Long Stop Date may be established pursuant to a 395 Final Completion Recovery Plan approved by the Department.

395 Project means the entire 395 Project including the 395 Express Lanes Work and Additional Department Improvements Work.

395 Project Indemnities means any of the Concessionaire, State Parties and their respective Representatives.

395 Express Lanes Work means all the Work associated with the 395 HOT Lanes as detailed in Part 2 Attachment 1.0a (395 Express Lanes Scope of Work).

395 Project Right of Way or **Right of Way (ROW)** means any real property within the I-395 Corridor (which term is inclusive of all estates and interests in real property, including easements), which is:

- (a) necessary for performance of the Work, including temporary and permanent easements, and ownership and operation of the Project;
- (b) shown on the approved ROW Acquisition and Relocation Plan; and
- (c) within the 395 Project limits established by the NEPA Documents, as such limits may be adjusted pursuant to the 395 Design-Build Contract.

395 Scope Validation Work means work performed by the 395 Design-Builder pursuant to Part 4, Section 2.2.

395 Work is comprised of all Design-Builder's design, construction and other services required by the 395 Contract Documents, including procuring and furnishing all materials, equipment, services and labor reasonably inferable from the 395 Contract Documents.

395 Work Product shall have the meaning set forth in Section 4.1 of Part 3 (395 Design-Build Contract).

Additional Department Improvements Work means the Duke-Edsall Widening Work, the Seminary Road Sound Barriers Work, General Purpose Lanes Bridge Rehabilitation Work, and the Pentagon South Parking Work.

Advanced Notice Service Commencement means the initial notice Design-Builder must provide to Concessionaire regarding the Service Commencement Completion Date pursuant to Section 5.2.1 of Part 3 (395 Design-Build Contract).

Affiliate when used to indicate a relationship with a specified Person, means a Person that, directly or indirectly, through one or more intermediaries has a ten percent (10%) or more voting or economic interest in such specified Person or controls, is controlled by or is under common control with such specified Person, and a Person is deemed to be controlled by another Person, if controlled in any manner whatsoever that results in control in fact by that other Person (or that other Person and any Person or Persons with whom that other Person is acting jointly or in concert), whether

directly or indirectly and whether through share ownership, a trust, a contract or otherwise. For the avoidance of doubt, Concessionaire and Design Builder are not Affiliates of each other.

Agreement or **Amended and Restated Agreement** means the Amended and Restated Comprehensive Agreement Relating to the I-95/395 HOV/HOT Lanes Project between the Concessionaire and the Department.

Amended and Restated Agreement Date means the date the Amended and Restated Agreement is fully executed between the Concessionaire and the Department.

Approved for Construction (AFC) Documents means all drawings, specifications, revisions thereto, and any other items necessary to construct the Work, sealed by a professional engineer licensed by the State.

Award - The Concessionaire's decision to award a contract to an Offeror based on the selection processes identified in Part 1 (RFP). The Award is subject to the execution and approval of a satisfactory Part 3 (395 Design-Build Contract) therefore, and such conditions as may be specified or required by law.

Award Date - The date on which the decision is made by the Concessionaire to accept the proposal of an Offeror.

Baseline Schedule means (a) the Initial Baseline Schedule until such time as the Baseline Schedule is approved by the Concessionaire pursuant to the Section 1.4 of Part 2 (395 Project Information and Technical Requirements) and (b) the Baseline Schedule thereafter as updated in accordance with such Section 1.4.

Business Day(s), whether capitalized or not, means any day(s) other than a Saturday, Sunday, Commonwealth of Virginia holiday, or a day when the New York Stock Exchange or banks are authorized or required to close in New York, New York or Richmond, Virginia.

Code of Virginia means the Code of Virginia of 1950, as amended from time to time.

Comprehensive Agreement means the Comprehensive Agreement relating to the I-95 HOV/HOT Lanes project, dated as of July 31, 2012, by and between the Department and Concessionaire, as amended from time to time.

Concessionaire means 95 Express Lanes LLC, a Delaware Limited Liability Company.

Concessionaire Representative shall mean the Concessionaire's project manager, who acts directly or through his duly authorized representative, the representative acts within the scope of the particular duties assigned to him or the authority given to him.

Contractor shall mean Design-Builder.

Construction Documentation means all Design Documentation, AFC Documents, and all shop drawings, working drawings, fabrication plans, material and hardware descriptions,

specifications, construction quality control reports, construction quality assurance reports and samples necessary for construction of the 395 Project and/or the Utility Relocations included in the Work, in accordance with Part 2 (395 Project Information and Technical Requirements).

Critical Path means the longest chain(s), in terms of time, of logically connected activities on a Project Schedule ending with Final Completion.

Department means the Virginia Department of Transportation.

Department 395 Right of Way Costs means the actual amount paid directly by the Department to a landowner for 395 Project Right of Way.

Design-Builder means the entity that enters into the 395 Design-Build Contract (Part 3 of the Contract Documents) with the Concessionaire to perform the Work.

Design-Builder Party means Design Builder and any Affiliate and any agents, representatives, officers, directors, employees, Subcontractors, suppliers and materialmen of the Design Builder or any Affiliate.

Design-Builder Representative shall mean the Design-Builder's project manager, who acts directly or through his duly authorized representative, the representative acts within the scope of the particular duties assigned to him or the authority given to him.

Design-Builder 395 Right of Way Costs means all costs associated with: (i) the 395 Project Right of Way acquisition services (e.g., certified title reports, appraisal, appraisal review, negotiations, relocation assistance service, parcel closings, attorney's fees, attorney's final certification of title, and condemnation support) provided in accordance with the 395 Contract Documents and (ii) the acquisition and maintenance of the Design-Builder's Work Area.

Design-Builder Work Area means additional real property (whether acquired in fee or easement) outside the 395 Project Right of Way required for (i) site or field office(s), (ii) laydown, staging or storage areas, or (iii) to accommodate the Design-Builder's unique solution and/or means, methods and resources used during construction.

Design Consultant is a qualified, licensed design professional, eligible to provide professional engineering and/or land surveying services in the Commonwealth of Virginia, who is not an employee of Design-Builder, but is retained by Design-Builder, or employed or retained by anyone under contract with Design-Builder or Subcontractor, to furnish design services required under the 395 Contract Documents.

Design Documentation means such plans, drawings, specifications and other design documentation (including design standards, design or durability reports, models, samples and calculations) in computer readable and written formats prepared by or on behalf of the Contractor for the purposes of the performance of the Work or any component thereof in accordance with Part 2 (395 Project Information and Technical Requirements).

Deviation means any material proposed or actual change, deviation, modification, alteration or exception from any of Part 2 (395 Project Information and Technical Requirements).

Duke-Edsall Widening Categorical Exclusion means the Categorical Exclusion document for the Duke-Edsall Widening Work approved by FHWA.

Duke-Edsall Widening Work means the Work detailed in Part 2, Attachment 1.0b (Duke-Edsall Widening Scope of Work).

Early Works – means the work to be performed in accordance with Exhibit 5.1 of Part 3 (395 Design-Build Contract) following issuance of LNTP as approved by the Concessionaire and may include (i) the 395 Scope Validation Work; (ii) any design work, permitting, preparation of right of way, project management activities and other work performed by the Design-Builder necessary to complete the 395 Scope Validation Work; (iii) the commencement and completion of the final noise studies and reports; and (iv) any design work, permitting, preparation of right of way, project management activities and other work performed by the Design-Builder to support the approved Early Works Scope Document.

Early Works Scope Document – means Exhibit 5.1 of Part 3 (395 Design-Build Contract) that represents the detailed scope of work based on the Design-Builders Technical Proposal as agreed to by the Concessionaire prior to LNTP.

Emergency means any unplanned event within the 395 Project Right of Way that:

- (a) presents an immediate or imminent threat to the long term integrity of any part of the infrastructure of the 395 Project, to the Environment, to property adjacent to the 395 Project or to the safety of road users or the traveling public;
- (b) has jeopardized the safety of road users or the traveling public; or
- (c) is a declared state of emergency pursuant to State or Federal Law.

Environment means soil, surface waters, groundwaters, land, stream sediments, surface or subsurface strata and ambient air.

Environmental Laws means any Laws applicable to the 395 Project regulating or imposing liability or standards of conduct concerning or relating to the regulation, use or protection of human health, the Environment or Hazardous Substances, including, by way of example and not limitation, the Comprehensive Environmental Response, Compensation and Liability Act of 1980, 42 USC Section 9601 *et seq.*, the Resource Conservation and Recovery Act, 42 USC Section 6901 *et seq.*, the Federal Clean Water Act, 33 USC Section 1351 *et seq.*, the Occupational Safety and Health Act, 29 USC Section 651 *et seq.*, as currently in force or as hereafter amended.

Federal means of or relating to the central government of the United States of America.

Federal Requirements means the provisions required to be part of federal-aid contracts relating to highway projects and applicable to the 395 Project, including the provisions set forth in Exhibit 11.3 (Federal Requirements) of Part 3 (395 Design-Build Contract).

Final Completion is achieved when the Design-Builder receives written notice from the Concessionaire that the 395 Work is finally complete.

Final Completion Date means the date of the last Notice of Final Completion issued by Design-Builder pursuant to Section 5.2.2 of Part 3 (395 Design-Build Contract) that results in the Concessionaire's delivery to Design-Builder of a signed Final Completion Certificate.

Float means the amount of time that any given activity or logically connected sequence of activities shown on a Project Schedule may be delayed before it will affect the Contractor's ability to achieve Service Commencement by Service Commencement Date or Final Completion by the Final Completion Date. Such Float is generally identified as the difference between the early completion date and late completion date for all activities as shown on a Project Schedule.

General Purpose Lanes Bridge Rehabilitation Work means the Work detailed in Part 2, Attachment 1.0d (General Purpose Lanes Bridge Rehabilitation Scope of Work).

Governmental Approval means any authorization, consent, approval, license, lease, ruling, permit, certification, exemption, or registration by or with any Governmental Unit.

Governmental Unit means any national, state or local government, any political subdivision thereof, or any governmental, quasi-governmental, judicial, public or statutory instrumentality, administrative agency, authority, body or other entity having jurisdiction over the performance of the Work, the Project or the Parties; provided, however, that the term "Governmental Unit" shall not be construed to include the Concessionaire.

Governmental Authority means any court, Federal, state, or local government, Owner, commission, board, bureau, agency or other regulatory or governmental authority, but will not include the Owner.

Hazardous Environmental Condition means the presence at the Site of Hazardous Materials in such quantities or circumstances that may present a substantial danger to persons or property exposed thereto on connection with the Work.

Hazardous Materials (also referred to as Hazardous Substances) means, but is not limited to, any solid, liquid, gas, odor, heat, sound, vibration, radiation or other substance or emission which is or could be considered a contaminant, pollutant, dangerous substance, toxic substance, Hazardous Waste, solid waste, hazardous material or hazardous substance which is or becomes regulated by Legal Requirements or Law or which is classified as hazardous or toxic under Legal Requirement or Law.

Hazardous Waste means a waste that is: (a) listed as a hazardous waste in 40 CFR Section 261.31 to 261.33; or (b) exhibits one of the following characteristics: ignitability, corrosivity, reactivity or toxicity, or is otherwise defined as a hazardous waste by the Legal Requirements.

Initial Baseline Schedule means the initial baseline schedule identifying the major 395 Work activities in sufficient detail to enable the Concessionaire to monitor and evaluate design and construction progress, as set forth in the Design-Builder's Technical Proposal.

Interim Milestone(s) is completion and delivery date(s) for parts of the Work specified by Section 5.2 and 5.7 of Part 3 (395 Design-Build Contract).

Interchange Modification Report has the meaning as defined in the Federal Highway Administration's Interstate System Access Informational Guide dated August 2010.

Key Personnel – 395 Project Design-Builder team members that lead key 395 Project disciplines as identified in the Offeror Statement of Qualifications (SOQ) on the Key Personnel Resume Form Attachment G.

Known Pre-Existing Hazardous Materials means any Hazardous Materials identified in Part 2 (395 Project Information and Technical Requirements).

Law means all laws, treaties, ordinances, judgments, Federal Requirements, decrees, injunctions, writs and orders of any Governmental Authority, and all rules, regulations, orders, formal interpretations and permits of any Governmental Authority having jurisdiction over construction of the 395 Project on the 395 Project Right of Way, performance of the 395 Work, or operation of the 395 Project, or the health, safety or environmental condition of the 395 Project or the 395 Project Right of Way, as the same may be in effect from time to time. Laws include the Code of Virginia and the Uniform Act.

Legal Requirements are all applicable federal, state and local laws, codes, ordinances, rules, regulations, orders and decrees of any Governmental Unit.

Lien means any pledge, lien, security interest, mortgage, deed of trust or other charge or encumbrance of any kind, or any other type of preferential arrangement (including any agreement to give any of the foregoing, any conditional sale or other title retention agreement, any lease in the nature of a security instrument and the filing of or agreement to file any financing statement under the Virginia Uniform Commercial Code).

Limited Notice to Proceed (LNTP) – The document issued by the Concessionaire to authorize the start of work associated with Design-Builder developed, and Concessionaire approved, Early Works Scope Document.

Monthly Progress Reports means those reports prepared in accordance with Part 2 (395 Project Information and Technical Requirements) by the Design Builder or its contractors that are required pursuant to the 395 Design-Build Contract for monthly delivery to the Owner

Representative that reflect the status of and information related to the development and operation of the Project.

NEPA means the National Environmental Policy Act, 42 U.S.C. Section 4321 et seq., as amended and as it may be amended from time to time.

NEPA Decision means a Finding of No Significant Impact or an approved Categorical Exclusion.

NEPA Documents means the 395 Environmental Assessment and Duke-Edsall Widening Categorical Exclusion, as amended from time to time.

Notice of Pentagon South Parking Final Completion means the notice Design-Builder is required to provide to the Concessionaire that Design-Builder believes it has achieved Pentagon South Parking Final Completion in accordance with Exhibit 5.2.3 (Requirements for Pentagon South Parking Final Completion) of Part 3 (395 Design-Build Contract).

Notice of Final Completion means the notice Design-Builder is required provide to the Concessionaire that Design-Builder believes it has achieved Final Completion in accordance with Exhibit 5.2.2 (Requirement for Final Completion) of Part 3 (395 Design-Build Contract).

Notice of Project Component Final Completion means the notice Design-Builder is required to provide to the Concessionaire that Design-Builder believes it has achieved Final Completion for a Project Component in accordance with Exhibit 5.7 (Requirements for Project Component Final Completion) of Part 3 (395 Design-Build Contract).

Notice of Service Commencement means the notice Design-Builder is required provide to the Concessionaire that Design-Builder believes it has achieved Service Commencement in accordance with Exhibit 5.2.1 (Requirements for Service Commencement) of Part 3 (395 Design-Build Contract).

Notice to Proceed or NTP - is as defined in Section 5.1.2 of Part 3 (395 Design-Build Contract)

Offeror - those entities which submitted Statements of Qualifications (SOQs) pursuant to the Concessionaire's May 2, 2016 Request for Qualifications (RFQ) and were invited to submit proposals in response to Part 1 (RFP)

Pentagon South Parking Final Completion is achieved when the Design-Builder receives written notice from the Concessionaire that the Pentagon South Parking Work and Pentagon Reservation traffic signal locations are finally complete in accordance with Part 2, Section 1.4.1.B.16.

Pentagon South Parking Final Completion Date means the date of the last Notice of Pentagon South Parking Final Completion issued by Design-Builder pursuant to Part 3, Section 5.2.3 of that results in the Concessionaire's delivery to Design-Builder of a signed Pentagon South Parking Final Completion Certificate.

Pentagon South Parking Work means the Work as detailed in Part 2, Attachment 1.0e (Pentagon South Parking Scope of Work).

Person means any individual, corporation, partnership, association, joint stock company, trust, unincorporated organization, joint venture, government or political subdivision or agency thereof.

Pre-Existing Hazardous Materials means Known Pre-Existing Hazardous Materials and Unknown Pre-Existing Hazardous Materials.

Project Component(s) means each of the Duke-Edsall Widening Work, the Seminary Road Sound Barriers Work and the General Purpose Lanes Bridge Rehabilitation Work.

Project Component Final Completion Certificate means a Final Completion Certificate for an applicable Project Component.

Project Component Final Completion means the date of the Notice of Final Completion issued by Design-Builder pursuant to Section 5.7 of Part 3 (395 Design-Build Contract) for a specific Project Component that results in the Concessionaire's delivery to Design-Builder of a signed Final Completion Certificate.

Project Schedule means the Initial Baseline Schedule, Baseline Schedule, Project Schedule Updates or the As-Built Schedule, as applicable.

Project Schedule Updates shall have the meaning provided in Section 1.4.4 of Part 2 (395 Project Information and Technical Requirements).

Proprietary means information the Design-Builder wishes to keep confidential including trade secrets, financial information, internal processes, and 395 Project specific proposed means and methods

QA Manager (QAM) is Design-Builder's designee who shall be from an independent firm that has no involvement in construction operations for the Project, and shall be responsible for the quality assurance (QA) inspection and testing of all materials used and Work performed on the Project, to include monitoring of the contractor's quality control (QC) program. The QAM will ensure that all work and materials, testing, and sampling are performed in conformance with the contract requirements, and the "approved for construction" plans and specifications. This individual shall be a registered, licensed, Professional Engineer in the Commonwealth of Virginia.

QA/QC Plan, also referred to as Quality Management System Plan (QMSP) is a plan that details how the Design-Builder will provide quality assurance (QA) and quality control (QC) for both the design and construction elements of the project, obtain samples for Design-Builder quality control testing, perform tests for Design-Builder quality control, provide inspection, and exercise management control (e.g. quality assurance testing) to ensure the work conforms to the Contract Documents.

Remedial Actions means the management, treatment, handling, storage, monitoring, removal, transport or disposal measures carried out by Design-Builder with respect to Hazardous Materials in accordance with Section 4.1.1.2 of Part 4 (General Conditions)

Remedial Action Plan means the plan developed by Design-Builder with respect to Hazardous Materials encountered by Design-Builder.

Request for Proposals (RFP) means Part 1 of the 395 Contract Documents, inclusive of all of its parts, addenda, and any other document that is attached thereto or incorporated therein by reference.

Request for Qualifications (RFQ) means the Concessionaire's May 2, 2016 request for all documents, whether attached or incorporated by reference, utilized for soliciting interested persons to apply for prequalification. The RFQ is the first phase of a two-phase selection process for the purpose of inviting interested Offerors to submit qualifications for a project.

Representative means, with respect to any Person, any director, officer, employee, official, lender (or any agent or trustee acting on its behalf), partner, member, owner, agent, lawyer, accountant, auditor, professional advisor, consultant, engineer, contractor, other Person for whom such Person is, under Law, responsible or other representative of such Person and any professional advisor, consultant or engineer designated by such Person as its "Representative."

RFP Documents refer to those documents identified in the Section 2.5 of Part 1 (RFP).

Schedule Impact Analysis (SIA) – refer to Time Impact Analysis (TIA) in Part 2 (395 Project Information and Technical Requirements)

Scheduled Final Completion Date – means two-hundred thirty (230) days after the date of the Scheduled Service Commencement Date in accordance with Section 5.2.2 of Part 3 (395 Design-Build Contract).

Scheduled Service Commencement Date – means the date established by adding the **Service Commencement Duration** to the NTP date. The Scheduled Service Commencement Date is defined with the issuance of the Notice to Proceed.

Seminary Road Sound Barriers Work means the Work detailed in Part 2, Attachment 1.0c (Seminary Road Sound Barriers Scope of Work).

Service Commencement Date - means the date of the last notice of Service Commencement issued by Design-Builder pursuant to Section 5.2.1 of Part 3 (395 Design-Build Contract) that results in the Concessionaire delivery to Design-Builder of a signed Service Commencement Certificate.

Service Commencement Duration the number of calendar days estimated from NTP to achieving Service Commencement as proposed by an individual Offeror in its Letter of Submittal included with its Technical Proposal in accordance with Section 4.2.6 of Part 1 (RFP). This Duration will

be used as the time factor of the “B” component in the Price Proposal evaluation in accordance with Section 5.2.1.1 of Part 1 (RFP).

Service Commencement means the opening of the 395 Project for normal and continuous operations and use by the traveling public, after occurrence of all the events and satisfaction of all the conditions therefor set forth in Exhibit 5.2.1 Service Commencement of Part 3 (395 Design-Build Contract).

Service Commencement Certificate means a letter or certificate issued by the Concessionaire in accordance with Exhibit 5.2.1 Service Commencement of Part 3 (395 Design-Build Contract) evidencing the Concessionaire’s determination that Service Commencement has occurred.

Separate Contractor means a contractor retained by the Concessionaire or the Department other than the Design-Builder to perform work or to provide services or materials in connection with the 395 Project or adjacent to the Site and shall include, amongst others, Transurban (USA) Operations Inc. operating the 95 HOT Lanes and 395 HOV Gate Control Systems work for the Department.

Site is the land or premises on which the 395 Project is located.

Statement of Qualifications (SOQ) - The documents submitted by an Offeror in response to the Concessionaire’s May 2, 2016 Request for Qualifications (RFQ).

State means the Commonwealth of Virginia.

State Highway means any highway designated a State Highway pursuant to Title 33.2, Chapter 3, Code of Virginia.

State Law means any Law or any change in any Law by any State Party.

State Party means the State, the CTB, the Department or any other agency, instrumentality or political subdivision of the State.

Standard Documents means the standards, special provisions and specifications listed in Standard Drawings and Standard Specifications.

Standard Drawings are the applicable drawings in the Virginia Department of Transportation *2016 Road and Bridge Standards* in effect as of the 395 Design-Build Contract Date.

Standard Specifications are the Virginia Department of Transportation *2016 Road and Bridge Specifications* in effect as of the 395 Design-Build Contract Date.

Subcontract means any and all agreements between Design-Builder and its Design Consultants, Subcontractors and other agreements between Design Consultants or Subcontractors and their respective Sub-subcontractors (and/or any other lower tier subcontractors), it being the intent that all this term encompasses all agreements deriving directly or indirectly from Design-Builder, in connection with the performance of the Work.

Subcontractor is any person or entity retained by Design-Builder as an independent contractor to perform a portion of the Work and shall include material men and suppliers.

Sub-Subcontractor is any person or entity retained by a Subcontractor as an independent contractor to perform any portion of a Subcontractor's Work and shall include materialmen and suppliers, but shall not be deemed to include Design Consultants.

Subcontracting - Contracting with a Subcontractor for the performance of a portion of the Work without relinquishing any of the responsibility that the Design-Builder has toward the Concessionaire for performance of the entire Contract.

Successful Offeror - The Offeror that will be awarded the 395 Design-Build Contract in accordance with Part 1 (RFP).

Surety - A corporate entity bound with and for the Design-Builder for full and complete performance of the 395 Design-Build Contract and for payment of debts pertaining to the Work. When applied to the proposal guaranty, it refers to the corporate body that engages to be responsible in the execution by the Offeror, within the specified time, of a satisfactory 395 Design-Build Contract and the furnishing of an acceptable payment and performance bond.

Suspension - A written notice issued by the Concessionaire to the Design-Builder that orders the work on the Project to be stopped wholly or in part as specified. The notice will include the reason for the suspension.

Taxes shall have the meaning provided in Section 6.1 of Part 3 (395 Design-Build Contract).

Termination Payment shall have the meaning provided in Section 8.5 of Part 3 (395 Design-Build Contract).

Tolling and Traffic Management System (TTMS) – see Exhibit 3.7.1 (TTMS Interface Plan) of Part 4 (General Conditions) for all tolling and traffic management technology related terms

TTMS Contractor means Transurban (USA) Inc. performing the Tolling and Traffic Management work on the 395 Project in accordance with Exhibit 3.7.1 (TTMS Interface Plan) of Part 4 (General Conditions).

Unknown Pre-Existing Hazardous Materials means any Hazardous Materials present on the Site prior to the 395 Design-Build Contract Date which are not Known Pre-Existing Hazardous Materials.

Utility (Utilities) means a public, private, cooperative, municipal and/or government line, facility or system used for the carriage, transmission and/or distribution of cable television, electric power, telephone, data or other telecommunications, telegraph, water, gas, oil, petroleum products, steam, chemicals, sewage, storm water not connected with the highway drainage and similar systems that directly or indirectly serve the public. The term "Utility" specifically excludes (a) storm water lines connected with the highway drainage, and (b) traffic signals, street lights, and electrical systems for 395 Project roadways.

Utility Owner means the owner or franchisee of any Utility (including both privately held and publicly held entities, cooperative utilities, and municipalities and other governmental agencies).

Utility Relocation means the removal, relocation and/or protection in place (including provision of temporary services as necessary) of any and all Utility facilities that have to be removed, relocated and/or protected in place in order to permit construction of the 395 Project.

Warranty Period shall have the meaning provided in Section 2.10.1 of Part 4 (General Conditions)

Work Breakdown Structure (WBS) is a hierarchically-structured grouping of project elements that organizes and defines the total scope of the Project. Each descending level is an increasingly detailed definition of a project component. Project components may be products (a product-oriented WBS) or tasks (a task-oriented WBS).

Work Package is a deliverable at the lowest level of the WBS, and may be divided into activities and used to identify and control work flows in the organization.

EXHIBIT 3.7.1
TTMS INTERFACE PLAN

[ATTACHED]

395 EXPRESS LANES DESIGN-BUILD PROJECT

TTMS INTERFACE PLAN

October 14, 2016

FHWA Project No.: NHPP-395-4(189)

VDOT Project No.: 0395-969-205, P101, C501

REVISION HISTORY

Revision	Date	Author	Reviewer	Notes
0	29 July 16	KD/SV	JB/KR	Issued with RFP
1	14 Oct 16	KD/SV	JB/KR	Revised Schedule Section, Editorial Changes

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1 Introduction

1.1 Description of Project

The 395 Express Lanes project is an extension of the existing 95 Express Lanes that will convert the two existing reversible HOV (High Occupancy Vehicle) Lanes located in the I-395 median to three HOT (High Occupancy Toll) Lanes (Express Lanes). The project corridor extends approximately eight miles from the current northern terminus of the 95 Express Lanes at Turkeycock Run in Fairfax County (south of Route 236) through the City of Alexandria and Arlington County to the 14th Street Bridge; refer to Figure 1. The northern section of the project corridor from south of Eads Street near the Pentagon to the District of Columbia (DC) is a four-lane divided expressway (2-lanes in each direction). Some project components will be located in DC, on arterial roadways and on the Pentagon reservation. Upon completion, the 395 Express Lanes will be subject to the same rules and regulations as the existing 95 Express Lanes, and the two will be operated by the Concessionaire as a single, fully integrated Express Lanes facility under the terms of its concession agreement with Virginia Department of Transportation (VDOT).

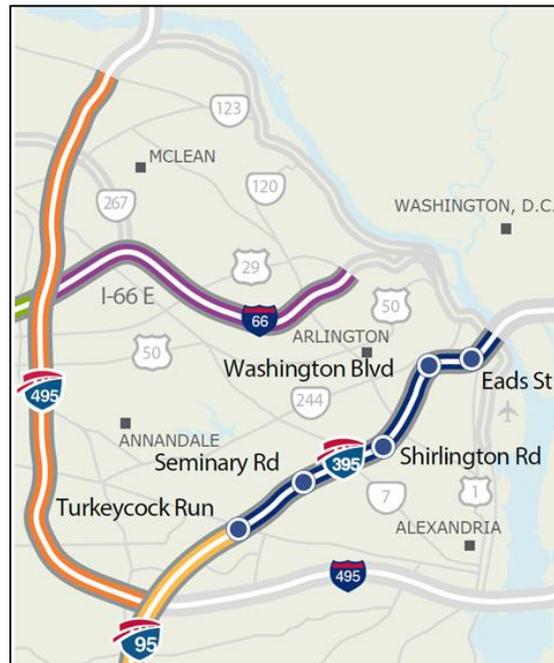


Figure 1. 395 Express Lanes Project Corridor

1.2 Project Structure

Figure 2 provides an overview of the 395 Express Lanes project delivery structure and contracting relationships. The proposed project structure will require a collaborative approach between the Design-Builder and Tolling and Traffic Management System (TTMS) Contractor to ensure successful and timely delivery of the project.

1.3 95 Express Lanes LLC (Concessionaire)

95 Express Lanes LLC (Concessionaire) will be responsible for the design, build of the project and ongoing operations and maintenance of the 395 Express Lanes under the existing I-95 HOV/HOT Lanes Project Comprehensive Agreement with VDOT.

1.4 Design-Builder

Design-Builder will be the principal contractor under contract to Concessionaire to deliver the complete 395 Express Lanes Project, responsible for providing the civil works and a number of component elements of the Tolling and Traffic Management System (TTMS), including all system civil infrastructure and Intelligent Transportation System (ITS) roadside equipment for the 395 Express Lanes. The Design-Builder will be responsible for interfacing with TTMS Contractor throughout the project in relation to TTMS and sub-system components.

1.5 Transurban (USA) Inc. (TTMS Contractor)

Transurban (USA) Inc. will be the TTMS Contractor under contract to Concessionaire, responsible for the overall Tolling and Traffic Management System, including design development, systems engineering, integration, and testing for the supply and installation of the tolling roadside equipment and back office systems, and integration of ITS equipment, provided by the Design-Builder, into the traffic management system centralized platform.

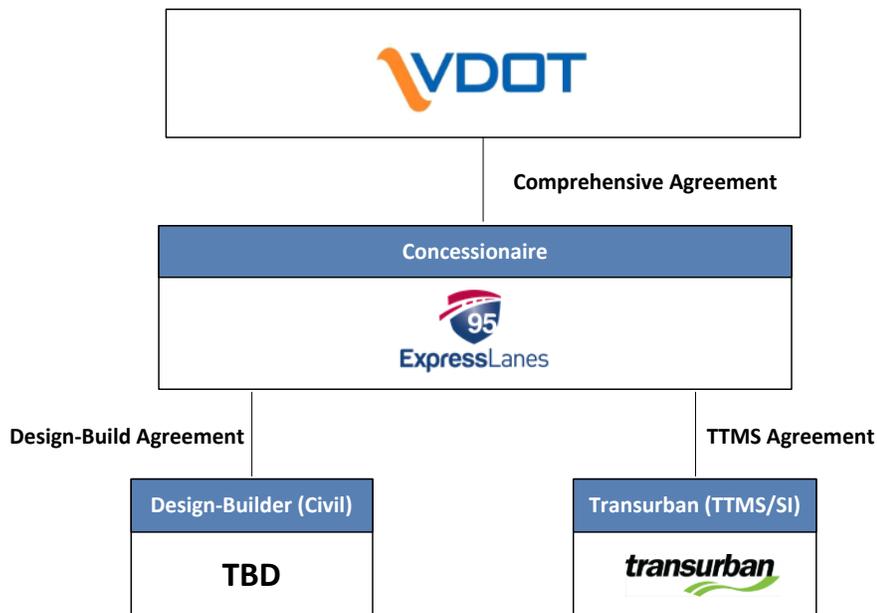


Figure 2. Project Organizational Structure

1.6 Document Purpose

The purpose of the TTMS Interface Plan is to further define the specific scope of work responsibilities of the Design-Builder and the TTMS Contractor for the 395 Express Lanes Project that form the basis for the design, installation/construction, turnover, testing, and integration of the various TTMS component elements and to identify the interfaces and obligations between the two parties required to support delivery of the TTMS for the Express Lanes. The Interface Plan establishes a framework for interface management and protocols to identify, coordinate and control the interfaces and interface points between the Design-Builder scope of services and TTMS Contractor scope of services. This document will identify the division of responsibilities between the Design-Builder and TTMS Contractor, as it pertains to the broader TTMS system delivery of the project, and define design responsibilities, information exchange, review process, notifications, and appropriate documentation and deliverables required for delivery of the TTMS as part of the overall complete project. This document does not address VDOT ITS equipment.

1.7 TTMS System Overview

Figure 3 provides an overview of the major subsystems and components of the overall TTMS System for the Project.

The Tolling System is used for collection and enforcement of tolls, and consists of electronic toll collection (ETC) roadside equipment located in the field, and ETC system and back office system (BOS) software and hardware located in the Express Lanes Operations Center (referred to as ELOC or HOT-OC). The ETC roadside equipment is located on toll gantry structures and in adjacent ETC cabinets, and provides vehicle detection and classification, automatic vehicle identification, a vehicle enforcement system, and vehicle occupancy detection (VOD). VOD equipment is located at strategic toll sites. The vehicle enforcement system detects vehicles using the Express Lanes without a valid transponder. The tolling back office solution processes and manages toll transactions, processes license plate images, builds trips with the recorded transaction data, interfaces with external services and support customer management. The Dynamic Pricing System (DPS) uses traffic data, such as volume, occupancy, and speed to calculate toll prices.

The Traffic Management System provides a centralized platform for the traffic control room operators to manage the various ITS roadside equipment installed in the field. With the TMS, the operators conduct gate reversibility, monitor traffic conditions, and provide real time information to motorists to support roadway and en-route traffic management, and report and manage incidents along the Express Lanes. The ITS roadside equipment is located in the field and TMS software and hardware is located at the ELOC. The ITS roadside equipment includes:

- a. Dynamic message signs (DMS) to provide dynamic pricing and traveller information to motorists on the road,
- b. Microwave traffic detectors to collect traffic data, including volume, speed, and occupancy,
- c. Closed circuit television (CCTV) cameras,

- d. Automated incident detection (AID) cameras,
- e. Lane use management system (LUMS) which includes lane control signs (LCS) and variable speed limit signs (VSLS), and
- f. Gates and Gate Control System (GCS).

The Communications Backbone and Network is comprised of a fiber optic backbone and Communications Network. The fiber optic backbone will run the length of the project, and provide redundant path to the ELOC. Other ITS roadside equipment will complete the communications and roadside infrastructure, including ITS cabinets, UPS (uninterrupted power supply), generators, device enclosures, and network equipment.

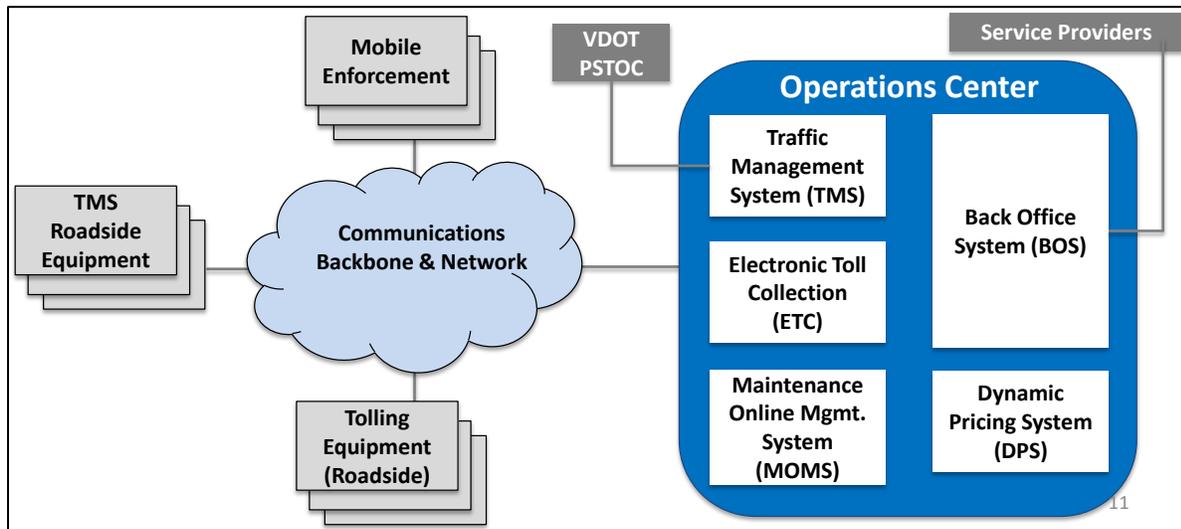


Figure 3. TTMS System Overview

1.8 VDOT ITS Roadside Equipment

The project also includes scope of work under the Design-BUILDER related to VDOT's Communication and ITS Roadside Equipment which is integrated back to VDOT Northern Region Operations (NRO) McConnell Public Safety and Transportation Operations Center PSTOC and its Advanced Traffic Management System (ATMS). Delivery of the Design-BUILDER's scope of work related to VDOT's Communication and VDOT ITS Roadside Equipment is separate and is addressed in the Technical Requirements, not in the TTMS Interface Plan.

1.9 Commitment to Notify and Avoid Conflicts and Disputes

Design-BUILDER and the TTMS Contractor each commit to working together in a collaborative and open manner, to enable the other to obtain the benefits of its contract with Concessionaire, and to avoid conflicts and disputes. As a result, Design-BUILDER and the TTMS Contractor agree

to promptly notify the other, as well as Concessionaire, of: (a) any actual or perceived problems, concerns, issues, differences of opinion or conflicts in relation to the work on the Project, whether involving physical Site conflicts, workspace or schedule conflicts, or equipment and system performance conflicts; and (b) any other matter which may be contrary to the principles reflected in this Plan.

1.10 Communications and Coordination Protocol

As a means of implementing the commitments contained in Section 1.9 above, the parties agree that they will participate in regular coordination meetings (at least every three weeks) and hold additional meetings as required during the Contract period to address open or unresolved issues related to TTMS interfaces. One of the primary purposes of the coordination meetings is to create an environment whereby issues that could impact performance of either Design-Builder or the TTMS Contractor are identified and brought to the attention of the Concessionaire and the other party at the soonest opportunity, and that such issues are resolved or mitigated in a real-time manner. Design-Builder will be responsible for administering these coordination meetings, with such meetings being held as frequently as needed to accomplish the goals of this Plan. Design-Builder will also be responsible for integrating the activities of the TTMS Contractor into the Baseline Schedule and all updates to such schedule.

Design-Builder and the TTMS Contractor recognize that their ability to perform work efficiently and effectively is dependent upon receiving timely and accurate information from the other party. Each agrees that it will give the other reasonable advance notice of its needs and/or requirements, and that the other party will reasonably attempt to meet the needs of the other party. Each party recognizes that there needs to be some flexibility in the submission and review/approval of their respective design documentation, and that if circumstances require adjustments to help the other party, the parties will make best efforts to accommodate the other party. It is expected that Design-Builder and the TTMS Contractor will regularly update each other of their respective progress in completing design documents. Design-Builder will have primary responsibility for coordinating and administering the process of submitting and exchanging information (including but not limited to design documentation) with the TTMS Contractor.

Design-Builder and the TTMS Contractor recognize that it is possible that their ability to perform certain work may shift because of field progress. One of the primary functions of this communications and coordination protocol is to provide a framework for the parties to discuss these issues and obtain advance knowledge of any such issues. Design-Builder and the TTMS Contractor each agree to provide the other with reasonable notice (3 calendar days) of any field delay issues, and the affected party will make best efforts to reasonably work around these issues. This is not intended to affect the contractual rights of any of the parties for Contract Price or Contract Time adjustments that may be due.

Design-Builder and the TTMS Contractor further recognize that one of the critical issues for Project success is to deal effectively with the interface points between and among their respective work. While Design-Builder will have primary responsibility to schedule and coordinate these interfaces, it is understood that Design-Builder and the TTMS Contractor will

work together collaboratively and cooperatively to focus on this issue and to cooperate with each other to identify interfaces that could create problems and work cooperatively to resolve such problems.

1.11 Project Leadership Committee

Concessionaire, Design-Builder and the TTMS Contractor recognize the principle that problems are to be raised as early as possible and that solutions are to be developed at the lowest levels of the Project management teams as possible. In the event that the Project management teams are unable to accomplish this, the parties shall refer the problem to the Project Leadership Committee. This Committee will consist of senior representatives of each party, and will be chaired by the Concessionaire's representative. It is expected that the Committee will meet no less than monthly, and will proactively deal with, and take all action it considers necessary to resolve, problems, concerns, issues, and differences of opinion or conflicts as they arise.

1.12 Obligation of Parties to Follow the Contract

Sections 1.9 through 1.11 above are intended to resolve issues on a real-time basis. They are not intended, however, to supersede the requirements of the Contract Documents, in particular Articles 8 and 10 of Part 4 (General Conditions). If either Design-Builder or the TTMS Contractor believes that it is being impacted by the actions of the other, each party's remedy, if any, will be as established by the Contract Documents.

2 Interface Roles and Responsibilities

Design-Builder will be responsible for managing, coordinating and scheduling the work related to the design, supply, installation, testing, and integration of the TTMS roadside equipment and related infrastructure, including active coordination and engagement with TTMS Contractor throughout the entire project duration.

Design-Builder will be responsible for ensuring that milestones and all related predecessor activities are being met and reviews are requested from TTMS Contractor to meet schedule requirements. The TTMS Contractor will be responsible for supporting the Design-Builder to complete integration of the ITS and ETC roadside equipment with the existing TTMS subsystems.

The scope of services related to the delivery of the TTMS for the project stakeholders are listed below. The responsibilities of the Design-Builder and the TTMS Contractor are further defined for the design, construction and testing phases of the project.

A detailed scope split of Design-Builder and TTMS Contractor activities is provided in **Appendix A**.

2.1 Concessionaire Scope

Concessionaire will provide oversight of the interface management between the Design-Builder and TTMS Contractor to ensure that the civil works and TTMS scopes of services are properly coordinated and managed throughout all phases of the project delivery.

2.2 Design-Builder Scope

Design-Builder will be responsible for following scope of services related to the delivery of the TTMS:

- a. overall management associated with the delivery of the TTMS roadside equipment, including incorporating and integrating all necessary TTMS activities and milestones related to the civil works-system interfaces into the Design-Builder's overall project schedule,
- b. the design, supply and construction of all civil works necessary for the installation of tolling ETC roadside equipment, including utilities (new service and relocations), drainage, foundations, toll gantry structures, ETC roadside cabinets, toll equipment access points, enforcement areas and roadway barriers required to protect toll equipment and infrastructure,
- c. design, supply, installation, and commissioning of all power and communications cabling deemed necessary to support the tolling roadside equipment, structures and roadside cabinets,
- d. the design, supply and construction of all civil works necessary for the installation of ITS roadside equipment, including utilities (new service and relocations), drainage, foundations, structures (e.g. sign structures and/or poles), ITS roadside cabinets and

- enclosures, ITS equipment access points, and roadway barriers required to protect ITS equipment,
- e. design, supply, installation, and commissioning of all power and communications cabling deemed necessary to support the ITS roadside equipment, structures and roadside cabinets,
 - f. the design, supply, installation and testing of ITS roadside equipment, including dynamic messaging signs, microwave traffic detectors, CCTV cameras, automated incident detection cameras, lane control signs, variable speed limit signs, and gate control system equipment,
 - g. the design, supply, installation, and commissioning of the fiber optic communications backbone along the entire project length and connections to the ELOC, and
 - h. demonstrating the performance of the ITS roadside equipment, communications backbone and network and ancillary roadside equipment as part of testing and commissioning.

2.3 TTMS Contractor Scope

TTMS Contractor will be responsible for following scope of services related to TTMS:

- a. coordinating with the Design-Builder to ensure all necessary TTMS activities and milestones related to civil works-system interfaces are properly incorporated and integrated in the Design-Builder's overall project schedule throughout all phases of project delivery,
- b. providing to the Design-Builder the technical and performance requirements and specifications for the tolling subsystems, including the ETC roadside equipment,
- c. providing to the Design-Builder the technical and performance requirements and specifications for the ITS subsystems, including associated roadside equipment,
- d. providing to the Design-Builder the ETC roadside cabinet (also referenced as an Integrated Roadside Unit or IRU) for installation at each toll site location,
- e. the design, supply, installation, testing and commissioning of the ETC tolling roadside equipment at each toll site location, and integrating the ETC tolling roadside equipment with the Back Office System (BOS) and the ELOC,
- f. integrating the ITS roadside equipment with the TMS and ELOC and other subsystems, and
- g. overall integration of the Tolling and Traffic Management System.

2.4 Design Phase

2.4.1 Design-Builder Responsibilities

Design-Builder will be responsible for following scope of services related to the design:

- a. the design of all civil works necessary for the installation of tolling roadside equipment, including drainage, foundations, toll gantry structures, technical roadside cabinets, toll equipment access points, enforcement areas and roadway barriers required to protect toll equipment and infrastructure,
- b. coordination and schedule design reviews with Concessionaire and TTMS Contractor to walk through preliminary plans related to TTMS delivery,
- c. completion of ETC toll infrastructure design, as part of Design-Builder final design efforts. Design-Builder will finalize design and configuration of the toll sites including enforcement bays, maintenance access, site safety and security based on TTMS Contractor input and final roadway civil design,
- d. providing all service connections and utility relocations necessary to install and operate ETC roadside equipment and associated infrastructure (e.g. lighting, cabinets, and technical cabinets),
- e. completion of Network Communication Design, as part of Design-Builder final design efforts,
- f. providing input to the System Requirements Review for the ITS roadside equipment specifications and operating manuals provided by the manufactures for the ITS roadside equipment to be procured by the Design-Builder,
- g. providing to Concessionaire and TTMS Contractor a formal design and factory review of the typical ITS cabinets to be provided by Design-Builder,
- h. providing to Concessionaire and TTMS Contractor a formal design and factory review of the typical ETC roadside equipment cabinets to be provided by Design-Builder,
- i. developing an ITS/ETC Roadside Equipment (ITS/ETC RSE) Asset Database, to include all ITS roadside equipment, communications network, and tolling and ancillary equipment infrastructure as part of the overall turnover of Toll Sites, ITS roadside equipment and Communications Network. The Design-Builder will maintain all asset location, configuration and other pertinent data in a single database. The database will be established as part of the design development and will be placed under configuration control during design process, and maintained through all phases of construction, installation, and turnover. Database will be maintained by Design-Builder and regularly updated and available to all parties. TTMS Contractor will provide template for Design-Builder to setup initial ITS / ETC RSE Asset Database,
- j. providing necessary information as part of design development and final design to TTMS Contractor and Concessionaire to support FCC license application at the toll site locations, and
- k. Interdisciplinary coordination of all roadway elements, roadside equipment, and tolling equipment to avoid potential conflicts during construction.

2.4.2 TTMS Contractor Responsibilities

During the Design Phase of the TTMS, the systems and components of the TTMS will undergo requirements definition phase, detailed system design, including a Baseline Design Review (BDR), Modified Design Review (MDR) and a Final Design Review (FDR), leading to a detailed

Final System Design that meets the Technical Requirements and the TTMS System Requirements Specification.

TTMS Contractor will be responsible for following scope of services related to design and will provide the following to the Design-Builder:

- a. conceptual layout and functional and performance requirements for the ETC roadside equipment to the Design-Builder, in order for Design-Build to finalize civil works design related to TTMS,
- b. toll gantry and roadside toll equipment requirements, including all civil and infrastructure requirements in order for Design-Builder to finalize ETC Infrastructure design,
- c. Network High Level Design document, which provides an overview for the design of the roadside Wide Area Network (WAN), bandwidth requirements, and data center networks,
- d. L3 (layer 3) network configuration,
- e. Network Detailed Design document (NDD), which provides detailed design of the network,
- f. requirements and template for ITS/ETC RSE Asset Database, and
- g. ITS roadside equipment configuration requirements.

2.5 Construction / Installation Phase

Design-Builder acknowledges that its Work may be affected by the carrying out of the work by the TTMS Contractor performed within or near the Project Site, and shall ensure that the design, planning, programming and performance of work by both contractors are properly coordinated, taking into account their concurrent and sequential nature. In particular, the Design-Builder shall: a) plan, program and perform its Work so as to not unnecessarily interfere with or hinder the activities of the TTMS Contractor and b) at all times take all reasonable steps to protect the TTMS Contractor's Work from accidental damage caused by the Design-Builder's personnel and Work.

The Design-Builder shall allow the TTMS Contractor access to the Project Site to the extent necessary or appropriate for TTMS Contractor to simultaneously or progressively, as appropriate, carry out its obligations under the TTMS Interface Plan. The Design-Build Work and the TTMS Work, as applicable, shall be delivered in a fit-for-purpose condition such that the Design-Builder or TTMS Contractor, as applicable, can integrate or tie-in its Work without modification, redesign or delay.

While on the Project Site, the TTMS Contractor and its subcontractors shall at all times (a) adhere to the health, safety and security directions, procedures and guidelines established by Design-Builder (b) if required by Design-Builder, with respect to matters that deviate from the agreed schedule, confine their activities to a specified location on the Project Site or vacate the Project Site if the Design-Builder reasonably determines that the presence of TTMS Contractor or its contractors and/or their activities are materially interfering with the performance of the Design-Build Work or creating an immediate and serious threat to public health, safety, security

or the environment. In the event that the Design-Builder so confines or removes the TTMS Contractor, it shall provide TTMS Contractor with a reasonable, alternate time to conduct such activities.

2.5.1 Design-Builder Responsibilities

The Design-Builder will be responsible for the following activities related to construction:

- a. developing a Toll Site Turnover Plan, detailing the sequential release of toll sites per approved Design-Builder schedule to TTMS Contractor to commence ETC roadside equipment installation activities.
- b. developing a Toll Site Turnover Check List in accordance with the minimum requirements,
- c. schedule and conduct toll site turnover meeting and inspection with TTMS Contractor at each toll site location,
- d. providing Toll Site Survey as part of Toll Site Turnover to TTMS Contractor to verify toll site installation,
- e. establishing location and extent of utilities and services lines in the project area and notify TTMS Contractor before TTMS Contractor commences work in the field,
- f. providing safe and secure access to the TTMS work locations, including all Maintenance of Traffic (MOT), safe access, and any fencing and barricades. Design-Builder shall provide all labor materials and miscellaneous items required to install, maintain any required safety provisions relating to the TTMS work,
- g. maintaining clean project site and provide required access to TTMS work sites generally clear of mud, standing water, ice, and snow,
- h. coordinating with TTMS Contractor to identify and provide temporary lay-down and staging areas within the vicinity of the project right of way for TTMS work, and
- i. coordinating and scheduling Turnover meeting with TTMS Contractor at each toll site to walk through Turnover checklist of specific toll site. Any deficiencies will be jointly identified by Design-Builder and TTMS Contractor, documented by Design-Builder on Turnover checklist as punch list item. Design-Builder will be responsible for resolution of punch list items prior to TTMS Contractor commencing installation activities. Toll Site Turnover to TTMS Contractor will be completed after all punch list items on Turnover checklist have been jointly identified as completed.

2.5.2 TTMS Contractor Responsibilities

The TTMS Contractor will be responsible for the following activities related to construction:

- a. coordinating with the Design-Builder to identify staging and sequence of work efforts for the installation of ETC roadside equipment,
- b. developing Toll Site Installation Plan, which details the installation activities for the ETC tolling roadside equipment,
- c. participate in Toll Site turnover meeting and inspection with Design-Builder at each toll site location,

- d. preventing mud or soil from TTMS Contractor or its subcontractors' vehicles being tracked off project work site to any roadway, and
- e. following the Design-Builder's safety rules and precautions for the project site.

2.6 Tolling and Traffic Management System Testing and Commissioning Phase

The testing and commissioning of the TTMS will be achieved through the following test phases and activities. The purpose of the test phases is to validate that each subsystem, and combinations of subsystems, progressively meets the functional and performance requirements defined by System Requirements Specification (SRS) and the Final System Design. The TTMS subsystems will follow a progressive commissioning and testing process, therefore reducing subsequent test phases from undergoing redundant tests performed in the previous phases.

2.6.1 Factory Acceptance Test (FAT)

Factory acceptance test (FAT) will be conducted by TTMS Contractor at ETC-providers facility to demonstrate that the ETC tolling equipment and subsystems meet the function and technical requirements according to the System Requirements Specifications.

All required FATs will be conducted by the Design-Builder for the ITS roadside equipment.

2.6.2 Incremental Installation and Level A and B Test for ITS Roadside Equipment

Level A and B testing will be conducted by the Design-Builder.

Level A testing is to certify ITS roadside equipment installed by the Design-Builder is installed and fully operational in line with agreed design requirements as demonstrated by executed test procedures approved and witnessed by TTMS Contractor.

Level B testing is to certify ITS roadside equipment is successfully integrated with Express Lanes communication network as demonstrated by executed test procedures approved and witnessed by TTMS Contractor.

2.6.3 Integration and Level C Test for TMS Roadside Equipment

Level C testing will be conducted by TTMS Contractor to certify that TTMS systems can communicate and control ITS roadside equipment as demonstrated by executed test procedures defined by TTMS Contractor. TTMS Contractor will be responsible for this test and the Design-Builder will provide support to TTMS Contractor for successful and on-time execution of this test, including but not limited to Maintenance of Traffic and safe access to the Site.

2.6.4 Incremental Installation and Site Acceptance Test for ETC Roadside Equipment (SiAT)

The TTMS contractor shall install tolling equipment and perform site acceptance testing to verify that the ETC tolling equipment and subsystems have been installed correctly and are operating as expected. The SiATs will be conducted at each of the toll site locations.

2.6.5 Training

Design-Builder is not required to provide training on Express Lanes ITS Roadside Equipment.

2.6.6 Integration Acceptance Test

Integration acceptance test will be conducted by TTMS Contractor to validate that the fully integrated TTMS, in a normal operational environment, complies with the TTMS System Requirements Specification (SRS), Final System Design and other contract related documents. TTMS Contractor will be responsible for this test and the Design-Builder will provide support to TTMS Contractor for successful and on-time execution of this test, including but not limited to promptly addressing items identified that are related to roadside equipment installed by Design-Builder.

2.6.7 User Acceptance Test

The User Acceptance Test will be conducted by the Concessionaire Operations and Maintenance personnel to verify that the TTMS meets operational requirements and system functionality. The Concessionaire is responsible for the independent verification of the system prior to commissioning of the system after completion of IAT. Concessionaire will be responsible for this test and the Design-Builder and TTMS Contractor will provide support to Concessionaire for successful and on-time execution of this test, including but not limited to promptly addressing items identified that are related to roadside equipment installed by Design-Builder.

2.6.8 Operational Readiness

Design-Builder and TTMS Contractor will coordinate and provide support to Concessionaire for Operational Readiness, including but not limited to promptly addressing items identified that are related to roadside equipment installed by Design-Builder and TTMS Contractor respectively.

2.6.9 Start-Up and Service Commencement (Toll Day 1)

Design-Builder and TTMS Contractor will coordinate and provide support to Concessionaire for Start-Up and Service Commencement, , including but not limited to promptly addressing items identified that are related to roadside equipment installed by Design-Builder and TTMS Contractor respectively.

2.6.10 Design-Builder Responsibilities

The Design-Builder shall support all testing and commissioning phases and activities as follows:

- a. developing a Turnover Plan for the ITS roadside equipment that includes schedule for installation, Level A and B Testing, and documentation submission to TTMS Contractor,
- b. developing a Turnover Plan for the wide area network (WAN) communications network to address turnover and transition from HOV equipment to Express Lanes equipment,
- c. providing ITS /ETC RSE Asset Database (Draft and Final versions),
- d. developing test procedures to test the fiber optic backbone, communications network and the ancillary equipment,
- e. conducting tests of the fiber optic backbone, communication network and ancillary equipment and provide test report as part of Turnover of the communications network and ancillary equipment as part of the Turnover to TTMS Contractor,
- f. conducting required FATs for the ITS Roadside Equipment
- g. developing Level A and B test procedures for the ITS Roadside Equipment,

- h. conducting Level A and B test for the ITS Roadside Equipment and provide test report as part of the Turnover of the ITS roadside equipment to TTMS Contractor for integration, and
- i. coordinating and providing MOT to support TTMS Contractor test activities, including Level C testing, SiAT, IAT, UAT, Operational Readiness and Start-Up.

2.6.11 TTMS Contractor Responsibilities

The TTMS Contractor shall support testing and commissioning phases and activities as follows:

- a. developing TTMS Test Strategy and Plan, to provide framework for the test strategy and commissioning strategy for the TTMS, and outlines sequence of testing and commissioning and preliminary schedule and milestone dates and related documentation and responsible and participating parties,
- b. developing FAT, SiAT, IAT, and UAT procedures related to ETC, TMS and systems integration,
- c. conducting FAT, SiAT, IAT, and UAT tests related to ETC, TMS and systems integration,
- d. providing FAT, SiAT, IAT, and UAT Test Reports related to ETC, TMS and systems integration,
- e. coordinating with Design-Builder to schedule and conduct SiAT, IAT, and UAT tests related to ETC, TMS and systems integration, and
- f. providing training on the installed ETC tolling equipment and TMS subsystems to Concessionaire O & M personnel.

3 Interface Management Process

Design-Builder and TTMS Contractor will be responsible for implementing interface management to identify, control and manage the interfaces and interface points between parties' respective scopes of work related to overall TTMS delivery.

The interface management for the TTMS will be used to ensure project stakeholders are aware and agree with project baseline and ongoing interfaces, and reduce the potential impacts due to interface and integration oversight that could impact or affect the project cost, schedule, design quality, construction quality, or affect the operations and maintenance of the 395 Express Lanes TTMS.

3.1 Interface Protocols

Interface management shall include following protocols:

- a. Design-Builder Representative and TTMS Contractor Representative will identify technical representatives for interface activities throughout all phases of delivery, including design, construction, and testing and commissioning and start-up.
- b. Design-Builder and TTMS Contractor will exchange design information on a regular timely basis to facilitate the total project design.
- c. Interface requirements and deliverables will be documented and placed under appropriate levels of configuration management, and available to Design-Builder and TTMS, as required.
- d. Design-Builder will require TTMS Contractor input and agreement prior to formal submission of deliverables to Concessionaire for components related to civil works infrastructure and TTMS system interface.
- e. Design-Builder and TTMS Contractor will provide a review period of 15 business days for documents exchanged between parties as part of the Interface Plan to allow adequate time for review, comments and updates by other parties of the agreement.
- f. Design-Builder shall provide documentation to TTMS Contractor a minimum of 1 week (5 business days) prior to scheduled reviews.
- g. Design-Builder shall include TTMS Contractor in scheduled project design reviews that may involve Concessionaire relating to TTMS components and/or interfaces.

3.2 Interface Documents

To facilitate coordination and collaboration between the project stakeholders, a series of interface documents will be developed as part of the project scope of work related to TTMS. These documents will ensure information is being exchanged and jointly coordinated throughout the entire project duration. This section identifies these documents and who is responsible for their respective development and delivery. Documents will typically involve multiple submissions, including draft and final versions.

3.2.1 Concessionaire Documents

- a. Concept of Operations for 395 Express Lanes, provided to TTMS Contractor

- b. Business Rules and Requirements for 395 Express Lanes, provided to TTMS Contractor
- c. Technical Requirements, provided to Design-Builder and TTMS Contractor
- d. TTMS Special Provisions and Equipment Sole Source List, provided to Design-Builder and TTMS Contractor

3.2.2 Design-Builder Documents

- a. Design-Builder's Project Schedule (Initial Baseline, Baseline, Regular Updates, Revised Baseline)
- b. Design-Build Plans (Preliminary, Updated, 100% Approved for Construction, Design Changes)
- c. ITS / ETC RSE Asset Database (Preliminary, Regular Updates, Final)
- d. ITS Cabinet Factory Review
- e. ETC Cabinet Factory Review
- f. Toll Site Turnover Plan (Draft and Final)
- g. ITS RSE Turnover Plan (Draft and Final)
- h. WAN Turnover Plan (Draft and Final)
- i. Phased Toll Site Turnover with Checklist
- j. Toll Site Maintenance of Traffic (MOT) Plan (Draft and Final)
- k. ITS Roadside Equipment Level A and B Test Procedures (Draft and Final)
- l. ITS Roadside Equipment Level A and B Test Report (Draft and Final)
- m. Communications Backbone Test Procedures (Draft and Final)
- n. Communications Backbone Test Report (Draft and Final)
- o. Roadway As-Builts (Draft and Final), provided to Concessionaire

3.2.3 TTMS Contractor Documents

- a. ETC Civil Infrastructure Requirements (Preliminary and Final)
- b. Network High Level Design Document (NDHLDD) – part of System Requirements - provide High Level Architecture, sorted out in SRR.
- c. Network Detailed Design Document (NDD), as part of Baseline Design Review
- d. Template for ITS / ETC Roadside Equipment Asset Database
- e. Toll Site Installation Plan (Plan to include Deployment Schedule)
- f. Template for Test Procedures for Level A & B Testing of ITS Roadside Equipment provided to Design-Builder.
- g. Template for Toll Site Turnover Checklist (provided in Appendix B)
- h. TTMS Test Strategy & Plan

- i. Level C Test Procedures for ITS Roadside Equipment
- j. FCC Application for Toll Sites, provided to Concessionaire
- k. FAT Test Procedures (Draft and Final)
- l. FAT Test Report and Results (Draft and Final), provided to Concessionaire
- m. SiAT Test Procedures (Draft and Final)
- n. SiAT Test Report and Results (Draft and Final), provided to Concessionaire
- o. IAT Test Procedures (Draft and Final)
- p. IAT Test Report (Draft and Final), provided to Concessionaire
- q. UAT Test Procedures (Draft and Final)
- r. UAT Test Report (Draft and Final), provided to Concessionaire
- s. Toll Site As-Builts (Draft and Final), provided to Concessionaire

4 Schedule

The Design-Builder shall consult with TTMS Contractor when preparing the Initial Baseline Schedule, and shall include therein the specific work elements that the Design-Builder must complete before TTMS Contractor can commence or complete performance of related elements of the TTMS Work. The Design-Builder shall accommodate the TTMS Contractor's requests regarding scheduling and timing of TTMS Contractor access necessary to complete the TTMS Work. Should there be any changes to the construction deadlines related to TTMS Work in the approved Baseline Schedule, the Design-Builder shall accommodate TTMS Contractor's requests in relation to the revised schedule and use good faith efforts to provide sufficient lead time so as to allow the TTMS Contractor a reasonable opportunity to work around the delay.

Design-Builder will incorporate, track, and update the following key activities in the Baseline Schedule and subsequent updates.

4.1 General

- a. Design-Builder will provide notifications to TTMS Contractor twenty one (21) days prior to date of any design or factory reviews.
- b. Design-Builder will provide documentation to TTMS Contractor at least fourteen (14) days prior to scheduled date of design or factory review.
- c. Design-Builder's Schedule will include interface milestones in support of the TTMS Contractor's work. Appendix C includes a minimum list of indicative interface milestones to be expanded as needed to support Design-Builder's project sequencing and to streamline coordination between Design-Builder's and TTMS Contractor's work.
- d. Turnover of the Communications Network is a predecessor activity to be completed prior to the turnover of ITS Roadside Equipment and turnover of Toll Sites.

4.2 Post Toll Site Turnover Handover Duration for the TTMS Scope of Work

- a. Post Toll Site Handover TTMS Scope of Work shall consist of toll equipment installation and testing scope of work detailed in Sections 2.6.4, 2.6.5, 2.6.6, 2.6.7, and 2.6.8.
- b. Design-Builder will provide turnover of first Toll Site in accordance with Appendix B (Minimum Requirements for Toll Site Turnover Checklist) to the TTMS Contractor who will progress the Post Toll Site Handover TTMS Scope of Work for two hundred ten (210) days before all the work is scheduled to be ready for Service Commencement.
- c. Design-Builder will then provide second Toll Site no later than thirty (30) days after the first Toll Site was turned over to the TTMS Contractor. For each day past thirty (30) days that second Toll Site is not made available to the TTMS Contractor in accordance with Appendix B, the original allowance of two hundred ten (210) days from the handover of first Toll Site shall be increased on a "day by day" basis in the Baseline Schedule until second Toll Site is turned over to the TTMS Contractor ready to commence the Post Toll Site Handover TTMS Scope of Work.

- d. Design-Builder will then provide third Toll Site no later than thirty (30) days after the second Toll Site was turned over to the TTMS Contractor. For each day past thirty (30) days that third Toll Site is not made available to the TTMS Contractor in accordance with Appendix B, the original allowance of two hundred ten (210) days from the handover of first Toll Site shall be increased on a “day by day” basis in the Baseline Schedule until third Toll Site is turned over to the TTMS Contractor ready to commence the Post Toll Site Handover TTMS Scope of Work.
- e. Design-Builder will then provide last Toll Site no later than thirty (30) days after the third Toll Site was turned over to the TTMS Contractor. For each day past thirty (30) days that last Toll Site is not made available to the TTMS Contractor in accordance with Appendix B, the original allowance of two hundred ten (210) days from the handover of first Toll Site shall be increased on a “day by day” basis in the Baseline Schedule until last Toll Site is turned over to the TTMS Contractor ready to commence the Post Toll Site Handover TTMS Scope of Work.
- f. Design-Builder will then provide the remaining ITS roadside equipment no later than thirty (30) days after the last Toll Site was turned over to the TTMS Contractor. For each day past thirty (30) days that the remaining ITS roadside equipment is not made available to the TTMS Contractor, the original allowance of two hundred ten (210) days from the handover of first Toll Site shall be increased on a “day by day” basis in the Baseline Schedule until last ITS roadside equipment is turned over to the TTMS Contractor ready to commence Integration and Level C Testing of the TTMS Scope of Work.
- g. For clarity, the cumulative total of all delays to the turnover of second, third, and last Toll Sites and the remaining ITS roadside equipment will be added to the original two hundred ten (210) days allowance from the date of the first Toll Site handover to establish this revised duration for Post Toll Site Handover TTMS Scope of Work in the Baseline Schedule. The revised duration will establish the basis by which the Design-Build Contractor may request time extensions in accordance with Section 8.2 of Part 4 (General Conditions) if the Post Toll Site Handover TTMS Scope of Work is not completed, through no fault of the Design-Build Contractor, within the revised duration allowance for this work.

Appendix A

Detailed Division of Responsibilities between the Design-Builder and TTMS Contractor

Electronic Toll Collection

Class	Item	Who	Comment
Operational Configuration	Concept of Operations	95Express	Overall framework for the design and operation of the Express Lanes system (tolling and operations). Provided to TTMS designer to facilitate design development process.
Operational Configuration	Toll Site Layout	DB	TTMS Contractor to provide conceptual layout and functional/performance requirements. DB designer to finalize design and configuration based on ETC system requirements and overall civil design.
Civil Works	Utilities	DB	Service connections and utility relocations necessary to install and operate ETC roadside equipment and associated infrastructure (e.g., lighting, cabinets, etc.)
Civil Works	Other Civil Works	DB	Necessary drainage, retaining walls, barrier structures, protective structures, equipment access points and enforcement areas.
Civil Works	Foundations for ETC Gantries and Other Equipment Structures	DB	Footings and conduits necessary for communications and power cabling as per TTMS Contractor and DB-provided equipment requirements.
Civil Works	Foundations for ETC Roadside Cabinets.	DB	Footings and conduits necessary for communications and power cabling as per TTMS Contractor and DB-provided equipment requirements.
Telecom & Cabling	Wide Area Communications Network and Cabling (Communications "Backbone")	DB	Redundant fiber optic telecommunication network along the full length of the Project, connected to all roadside cabinets. Minimum of two connections from this network to Express Lanes Operations Center.
Telecom & Cabling	Gantry to Roadside Cabinet Conduits	DB	All conduits from the junction box(es) located at base of each toll gantry structure to each roadside cabinet.

Electronic Toll Collection

Class	Item	Who	Comment
Telecom & Cabling	ETC Roadside Equipment Cabling	TTMS	All communications cabling for the ETC – from equipment (sensors) mounted on gantries to the junction box in the footing of the gantries, then to the cabinets. Terminations of ETC equipment within roadside cabinets.
Electrical Power & Cabling	ETC Roadside Equipment Power	DB	Power supply and all distribution cabling and conduits necessary for the operation of the ETC roadside equipment and associated cabinets. Includes conduits and cabling from the junction box located in the footing of gantry to the technical shelter and/or cabinets. Placement, layout, and sizing of generators to provide temporary operating power. Final design, supply and installation of associated equipment, including site access.
Electrical Power & Cabling	ETC Roadside Equipment Cabling	TTMS	Power supply cabling required for the operation of the ETC roadside equipment.
ETC Roadside	Technical Cabinets	DB	Placement, layout, and sizing of technical cabinets to accommodate all required equipment and meet TTMS Contractor-provided operating and performance requirements (potentially including temperature control, weather protection, etc.). Placement, layout, and sizing of generators to provide temporary operating power and/or uninterrupted power supply equipment. Final design and construction of approved shelters and associated equipment.
ETC Roadside	Roadside Cabinets (Integrated Roadside Unit , IRU)	DB	Placement, layout, and sizing of cabinets to accommodate all required equipment and meet TTMS Contractor-provided operating and performance requirements, (including temperature control, weather protection, etc.). Final design and construction of approved cabinets. TTMS Contractor will provide IRU to DB for installation.

Electronic Toll Collection

Class	Item	Who	Comment
ETC Roadside	Gantry, Pole and/or Mounting Structures	DB	<p>Placement, layout and installation of:</p> <ul style="list-style-type: none"> ▪ ETC Gantries ▪ Monopoles and/or other mounting structures ▪ Lighting, including power supply <p>Designed per specifications from TTMS Contractor and ETC supplier provided to DB, including clearances, loads, deflection, and fixation requirements.</p>
ETC Roadside	ETC Roadside Equipment	TTMS	<ul style="list-style-type: none"> ▪ Installation of all ETC equipment to be mounted on the gantries. ▪ Installation of all ETC controllers to be installed in the cabinets. ▪ ETC hardware and software installed in the Express Lanes Operations Center ▪ ETC integration and commissioning.
ETC Roadside	Testing and Commissioning	TTMS	All required testing and commissioning, including roadside equipment.
ETC Roadside	Training and Manuals	TTMS	Training and O&M manuals for TTMS Contractor-provided equipment and systems
ETC Roadside	Spare Parts	TTMS	Required spare parts for materials, equipment, and systems supplied and installed by TTMS Contractor.
ETC System	ETC Integration	TTMS	ETC equipment and system testing, including FAT, SiAT, IAT, and UAT.
ETC System	Back Office System	TTMS	Delivery of BOS, including IT infrastructure. Delivery and commissioning of BOS including all manuals.
ETC System	ETC Roadside Equipment to BOS Integration	TTMS	To cover the development, integration and commissioning of the ETC Roadside-BOS integrated systems, and integration to the VDOT Back Office.
Systems Engineering	Network Architecture and Configuration	TTMS	Systems engineering for ETC and TMS systems, including network architecture, configuration management, interface control, and systems integration

Electronic Toll Collection

Class	Item	Who	Comment
Systems Integration	End-to-end Integration	TTMS	Development, integration and commissioning of the ETC system with other Express Lanes operational systems.

Traffic Management System

Class	Item	Who	Comment
Operational Configuration	Concept of Operations	95 Express	Overall framework for the design and operation of the Express Lanes system (TMS and operations). Provided to DB designer to facilitate design development process.
Operational Configuration	TMS Requirements Layout	TTMS	TTMS Contractor to provide functional and performance requirements for TMS system and ITS roadside equipment. DB designer to finalize design and configuration based on TMS system requirements and overall civil design.
VDOT ITS	VDOT ITS Equipment and Structures	DB	Relocation/Replacement of Existing VDOT Roadside Equipment and supporting infrastructure
Civil Works	Utilities	DB	Service connections and utility relocations necessary to install and operate ITS roadside equipment and associated infrastructure (e.g., lighting, cabinets, etc.)
Civil Works	Other Civil Works	DB	Necessary drainage, retaining walls, barrier structures, protective structures, and equipment access points.
Civil Works	Foundations for ITS Structures and Other Equipment Structures	DB	Footings and conduits necessary for communications and power cabling as per TTMS Contractor and DB-provided equipment requirements.
Civil Works	Foundations for ITS Roadside Cabinets.	DB	Footings and conduits necessary for communications and power cabling as per DB-provided equipment requirements.
Telecom & Cabling	Wide Area Communications Network and Cabling (Communications "Backbone")	DB	Redundant fiber optic telecommunication network along the full length of the Project, connected to all roadside cabinets. Minimum of two connections from this network to Express Lanes Operations Center.

Traffic Management System

Class	Item	Who	Comment
Telecom & Cabling	ITS Roadside Cabling	DB	All communications cabling for the ITS devices – from equipment (sensors) mounted on gantries/sign structures/poles/other to the junction box in the footing of the sign structures, then to the cabinets. Terminations of ITS equipment within roadside cabinets.
Electrical Power & Cabling	ITS Roadside Equipment Cabling	DB	Power supply and all distribution cabling and conduits necessary for the operation of the ITS roadside equipment and associated cabinets. Includes conduits and cabling from the junction box located in the footing of gantry to the cabinets. Placement, layout, and sizing of generators to provide temporary operating power and/or uninterrupted power supply equipment. Final design and installation of associated equipment, including site access.
ITS Roadside	Overhead and Dynamic Signage	DB	Quantity, placement, layout, sizing, and configuration of overhead and roadside dynamic message signs. Final design and construction of approved signage. Performance specifications and functional requirements provided by TTMS Contractor to be confirmed and finalized by DB.
ITS Roadside	Closed Circuit TV Cameras (Pan-Tilt-Zoom)	DB	Quantity, placement, layout, sizing, and configuration of CCTV cameras. Final design, installation, and site-testing of approved cameras configuration. Performance specifications and functional requirements provided by TTMS Contractor to be confirmed and finalized by DB.
ITS Roadside	Automated Incident Detectors	DB	Quantity, placement, layout, sizing, and configuration of AID devices. Final design, installation, and site-testing of approved AID configuration. Performance specifications and functional requirements provided by TTMS Contractor to be confirmed and finalized by DB.

Traffic Management System

Class	Item	Who	Comment
ITS Roadside	Microwave Traffic Detectors	DB	Quantities, placement, layout, sizing, and configuration of microwave traffic detectors. Final design, installation, and site-testing of approved sensor/detector configuration. Performance specifications and functional requirements provided by TTMS Contractor to be confirmed and finalized by DB.
ITS Roadside	Lane Control Signs	DB	Quantities, placement, layout, sizing, and configuration of lane control signs and controllers. Final design, installation, and site-testing of approved configuration. Performance specifications and functional requirements and/or minimum quantities provided by TTMS Contractor to be confirmed and finalized by DB.
ITS Roadside	Variable Speed Limit Signs	DB	Quantities, placement, layout, sizing, and configuration of signs and controllers. Final design, installation, and site-testing of approved configuration. Performance specifications and functional requirements provided by TTMS Contractor to be confirmed and finalized by DB.
ITS Roadside	Sign Structures, Pole and/or Mounting Structures	DB	Placement, layout and installation of: <ul style="list-style-type: none"> ▪ ITS Sign Structures ▪ Monopoles and/or other mounting structures ▪ Lighting, including power supply Designed per specifications from TTMS Contractor provided to DB, including clearances, loads, deflection, and specialized installation requirements.
ITS Roadside	Testing and Commissioning	DB	Required testing and commissioning of DB-installed roadside equipment. Includes Level A and Level B Testing.
ITS Roadside	Manuals	DB	O&M manuals for DB-provided equipment and systems

Traffic Management System

Class	Item	Who	Comment
TMS System	TMS Delivery and Integration	TTMS	Delivery of TMS, including IT infrastructure and commissioning at the Express Lanes Operations Center. Integration of ITS Roadside Equipment with BOS and ETC systems. TMS testing, including FAT, SiAT, IAT, and UAT.
ITS Roadside	Testing and Commissioning	TTMS	Required testing and commissioning of DB-installed roadside equipment. Includes Level C Testing. TMS equipment and systems at ELOC to be conducted by TTMS Contractor.
TMS System	Training and Manuals	TTMS	Training and O&M manuals for TTMS Contractor-provided equipment and systems
Systems Engineering	Network Architecture and Configuration	TTMS	Systems engineering for ETC and TMS systems, including network architecture, configuration management, system interface control, and systems integration
System Integration	End-to-end Integration	TTMS	Development, integration and commissioning of the end to end integrated systems.

Key:

DB = Design-Build Contractor

TTMS = TTMS Contractor

95Express = Concessionaire

Appendix B

Minimum Requirements for Toll Site Turnover Checklist

1. Two (2) Toll Gantries with cable trays installed.
2. ETC cabinet, communication and power cabinets installed.
3. All conduits and junction boxes for cabling (communications signal and power) between ETC cabinet and toll gantries installed.
4. All backbone communication and power service cabling for the ETC cabinet, communication (backbone) and power cabinets installed and operational.
5. Commercial power energized and generator installed, tested and available for use.
6. All grounding installed per specifications.
7. Fiber optic backbone installed, terminated and tested and available for use.
8. Layer 3 switch installed and active to next upstream Toll Site ETC Cabinet or Express Lanes Operations Center.
9. A minimum of 500 feet on each side of the toll gantry of final road surface paving level including road marking to enable calibration of gantry mounted sensors and testing vehicles to traverse underneath the gantry at defined speeds.
10. Survey points of the gantry and roadway at the Toll Site provided by Design-Builder
11. Representative ITS Roadside Equipment with Level A and B testing completed and test documentation provided to TTMS, per the ITS Turnover Plan as mutually agreed. Representative ITS Roadside Equipment to include, yet not limited to: two (2) pricing DMS Signs associated with Toll Site (1 for Northbound entry, and 1 for Southbound entry), four (4) Detector Stations adjacent to Toll Site (2 upstream, 2 downstream), two (2) CCTV cameras adjacent to Toll Site (1 upstream, 1 downstream).
12. Minimum requirements related to VOD infrastructure turnover to be confirmed.

Appendix C

Minimum List of TTMS Interface Milestones

1. 100% Design of ITS Roadside Equipment Layout
2. 100% Design of Toll Site
3. 100% Design of Communications Network
4. 1st Toll Site Turnover
5. 2nd Toll Site Turnover
6. 3rd Toll Site Turnover
7. 4th Toll Site Turnover
8. Remaining ITS Roadside Equipment Turnover

EXHIBIT 5.1.1

INSURANCE REQUIREMENTS

1. Definitions:

Design-Builder Insurance Costs - Cost of Design-builder and Subcontractors, including insurance premiums, charges for deductible losses and any other expenses that would be included in the contract price if the OCIP was not in place.

Design-Builder Required Coverage - The insurance coverages that Design-Builder and Subcontractors are required to provide at their own expense in compliance with the 395 Design-Build Contract. Coverage shall be evidenced by a Certificate of Insurance.

Excluded Operations - Operations conducted away from the OCIP Project Site, as well as certain on-site activities including transport, pickup, delivery, or loading or unloading of materials, personnel, parts or equipment or any other items or persons to or from the OCIP Project Site by parties who do not otherwise work at the OCIP Project Site. Each Enrolled Party is required to provide its own insurance for losses arising out of Excluded Operations, and is required to report such claims to its own insurance carriers.

Noncompliance – Design-Builder who fails to enroll any of its Eligible Parties of any tier or fails to obtain pricing net of insurance costs will be responsible for any resulting insurance charges to the 395 Project.

OCIP Project Site - The premises the 395 Project will be located, and including construction lay down areas, as more specifically described in the 395 Design-Build Contract between Concessionaire and Design-Builder. OCIP Project Site shall also mean those areas designated in writing by Concessionaire for performance of the 395 Work. Subject to the notification and other requirements for off-site locations, the term “Site” shall also include (a) locations used for bonded storage of material for the 395 Project approved by Concessionaire, and areas where activities incidental to the 395 Project are being performed by Subcontractors covered by the General Liability policy included in the OCIP, but excluding any permanent locations of any covered contractor.

Owner Controlled Insurance Program (OCIP) - A coordinated master insurance, safety and claim management program, under which Commercial General Liability and Excess Liability, are procured or provided on a project basis for Enrolled Parties for losses arising out of covered operations and completed operations at the OCIP Project Site.

2. Design-Builders’ Responsibilities

Design-Builder and Subcontractors are required to cooperate with Concessionaire, the OCIP Administrator, and the OCIP insurance carrier(s) in all aspects of the OCIP operation and administration. The Design-Builder’s responsibilities include:

- (a) Including OCIP contract provisions and requirements in all tiered Subcontracts; every contractor is required to incorporate the OCIP Insurance provisions into their tiered subcontract(s).
- (b) Assisting in securing the required OCIP enrollment and/or payroll/premium information from their tiered contractors.
- (c) Notifying OCIP Administrator of all Subcontracts awarded by completing the Notice of Subcontract Award.
- (d) Attending all meetings, as required.
- (e) Maintaining and reporting payroll, receipts, labor-hours, or payments made to contractors as required by the OCIP.
- (f) Notifying Concessionaire and the OCIP Administrator immediately of any insurance cancellation or non-renewal (Design-Builder Required Coverage).
- (g) Completing and submitting to Design-Builder and OCIP Administrator the following administrative forms within the time frames specified below:
 - (i) Form 1 - Notice of Subcontract Award Form – Upon execution of tiered Subcontract and prior to starting 395 Work on the OCIP Project Site.
 - (ii) Insurance Safety and Claims Forms –
- (h) Design-Builder and Subcontractors of all tiers are responsible for insurance covering their property including rented, owned, leased or borrowed equipment and tools, and are responsible for reporting property damage claims to such property to their own insurance carrier. Up to \$25,000 per incident may be assessed by Concessionaire against a contractor for any third party property damage.

These requirements are applicable to the Design-Builder and all tiers of Subcontractors that perform 395 Work on the OCIP Project Site.

3. General Liability Owner Controlled Insurance Program

The Concessionaire will provide an Owner Controlled Insurance Program (OCIP) for the 395 Project. The Design-Builder and all subcontractors of every tier are required to participate as described below and in accordance with the Project’s OCIP Manual included as Attachment 1.

- (a) **Owner Controlled Insurance Program and Covered Entities** – The Concessionaire will procure a General Liability Owner Controlled Insurance Program (OCIP) that will provide coverage for the Department, the Concessionaire, the Design-Builder, and the eligible Subcontractors on the 395 Project. The Design-Builder and its contracting parties shall enroll in the Owner Controlled Insurance Program (OCIP). Participation in the OCIP Program is

subject to several Design-Builder Responsibilities’ under the terms of the 395 Design-Build Contract. If the Design-Builder or its contracting parties do not enroll in the OCIP Program before commencing work the Design-Builder shall be in Noncompliance. Design-Builder Insurance Costs include Worker’s Compensation and Employer’s Liability, Automobile Liability, and Excess Liability for the Automobile Liability and Worker’s Compensation and Employer’s Liability will continue to be the responsibility of each party to procure to provide coverage for its interests. Eligible Parties include Subcontractors performing labor or services at the project site, suppliers that perform installation and temporary labor services, and leasing companies providing direct labor.

(b) Excluded Parties – Vendors, suppliers, material dealers and others who solely furnish, transport, pick up, deliver, or carry materials, personnel, parts or equipment to or from the project site will not be enrolled parties to the OCIP. The OCIP will not cover losses arising out of operations conducted away from the project site, nor will it cover certain on-site activities including transport, pickup, delivery, or loading or unloading of materials, personnel, parts or equipment or any other items or persons to or from the project site; by parties who do not otherwise work at the project site. Each enrolled party will be required to provide its own insurance for losses arising out of Excluded Operations, and will be required to report such claims to its own insurance carriers. Companies described below are not intended to be enrolled in the OCIP and will be enrolled in the OCIP only at Concessionaire’s discretion:

- (i) Hazardous materials remediation, removal and/or transport companies and their consultants
- (ii) Any Subcontractor performing Structural Demolition (Structural Demolition is the moving or relocating of load bearing beams, columns, or walls)
- (iii) Architects, engineers, and soil testing engineers, and their consultants
- (iv) Vendors, suppliers, fabricators, material dealers, truckers, haulers, drivers and others who merely transport, pickup, deliver, or carry materials, personnel, parts or equipment or any other items or persons to or from the OCIP Project Site; However, if the parties have a Subcontractor who performs work at the OCIP Project Site they and their Subcontractor may be considered an eligible party
- (v) Subcontractors, and any of their respective tiered Subcontractors, who do not perform any actual labor on the OCIP Project Site
- (vi) Building implosion Subcontractors including Subcontractors involved with blasting or the use of explosives

(c) **OCIP Coverage Amounts** – The OCIP coverages will be set forth in full in the respective policy forms, and the following description of such coverage is not intended to be all-inclusive, nor alter or amend any provision of the actual policies. In matters, if any, in which the said description may be conflicting with the actual policy language, the provisions of the insurance policies shall govern. Subject to the exclusions, limitations, terms and conditions of the policies, OCIP coverage shall be as follows:

- (i) **Commercial General Liability Insurance** in an “occurrence” form, with annual limits for all insureds combined of \$2,000,000 each occurrence limit; \$4,000,000 general aggregate limit and \$4,000,000 products/completed operations aggregate limit. A separate single limit shall apply to the entire five (5) year term beyond the expiration or cancellation date of the policy for the “completed operations extension” for all insureds combined as follows: \$2,000,000 each occurrence limit and \$4,000,000 Products-Completed Operations Aggregate Limit. Coverage shall apply to bodily injury and property damage for operations (including explosion, collapse and underground coverage), elevators, independent contractors, contractual liability for “insured contracts” and covered personal and advertising injury liability offenses.
- (ii) **Excess Liability Insurance** in an occurrence form such that the total shared annual limits for all insureds combined, including the completed operations extension, shall not be less than \$100,000,000 each occurrence and \$100,000,000 annual aggregate limit.
- (iii) The OCIP Policy includes the following terms:
 - Products Completed Operations Extension for 10 years or the Statute of Repose, whichever is less, after substantial completion of the Project.
 - General Aggregate Limit reinstates annually.
 - Products/Completed Operations Aggregate Limit applies once to entire completed operations term.
 - Limits are shared among all Enrolled Parties.

4. Builder’s Risk

Concessionaire shall obtain, pay for and maintain, from the 395 Contract Execution Date until Final Completion of the 395 Work, Builder’s Risk insurance for the 395 Project. The Builder’s Risk insurance shall be on an “all risk” form (or equivalent policy) and shall include insurance against the perils of fire (with extended coverage) and physical loss or damage including, theft, vandalism, malicious mischief, collapse, earthquake, flood, windstorm, falsework, and excavation collapse, but not including insurance for the machinery, tools, or equipment used by Design-Builder in the performance of the 395 Work, or coverage for underground/subsurface

structures and conditions. Concessionaire shall add Design-Builder and its Subcontractors as additional insureds on the Builder's Risk Insurance policy.

Concessionaire shall include a waiver of subrogation against Design-Builder and its Subcontractors in the Builder's Risk Insurance policy. No limitations or requirements are imposed on Concessionaire with respect to the amount of the deductible(s) under the Builder's Risk Insurance policy. Design-Builder shall be responsible to pay, or otherwise satisfy, the deductible portion of any loss, claim or occurrence under the Builder's Risk Insurance policy that arises out of, or relates to, any act, omission, fault, default or negligence of Design-Builder or Design-Builder's employees, agents, Representatives, Subcontractors, or any other Person performing a portion of the 395 Work by, through or under Design-Builder or Design-Builder's failure to fully and correctly perform its obligations under the 395 Contract Documents; provided, however, that Design-Builder's obligation to pay, or satisfy, the deductible portion of a loss, claim or occurrence under the Builder's Risk insurance policy shall not exceed Fifty Thousand and 00/100 Dollars (\$50,000.00) per deductible, per loss, claim or occurrence.

Design-Builder shall, at all times, comply with the terms of the Builder's Risk Insurance policy. In addition, Design-Builder shall be responsible for any losses, claims, damages, costs and expenses are not indemnified under the Builder's Risk Insurance policy due to Design-Builder's failure to perform its obligations under the Builder's Risk Insurance policy.

All insurance proceeds received by Concessionaire for any insured loss under the Builder's Risk Insurance Policy shall be paid into a separate insurance proceeds account and shall be held in trust for the purposes of distribution to Design-Builder and/or its Subcontractors, as applicable, as if they were otherwise named as loss payees on the Builder's Risk Insurance Policy, and in accordance with 395 Design-Build Contract.

5. Contractor's Pollution Liability Policy

Concessionaire shall obtain, pay for and maintain, from the 395 Design-Build Contract Execution Date until Final Completion of the 395 Work, Contractor's Pollution Liability insurance for the Project with limits not less than \$10 million per Occurrence and in the Aggregate. Concessionaire shall add Design-Builder and its Subcontractors as additional insureds on the policy, on a primary and non-contributory basis.

6. Design-Builder Provided Coverage Amounts

Design-Builder shall file certificates of insurance with the Concessionaire evidencing the coverages and limits below:

- (i) **Workers' Compensation and Employer's Liability Insurance**, with statutory workers' compensation (Coverage A) limits and employer's liability (Coverage B) limits of \$1 million for each accident, \$1 million for each employee, with a \$1 million policy limit. If necessary, coverage shall be extended to cover any claims

under the United States Longshoreman’s Act and Harbor Workers Act and Jones’ Act as may be appropriate for the 395 Work.

- (ii) **Automobile Liability Insurance**, with a limit of at least \$1 million combined single limit for bodily injury and property damage covering all owned (if any), non-owned, hired or borrowed vehicles on-site or off.
- (iii) **Umbrella/Excess Liability Insurance** in excess of the underlying limits noted above in Sections 6.(i) and 6.(ii) for Employer’s Liability and Automobile Liability in the amount of: (a) \$100 million per occurrence and \$100 million in the annual aggregate.
- (iv) **Commercial General Liability Insurance** for Excluded Operations with limits not less than:

Each Occurrence	\$1,000,000
General Aggregate	\$2,000,000
Products – Completed/ Operations Aggregate	\$2,000,000
Personal & Advertising Injury	\$1,000,000
Damage to Rented Premises (Each Occurrence)	\$50,000
Medical Expense Limit (any One Person)	\$5,000

- ISO Occurrence Form (CG 00 01 12/04) or equivalent
 - Name 95 Express Lanes, LLC, its parent, owners, subsidiaries and affiliate companies, their officers, agents, managers, employees, directors, subcontractors, joint owners, the Department, and Design-Builder as Additional Insured on a primary and noncontributory basis, including both premises-operations coverage and products/completed operations coverage utilizing endorsements CG 2010 11/85 or equivalent ISO additional insured endorsements.
 - Products/Completed Operations for ten (10) years after substantial completion or the Statute of Repose, whichever is less.
 - The Commercial General Liability Policy (General Aggregate) shall be endorsed to include CG-25-03 – Aggregate Limits of Insurance (per Project), or its equivalent.
- (v) **Architects/Engineers Professional Liability Insurance**, covering Design-Builder’s lead design engineer for acts, errors or omissions arising in connection with the 395 Work for not less than: \$10 million any one claim and \$10 million in the aggregate. Such insurance shall be maintained throughout the duration of any warranty period and for at least three years after the expiration of any warranty period.

7. Design-Builder General Requirements – Design-Builder shall ensure that all insurances required contain the following provisions:

- (i) With the exception of workers' compensation and architect/engineers' professional liability insurance, the Concessionaire shall be named as an additional insured on all policies. Each such policy shall also include the appropriate severability of interest and cross-liability clauses to allow one insured to bring claim against another insured party.
- (ii) All insurance coverages shall be considered primary and non-contributory with regard to other insurances that might be available to Design-Builder or the Concessionaire.
- (iii) All insurers shall waive rights of subrogation against the Concessionaire for any claims covered by insurance required herein.
- (iv) Any inadvertent errors or omissions by Design-Builder in procuring the insurance required herein shall in no way prejudice the rights of the Concessionaire to collect under such policies.
- (v) Any deductibles shall be the sole responsibility of Design-Builder.
- (vi) The insurance shall remain in full force and in effect and will remain in effect for the duration required by the 395 Design-Build Contract; and
- (vii) No insurance coverage will be canceled, renewal refused, or materially changed unless at least thirty (30) days prior written notice is given to Concessionaire.
- (viii) With the exception of Workers' Compensation and Automobile Insurance, the insurance policies shall specifically delete any design-build or similar exclusions that could compromise coverages because of the design-build delivery of the 395 Project.
- (ix) With the exception of Architect/Engineer's Professional Liability and Builder's Risk insurance, Design-Builder shall require all Subcontractors to carry the same insurance required by Part 6 above, in the same amounts as outlined in Part 6 above.
- (x) Design-Builder shall file certificates of insurance with the Concessionaire evidencing the coverages and limits described above within the times required by the 395 Design-Build Contract. The certificates shall be executed by approved insurance companies authorized to do business in Virginia with a minimum "Best Rating" of "B +" or greater, and shall cover the 395 Design-Build Contract.
- (xi) The insurance coverage limits shall not be construed to relieve Design-Builder or Subcontractor(s) of liability in excess of such coverage, nor shall it preclude the Concessionaire from taking such actions as are available to it under any other provision of the 395 Design-Build Contract or otherwise in law.

8. Insurance Closeout Process

Unless otherwise directed by Concessionaire, General Liability/Excess Liability coverage for operations under the OCIP will terminate at Final Completion. General Liability/Excess Liability

coverage for completed operations will commence upon completion of the work according to the OCIP insurance policy provisions and will be provided for ten (10) years or through the applicable statute of repose, whichever is less. Should a Design-Builder or a Subcontractor return to the OCIP Project Site for any reason after their coverage under the OCIP has ceased, the Design-Builder or a Subcontractor is required to provide its own insurance coverage in compliance with the Design-Builder Required Coverage and must provide a Certificate of Insurance evidencing such coverage.

ATTACHMENT 1

GENERAL LIABILITY WRAP-UP INSURANCE PROGRAM OCIP MANUAL

[ATTACHED]

***95 Express Lanes LLC
I-395 Express Lanes Project***

General Liability Wrap-Up Insurance Program

OCIP Manual –

Attachment 1 to 395 Design-Build Contract, Part 4 - Exhibit 5.1.1

January 27, 2017

Prepared by:



3560 LENOX RD NE, SUITE 2400

ATLANTA GA 30326-1298

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1

Introduction

95 Express Lanes LLC (“Concessionaire”) will provide an Owner Controlled Insurance Program (OCIP) for the I-395 Express Lanes Project. The Design-Builder and all subcontractors of every tier are required to participate as described below.

The Design-Builder and each subcontractor of every tier will be required to submit their bids net of insurance and related costs for those coverages provided by the OCIP.

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Definitions

Owner Controlled Insurance Program (OCIP)

A coordinated master insurance, safety and claim management program, under which Commercial General Liability and Excess Liability, are procured or provided on a project basis for Enrolled Parties for losses arising out of covered operations and completed operations at the OCIP Project Site.

OCIP Project Site

The premises where the Project will be located, including construction lay down areas, as more specifically described in the Design-Build Contract between Concessionaire and the Design-Builder. The OCIP Project Site shall also mean those areas designated in writing by Concessionaire for performance of the Work. Subject to the notification and other requirements for off-site locations, the term “Site” shall also include (a) locations used for bonded storage of material for the Project approved by Concessionaire, and areas where activities incidental to the Project are being performed by Contractors covered by the General Liability policy included in the OCIP, but excluding any permanent locations of any covered Contractor.

Eligible Parties

Design-Builder and subcontractors (“Eligible Contractors”) performing labor or services at the OCIP Project Site are eligible to be enrolled in the OCIP. Entities that perform installation for suppliers, temporary labor services, and leasing companies providing direct labor are considered Eligible Parties. Concessionaire reserves the right to enroll or exclude any party at its sole discretion.

Enrolled Parties

Design-Builder and subcontractors (“Enrolled Contractors”) who have been awarded Work, and other parties who have met the OCIP enrollment requirements, and have received an OCIP Certificate of Insurance for the Project from the OCIP Administrator.

Excluded Parties

Parties who have been awarded Work but have not met the OCIP enrollment requirements and other parties as described below.

Companies described below are not intended to be enrolled in the OCIP and will be enrolled in the OCIP only at Concessionaire’s discretion.

1. Hazardous materials remediation, removal and/or transport companies and their consultants
2. Any subcontractor performing Structural Demolition (Structural Demolition is the moving or relocating of load bearing beams, columns, or walls)
3. Architects, engineers, and soil testing engineers, and their consultants
4. Vendors, suppliers, fabricators, material dealers, truckers, haulers, drivers and others who merely transport, pickup, deliver, or carry materials, personnel, parts or equipment or any other items or persons to or from the OCIP Project Site. However, a subcontractor to such parties who performs work at the OCIP Project Site may be considered an Eligible Party
5. Subcontractors, and any of their respective tiered subcontractors, who do not perform any actual labor on the OCIP Project Site
6. Building implosion subcontractors including subcontractors involved with blasting or the use of explosives

Contractor Required Coverage

The insurance coverages that the Design-Builder and subcontractors are required to provide at their own expense in compliance with the Design-Build Contract. Coverage shall be evidenced by a Certificate of Insurance.

Excluded Operations

Operations conducted away from the OCIP Project Site, as well as certain on-site activities including transport, pickup, delivery, or loading or unloading of materials, personnel, parts or equipment or any other items or persons to or from the OCIP Project Site; by parties who do not otherwise work at the OCIP Project Site. Each Enrolled Party is required to provide its own insurance for losses arising out of Excluded Operations, and is required to report such claims to its own insurance carriers.

Contractors' Responsibilities - (Including all Tiers that Perform Work on the OCIP Project Site.)

The Design-Builder and each subcontractor are required to cooperate with Concessionaire, the OCIP Administrator, and the OCIP insurance carrier(s) in all aspects of the OCIP operation and administration. Contractors' Responsibilities include:

- Including OCIP contract provisions and requirements in all tiered subcontracts; every subcontractor is required to incorporate the OCIP Insurance provisions into their tiered subcontract(s).
- Assisting in securing the required OCIP enrollment information from their tiered subcontractors.
- Notifying OCIP Administrator of all subcontracts awarded by completing the Notice of Subcontract Award and Request for Insurance Form.
- Attending all meetings, as required.
- Maintaining and reporting payroll, receipts, labor-hours, or payments made to subcontractors as required by the OCIP.
- Notifying Concessionaire and the OCIP Administrator immediately of any insurance cancellation or non-renewal (Contractor Required Coverage).
- Completing and submitting to Design-Builder and OCIP Administrator the following administrative forms within the time frames specified below:
 - Notice of Subcontract Award – Upon execution of tiered subcontract.
 - Insurance Safety and Claims Forms.
- The Design-Builder and each subcontractor are responsible for insurance covering their property including rented, owned, leased or borrowed equipment and tools, and are responsible for reporting property damage claims to such property to their own insurance carrier.
- Up to \$25,000 per incident may be assessed by Concessionaire against the subcontractor for any third party property damage.

Contractor Bids

- Concessionaire provides insurance as described herein for all Enrolled Parties under the OCIP for Work performed at the OCIP Project Site.
- Design-Builder should exclude from its contract price, and cause subcontractors of every tier to exclude from their subcontract price all costs, including insurance premiums, charges for deductible losses and any other expenses that would be included in the Contract price if the OCIP was not in place.

Change Orders

All change orders should be priced exclusive of insurance costs for OCIP provided coverages.

Noncompliance

If Design-Builder or any subcontractor fails to enroll any of its Eligible Parties of any tier or fails to obtain pricing net of insurance costs as described above in the Contractor Bids paragraph, then that party will be responsible for any resulting insurance charges to the Project.

Closeout Process

- General Liability/Excess Liability coverage for completed operations will commence upon completion of the work according to the OCIP insurance policy provisions and will be provided for ten years or through the applicable statute of repose, whichever is shorter.
- Should the Design-Builder or a subcontractor return to the OCIP Project Site for any reason after their coverage under the OCIP has ceased, contractor/subcontractor is required to provide its own insurance coverage in compliance with the Contractor Required Coverage (as described below), and must provide a Certificate of Insurance evidencing such coverage.



OCIP Insurance Coverage

While the OCIP is intended to provide uniform coverages and limits, the OCIP is not intended to meet all the insurance needs of the Enrolled Parties. It is the responsibility of each party to discuss the OCIP with its insurance agent, consultant, and/or insurer so that proper coverages are maintained.

Commercial General Liability:

	Limits of Liability <u>Shared by all Enrolled Parties</u>
Each Occurrence Limit	\$2,000,000
General Aggregate Limit	\$4,000,000
Products/Completed Operations Aggregate Limit	\$4,000,000
Personal and Advertising Injury Limit	\$2,000,000

- Products Completed Operations Extension for 10 years or the statute of repose, whichever is less.
- General Aggregate Limit reinstates annually.
- Products/Completed Operations Aggregate Limit applies once to entire completed operations term.
- Defense Outside the Limits of Insurance
- Limits are shared among all Enrolled Parties.

Excess Liability:

Limits of Liability Shared by all Enrolled Parties

Each Occurrence Limits	\$100,000,000
General Aggregate Limit	\$100,000,000
Products – Completed Operations Aggregate Limit	\$100,000,000

- Products Completed Operations Extension for 10 years or the statute of repose, whichever is less.
- General Aggregate Limit reinstates annually.
- Products/Completed Operations Aggregate Limit applies once to entire completed operations term.
- Limits are shared among all Enrolled Parties.

Evidence of Coverage

Certificates of Insurance will be issued to each Enrolled Party by the OCIP Administrator evidencing Commercial General Liability and Excess Liability coverages. Subcontractor agrees to be bound by the terms and conditions of the OCIP Policies.

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Contractor Required Coverage

All subcontractors are required to maintain, at their own expense and for the duration of the Contract, the following coverages. These coverages must be maintained to protect Concessionaire, Design-Builder, and the other subcontractors from exposures not insured through the OCIP. The limits shown below are minimum limits and are not intended to limit the subcontractors' liability. **All Certificates of Insurance must be submitted to Design-Builder prior to Mobilization.**

Any deductibles for subcontractor provided insurance will be the responsibility of the subcontractor providing that insurance.

Refer to the Design-Build Contract for specific Design-Builder requirements.

Waiver of Subrogation - All insurance policies paid for and maintained by the Design-Builder or subcontractors for the Work performed for this project must contain a Waiver of Subrogation in favor of 95 Express Lanes LLC, VDOT Design-Builder, their agents, representatives, successors and assigns, their parents, subsidiaries and affiliates or successors and their officers, directors, and employees. This Waiver of Subrogation is required not only with respect to property, liability or other insurance required of the subcontractor in these OCIP requirements, but also with respect to any other property, liability, or other insurance the subcontractor may have in force that may cover the Work. Waiver of Subrogation endorsement for Workers' Compensation must be provided with copy of Certificate of Insurance.

For Enrolled Parties, the below coverage is required for Excluded Operations and other insurance not maintained under the OCIP and when OCIP coverage ceases.

Workers’ Compensation and Employers Liability (US Companies):

For Work performed both at and away from the OCIP Project Site

The OCIP does not provide any coverage for Workers’ Compensation & Employer’s Liability

Part One – Workers’ Compensation

Statutory Limit

Part Two – Employers’ Liability

Bodily Injury by Accident, each accident	\$1,000,000
Bodily Injury by Disease, each employee	\$1,000,000
Bodily Injury by Disease, policy limit	\$1,000,000

Coverage will be extended, as applicable, to cover any claims under the United States Longshore and Harbor Workers’ Compensation Act (33 U.S.C. §§ 901-950) and the Jones Act (46 U.S.C. § 30104).

Commercial General Liability:

Insurance with limits not less than:

Each Occurrence	\$1,000,000
Damage to Rented Premises (Each Occurrence)	\$50,000
Medical Expense Limit (any one person)	\$5,000
Personal & Advertising Injury	\$1,000,000
General Aggregate	\$2,000,000
Products – Completed/ Operations Aggregate	\$2,000,000

- Occurrence Form
- Products/Completed Operations for ten (10) years or the statute of repose, whichever is less.
- The Commercial General Liability Policy (General Aggregate) shall be endorsed to include CG-25-03 – Aggregate Limits of Insurance (per Project), or its equivalent.

Commercial Automobile Liability

For Work performed both at and away from the OCIP Project Site. The OCIP does not provide any coverage for Commercial Automobile Liability

Commercial Automobile Liability insurance shall cover the ownership, maintenance, use, loading and unloading of all vehicles owned, hired or used by, or on behalf of, the subcontractor on or away from the OCIP Project Site. Such insurance will provide coverage not less than that of the standard Commercial Automobile Liability policy in limits not less than:

Combined Single Limit (Each accident)	\$1,000,000
---------------------------------------	-------------

- Contractual liability, if not provided in the policy form, is to be provided by endorsement.
- If hazardous materials or waste are to be transported, the Commercial Automobile Liability policy will be endorsed with the MCS-90 endorsement in accordance with the applicable legal requirements.

Umbrella/Excess Liability:

Umbrella/Excess liability insurance, including Completed Operations, Contractual Liability, Independent Contractors Liability if the subcontractor sublets to another all or any portion of the Work, Personal Injury Liability, Broad Form Property Damage, insuring against bodily injury, personal and advertising injury, and property damage, and all other coverage as specified above; (Employers' Liability, Commercial General Liability and Commercial Automobile Liability. The limits of liability shall not be less than:

Subcontracts less than \$100,000 -

Each Occurrence	\$2,000,000
Aggregate	\$2,000,000

Subcontracts greater than \$100,000 -

Each Occurrence	\$5,000,000
Aggregate	\$5,000,000

- The Employers Liability, Commercial General Liability and Commercial Automobile Liability limit requirement may be met by primary coverage or combination of primary and Umbrella/Excess Liability limits.

- Employers' Liability, Commercial General Liability, and Commercial Automobile Liability follow-form wording.

Professional Liability:

For Work performed both at and away from the OCIP Project Site. The OCIP does not provide any coverage for Professional Liability.

As applicable, subcontractors rendering professional services, including, but not limited to, architects, engineers, traffic consultants, accountants, attorneys, etc. are required to provide professional liability insurance with limits not less than:

Per Claims Made and in the Aggregate	\$1,000,000
--------------------------------------	-------------

The policy coverage shall provide at least five (5) years of extended reporting. Retroactive date must coincide with or precede the first day that professional services are performed.

Certificates of Insurance

All subcontractors shall maintain the insurance in this manual without interruption from the date of commencement of Work throughout the warranty period or as otherwise required in the OCIP manual or contract documents. All subcontractors shall provide Design-Builder with Certificates of Insurance evidencing the coverages, limits, and amendments to the policies prior to commencement of Work on the OCIP Project Site. Coverage must be with an insurance carrier having an A-VII rating or higher from A.M. Best. Concessionaire reserves the right to request copies of insurance policies as well as specific endorsements.

Additional Insureds

Other than workers' compensation, each policy will be endorsed to name the following as Additional Insureds, as their interests may appear: 95 Express Lanes LLC, Design-Builder, VDOT, their agents, representatives, successors and assigns, their parents, subsidiaries and affiliates or successors and their officers, directors, and employees. The additional insured status on the general liability shall be afforded by the current editions of CG2010 and CG2037 (or their equivalents) including coverage for both ongoing and completed operations and a copy of such endorsement must be provided along with subcontractors' Certificate of Insurance described above. For automobile liability additional insured status shall be afforded by the Designated Insured – CA2048 endorsement.

Notice of Cancellation

Subcontractors shall provide a thirty (30) day notice of cancellation, non-renewal or material change to the Concessionaire and the Design-Builder for any changes related to the Contractor Required Coverages.

No Limitation of Liability

The insurance requirements described in the OCIP Insurance Manual are not intended to, and shall not in any way, limit or quantify the contractual or tort liability of any party.

No Release

Concessionaire's procurement and provision of the OCIP shall in no way relieve the subcontractor of any responsibility or liability under this subcontract, any applicable law, statute, regulation or order.

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OCIP Team

Sponsor:	95 Express Lanes LLC
OCIP Administrator:	Marsh USA, Inc. Elene Kasseris, Administrator Elene.kasseris@marsh.com 617-385-0408 Lynn Marquis, Manager Lynn.Marquis@marsh.com 404-995-2736
Claims Contact	Design-Builder Contact: Kathy Potter Phone # 203-439-2938 Email: KMPotter@LaneConstruct.com Concessionaire Contact: Kevin Ginnerty Office Phone # 571-419-6106 Cell Phone # 571-379-6369 Email: kginnerty@transurban.com Concessionaire Contact: David Lyons Office Phone# +61 3 9612 6980 Cell Phone # +61 4 1225 8825 Email: dlyons@transurban.com Marsh Contact: Mike Boone Phone # 404-995-2726 Email: mike.boone@marsh.com

Forward all lawsuits/summons pertaining to the Project to the Risk Management Department.

A. General Liability Claims

- Notify the Construction Supervisor immediately.
- In the event of an accident involving a member of the public (vendor, visitor, etc.) and resulting in bodily injury or property damage, implement appropriate first aid or emergency procedures as soon as possible. Do not admit fault or liability to anyone, including the assumption of any medical or hospital expenses. No one should give statements to anyone other than law enforcement authorities, the Construction Superintendent, or the Design-Builder.
- The Design-Builder shall complete the Report of Accident form. Every alleged injury or damage must be reported. Include as much detail as possible, claimant information, photos, diagrams, witnesses, and any other information that will be helpful in handling the claim.

B. Other

- In the event a subcontractor is served a summons involving a claim related to the Project, the Concessionaire and/or Marsh should be contacted immediately and a copy of the summons forwarded as soon as possible. If no other accident report was completed for the alleged injury or damage, one should be completed using any information the subcontractor can develop regarding the claim.

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Claim Reporting

If injuries to the public or damage to property occur **within** the construction perimeter and are related to the construction work, a General Liability Claim Reporting form (Attachment A) must be completed within 24 hours and reported to the Design-Builder with a copy to: Mike Boone at Marsh Inc. The Insurance Company will be responsible for all claim investigation and handling.

Claims should be reported to the following:

1. Concessionaire Contact
2. Design-Builder Contact
3. Marsh Contact

General Liability Incidents **outside** of the construction perimeter should be reported to your non-OCIP insurer.



Form 1 – Notice of Subcontract Award/Enrollment Form

This form is provided as a communication tool to be completed in order to notify Marsh of a subcontract and to enroll a contractor or subcontractor into the program.

RETURN COMPLETED FORM TO

Company Name: **Marsh USA Inc.**

Attention: Elene Kasseris / Lynn Marquis

Address: _____

Elene.kasseris@marsh.com / lynn.marquis@marsh.com

PROJECT IDENTIFICATION

Awarding Contractor: _____

Project Name: I-395 Express Lanes Project

Project Sponsor: 95 Express Lanes LLC

INFORMATION ABOUT THE AWARDED SUBCONTRACTOR

Subcontractor's Legal Name: _____

Federal ID Number: _____

Probable Start Date: _____

Probable Completion Date: _____

Scope of Work: _____

Legal Address: _____

City: _____ State: _____ Zip code: _____

SUBCONTRACTOR'S PRIMARY CONTACT

Contact's Name: _____

Phone Number: _____ Mobile Number: _____

Fax Number: _____ E-Mail Address: _____

Attachment A

General Liability Claim Reporting – Email completed form to Mike.Boone@Marsh.com

Name of person reporting For Incident Only (LetRest)

Yes No

Address information

Name and address of the company	Policy number	Site code (if applicabl
<input type="text"/>	<input type="text"/>	<input type="text"/>
Contact Name	Telephone number of loss location	
<input type="text"/>	<input type="text"/>	

Accident Information

Date of accident	Time of accident	Address where incident occurred	County
<input type="text"/>	<input type="checkbox"/> am <input type="checkbox"/> pm	<input type="text"/>	<input type="text"/>

Please give a description of the incident

Were authorities contacted? (police, fire, ambulance)	If yes, who
<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="text"/>

Was a report number given?	If yes, list number
<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="text"/>

Were any safeguards provided? OSHA number	Were they in use at the time of the incident?	In the event of a fatality, what is your
<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="text"/>

Claimant Information

What is the name and address of the injured party

Social Security Number

Date of Birth

Marital status (check one)

- Single
 Divorced
 Separated
 Married
 Widowed

Home phone

Contact at home or work

- Home
 Work

How many dependents

Work phone

Is the injured party

- Male
 Female

Injury information:

What part of the body

Were any injuries incurred?

- Yes
 No

Give a description of the injuries.

What treatment was given (please check)

- No medical treatment
 Minor on-site remedies
 Minor clinic or hospitals
 Emergency evaluation
 Hospitalization for more than 24-hours

Name and address of treating physician

Name and address of treating hospital / clinic

Phone number of treating physician

Phone number of treating hospital / clinic

Witness Information

Name and address of a witness to the incident

Phone number where witness can be reached

Anything related to the incident you would like to add

other similar liens arising out of or in connection with the performance by Contractor or any of the Subcontractors of the 395 Work under the 395 Contract Documents; and releases, assignments and waivers from all Subcontractors that would otherwise have had the right to place a lien or encumbrance with respect to and on the 395 Project, the 395 Project Right of Way and any and all interests and estates therein, and all improvements and materials placed on the 395 Project Site, for all services done and materials furnished to the date hereof have been obtained in such a form as to constitute an effective defense against the assertion of all such liens and encumbrances under the law of the Commonwealth of Virginia, if and to the extent required under the 395 Contract Documents.

The Commonwealth of Virginia may rely on this Interim Lien Waiver as a third-party beneficiary thereof.

Signed this ____ day of 20____.

By: _____
Name:
Title:

Subscribed and sworn to before me this ____ day of 20_____.

to place a lien or encumbrance with respect to and on the 395 Project, the 395 Project Right of Way and any and all interests and estates therein, and all improvements and materials placed on the 395 Project Site, for all services done and material furnished have been obtained in such a form as to constitute an effective defense against the assertion of all such liens and claims under the laws of the Commonwealth of Virginia.

Executed copies of all such releases, assignments and waivers obtained by Contractor and not previously delivered to Concessionaire are attached hereto.

The Commonwealth of Virginia may rely on this Final Lien Waiver as a third-party beneficiary thereof.

Signed this ____ day of 20____.

By: _____
Name:
Title:

Subscribed and sworn to before me this ____ day of 20_____.

Notary Public in and for
Said County and State

EXHIBIT 10.8
COMPREHENSIVE AGREEMENT DISPUTE RESOLUTION PROVISION

ARTICLE 21.
DISPUTE RESOLUTION

Section 21.01 General

(a) The parties will attempt to resolve any Disputes arising out of this Agreement at the Project level through good faith negotiations between designated representatives. The Department, the Concessionaire, the Design-Build Contractor, all subcontractors and the FHWA are firmly committed to the following principles:

(i) trust and open communications are encouraged and expected by all participants;

(ii) all of the participants move quickly to address and resolve issues at the lowest possible level by approaching problems from the perspectives and needs of all of the participants involved;

(iii) all of the participants have identified common goals and respect each other's individual goals and values; and

(iv) all of the participants create an atmosphere conducive to cooperation and teamwork in finding better solutions to potential problems and issues at hand.

(b) If the Dispute cannot be resolved at the Project level in accordance with Section 21.01(a) above, then either party will have the right to submit the Dispute to the Steering Committee for resolution. The Steering Committee will convene a meeting within ten Days of notification by either party of any unresolved Dispute. After the meeting has convened, the Steering Committee will have seven Days to resolve the Dispute.

(c) If the Steering Committee has not resolved the Dispute pursuant to Section 21.01(a)(i), then either party may request non-binding mediation of the Dispute or any other form of alternative dispute resolution process that is mutually acceptable to both parties. If the Dispute has not been resolved within 60 Days after the initiation of mediation proceedings or, if both parties do not agree to mediation, the other form of alternative dispute resolution process, either party will have the right to proceed in accordance with Section 21.02. The first face-to-face meeting between the mediator and both parties will be deemed to be the initiation of mediation.

(d) Any of the time periods specified in this Section 21.01 may be extended by mutual agreement of the parties.

Section 21.02 Litigation; Venue

(a) All litigation between the parties arising out of or pertaining to this Agreement or its breach will be filed, heard and decided in the Circuit Court for the City of Richmond, Virginia, Division I, which will have exclusive jurisdiction and venue.

(b) As permitted by Section 56-569 of the Code of Virginia, the parties agree that any requirement that the State Corporation Commission issue a declaratory judgment regarding a material default (as defined in Section 56-568 of the Code of Virginia) pursuant to such Section 56-569, as a prerequisite to exercising any remedy set forth in this Agreement or such Section 56-569, will not apply to this Agreement.

(c) Satisfaction of the procedures set forth in Section 21.01 will be a condition precedent to instituting a legal action in court; *provided*, that if the Department determines, in its sole discretion, that a Dispute involves an issue that poses an immediate and serious threat to the public health, safety and welfare, the Department will be entitled to take whatever steps it deems appropriate and to initiate litigation of the matter in court without first submitting the Dispute to the dispute resolution procedures of this Agreement.

Section 21.03 Conduct During Pendency of Dispute

(a) Notwithstanding anything to the contrary in this Agreement, neither party will be required to await the resolution of dispute proceedings regarding the reasons for terminating this Agreement before exercising such party's termination rights.

(b) Pending final resolution of any Dispute (except a Dispute regarding the cause for terminating this Agreement), the parties will continue to fulfill their respective obligations under this Agreement.

Section 21.04 Costs of Dispute Resolution

(a) Each party will bear its own attorneys' fees and costs in any Dispute or litigation arising out of or pertaining to this Agreement, and no party will seek or accept an award of attorneys' fees or costs, except as otherwise expressly provided herein.

(b) The fees and costs of any mediator will be borne equally by each party.

EXHIBIT 12.1.1

FORM OF 395 DIRECT AGREEMENT

THIS DIRECT AGREEMENT (this “**Agreement**”), dated as of [Month] __, 201_, is made by and among [DB Contractor], a [STATE] corporation (the “**Consenting Party**”), 95 EXPRESS LANES LLC, a Delaware limited liability company (the “**Assignor**”), and U.S. BANK NATIONAL ASSOCIATION, in its capacity as collateral agent for the Secured Parties (in such capacity, the “**Collateral Agent**”).

A. The Assignor is developing, designing, financing and constructing the Project, and will manage, operate, maintain and collect tolls on the HOT Lanes pursuant to a long-term concession arrangement granted to the Assignor by the Virginia Department of Transportation pursuant to the Comprehensive Agreement.

B. The Assignor and the Consenting Party have entered into the Turnkey Lump-Sum Design-Build Contract Relating to the 395 HOT Lanes Project, dated as of [Month] __, 2017 (as amended, supplemented, modified and in effect from time to time, the “**Assigned Agreement**”).

C. Pursuant to that [certain Indenture of Trust, dated as of [Month] __, 2017, between the Virginia Small Business Financing Authority, a public body corporate and a political subdivision of the Commonwealth of Virginia, as Issuer (the “**Issuer**”), and U.S. Bank National Association, in its capacity as Trustee (the “**Trustee**”), the Issuer has authorized the issuance of [\$] Virginia Small Business Financing Authority Senior Lien Revenue Bonds ([Project]), Series 201_, the proceeds from the sale of which will be loaned to the Assignor pursuant to the terms of a Loan Agreement, dated as of [Month] __, 2017, between the Issuer and the Assignor, to be used to finance a portion of the costs of the Project.

D. The Assignor, the Trustee and the Collateral Agent have entered into the Collateral Agency and Account Agreement, dated as of [Month] __, 2017 (as amended, restated, modified, supplemented, and in effect from time to time, the “**Collateral Agency Agreement**”), pursuant to which the Collateral Agent agrees to administer and enforce the Security Documents (as such term is defined in the Collateral Agency Agreement) for the benefit of the Secured Parties (as such term is defined in the Collateral Agent Agreement, and herein referred to as the “**Secured Parties**”).

E. The Assignor and the Collateral Agent have entered into the Security Agreement, dated as of [Month] __, 2017 (as amended, restated, modified, supplemented, and in effect from time to time, the “**Security Agreement**”), pursuant to which, for the benefit of the Secured Parties, the Assignor has pledged and assigned to the Collateral Agent, and granted to the Collateral Agent a lien on and a security interest in, among other things, all of the Assignor’s right, title and interest in, to and under the Assigned Agreement.

F. The Consenting Party is willing to consent to such pledge and assignment of, and the granting of a first-priority lien on and security interest in, to and under all of the Assignor’s

right, title and interest in the Assigned Agreement on the terms and conditions of this Agreement and it is a requirement under the Financing Documents (as such term is defined in the Collateral Agency Agreement and hereinafter referred to as the “**Financing Documents**”) that the Assignor and the Consenting Party execute and deliver this Agreement.

In consideration of the foregoing and of other good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, the parties hereby agree as follows:

1. Definitions.

Each capitalized term used and not otherwise defined herein shall have the meaning assigned to such term (whether directly or by reference to another document or agreement) in the Assigned Agreement.

2. Consent to Assignment.

(a) The Consenting Party hereby irrevocably consents to the assignment by the Assignor of all its right, title and interest in, to and under the Assigned Agreement to the Collateral Agent as collateral security for the obligations of Assignor secured by the Security Agreement (the “**Secured Obligations**”) as and to the extent provided in the Security Agreement and any subsequent assignments by the Collateral Agent upon and after the exercise by the Collateral Agent of the Collateral Agent’s rights and enforcement of its remedies under the Financing Documents and the Security Agreement, at law, in equity, or otherwise.

(b) The Assignor agrees that it shall remain liable to the Consenting Party for all obligations of the Assignor under the Assigned Agreement. The Consenting Party agrees that (i) except as otherwise provided herein, it shall look only to the Assignor for the performance of such obligations and (ii) it shall be and remain obligated to the Assignor to perform all of the Consenting Party’s obligations under the Assigned Agreement in accordance with its terms and conditions, *provided* that the Consenting Party’s obligations under the Assigned Agreement shall in all cases be subject to the Consenting Party’s rights and defenses under the Assigned Agreement, except to the extent expressly modified by this Agreement.

(c) The Consenting Party acknowledges and agrees, notwithstanding anything to the contrary contained in the Assigned Agreement, that none of the following (to the extent not inconsistent with the terms of this Agreement) shall constitute, in and of itself, a default by the Assignor under the Assigned Agreement or shall result in a termination thereof: (i) the assignment of the Assigned Agreement pursuant to the Security Agreement; (ii) the development or operation and maintenance of the Project by the Collateral Agent following the occurrence and continuance of an event of default under the Financing Documents and the Security Agreement; (iii) foreclosure or any other enforcement of the Security Agreement by the Collateral Agent; (iv) acquisition of the rights of the Assignor under the Assigned Agreement in foreclosure by the Collateral Agent or any third party (or acceptance of an absolute assignment of the Assigned Agreement in lieu of foreclosure); or (v) assignment of the Assigned Agreement

by the Collateral Agent following a purchase in foreclosure or following an absolute assignment thereof in lieu of foreclosure.

3. Representations and Warranties.

The Consenting Party hereby represents and warrants to the Collateral Agent and each of the Secured Parties that:

(a) The Consenting Party is a corporation duly organized and validly existing under the laws of the State of [TBD] and in good standing and qualified in all other jurisdictions where failure to so qualify or be in good standing could materially adversely affect the ability of the Consenting Party to perform its obligations under this Agreement and the Assigned Agreement and has all requisite power and authority as a limited liability company to conduct its business, to own its properties, and to execute and deliver, and to perform its obligations under, this Agreement and the Assigned Agreement.

(b) The execution and delivery by the Consenting Party of the Assigned Agreement and this Agreement and the performance by the Consenting Party of the Assigned Agreement and this Agreement and the consummation of the transactions contemplated hereby and thereby (i) have been duly authorized by all necessary limited liability company action on the part of the Consenting Party, (ii) do not and will not require any consent or approval of any member of, or holder of interests in, the Consenting Party or any other Person which has not been obtained, (iii) do not and will not result in any violation of, breach of or default under any term of its formation or governance documents, or of any contract or agreement to which it is a party or by which it or its property is bound, or of any license, permit, franchise, judgment, writ, injunction, decree, order, charter, law, ordinance, rule or regulation applicable to it, the Project, the Assigned Agreement or this Agreement, except for any such violations which, individually or in the aggregate, would not adversely affect the performance by the Consenting Party of its obligations under the Assigned Agreement and this Agreement and (iv) do not and will not result in, or require, the creation or imposition of any mortgage, deed of trust, pledge, lien, security interest or other charge or encumbrance of any nature (other than as is contemplated by this Agreement) upon or with respect to any of the properties now owned or hereafter acquired by the Consenting Party.

(c) All authorizations, permits, approvals, consents, orders and waivers or any other action by, registration, declaration or filing with, any governmental or other official agency or any third party (collectively, the “**Approvals**”), necessary or desirable for the due execution, delivery and performance by the Consenting Party of this Agreement and the due execution, delivery and (to the extent required by the Assigned Agreement to be obtained prior to the date hereof) performance of the Assigned Agreement, have been obtained and are in full force and effect.

(d) This Agreement and the Assigned Agreement have been duly executed and

delivered on behalf of the Consenting Party, are in full force and effect and are legal, valid and binding obligations of the Consenting Party, enforceable against the Consenting Party in accordance with their respective terms, except as the same may be limited by bankruptcy, insolvency, reorganization or other similar laws relating to or affecting the enforcement of creditors' rights generally and by general principles of equity.

(e) There is no legislation, litigation, action, suit, proceeding or investigation pending or, to the best of the Consenting Party's knowledge after due inquiry, threatened against the Consenting Party before or by any court, administrative agency, arbitrator or governmental authority, body or agency which, if adversely determined, individually or in the aggregate, (a) could adversely affect the Approvals, or (b) could have a material adverse effect on the ability of the Consenting Party to perform its respective obligations under the Assigned Agreement or this Agreement.

(f) The Consenting Party is not in default of any of its respective obligations under the Assigned Agreement. The Consenting Party has complied with all conditions precedent to its obligations to perform under the Assigned Agreement. To the best of Consenting Party's knowledge, no event or condition exists which would, either immediately or with the passage of any applicable grace period or giving of notice, or both, enable either the Consenting Party or the Assignor to terminate or suspend any of its obligations under the Assigned Agreement. The Assigned Agreement has not been amended, modified or supplemented in any manner.

(g) The Consenting Party has no notice of, and has not consented to, any previous assignment of the Assignor's interest in the Assigned Agreement to any other person or entity, and the Assignor is not in default under any material covenant or obligation under the Assigned Agreement, and no such default has occurred prior to the date hereof. After giving effect to the assignment by the Assignor of the Assigned Agreement to the Collateral Agent pursuant to the Security Agreement, and after giving effect to the acknowledgment of and consent to such assignment by the Consenting Party, there exists no event or condition which would constitute a default, or which would, with the giving of notice or lapse of time or both, constitute a default under the Assigned Agreement. The Consenting Party has no present claim against the Assignor or lien upon the Project arising out of the Consenting Party's performance of any work or service under the Assigned Agreement.

(h) The Consenting Party has duly performed and complied with all covenants, agreements and conditions contained in the Assigned Agreement and this Agreement required to be performed or complied with by it on or before the date hereof, and none of the Assignor's rights under the Assigned Agreement have been waived.

4. Rights of the Secured Parties.

The Consenting Party hereby agrees as follows:

(a) Exercise of Rights. The Collateral Agent and any designee or assignee thereof shall be entitled, to the extent permitted by the Security Agreement, to exercise on behalf of the

Secured Parties any and all rights of the Assignor under the Assigned Agreement in accordance with its terms, and the Consenting Party shall comply in all respects with such exercise. Without limiting the generality of the foregoing, the Collateral Agent and any designee or assignee thereof shall have the full right and power, to the extent permitted by the Security Agreement and subject to the terms of the Intercreditor Agreement (as defined in the Collateral Agency Agreement), to enforce directly against the Consenting Party all obligations of the Consenting Party under the Assigned Agreement and otherwise to exercise all remedies thereunder and to make all demands and give all notices and make all requests and take all actions required or permitted to be made by the Assignor under the Assigned Agreement; *provided*, (1) that nothing herein shall require the Collateral Agent or such designee or assignee to cure any default of the Assignor under the Assigned Agreement or to perform any act, duty or obligation of the Assignor under the Assigned Agreement, and (2) the Consenting Party's obligations under the Assigned Agreement shall in all cases be subject to the Consenting Party's rights and defenses under the Assigned Agreement, except to the extent expressly modified by this Agreement.

(b) Right to Cure. The Consenting Party shall not cancel or terminate the Assigned Agreement, or suspend its performance or any of its obligations thereunder, on account of any failure, default or breach of the Assignor, or any other event or condition, without first giving written notice of such default to the Collateral Agent or its assignee or designee pursuant to the applicable provisions of the Assigned Agreement and affording such party the same period of time afforded the Assignor under the Assigned Agreement to perform any obligation required of the Assignor or necessary and proper to cure such default; *provided* that if such default is a non-monetary default and the nature of the default is such that the same cannot be cured within such time period, the Consenting Party shall allow such longer time period as is required (not to exceed thirty (30) additional days) beyond the time period in the Assigned Agreement so long as Collateral Agent or its designee or assignee has commenced and is diligently pursuing a cure to such default. If possession of the Project is necessary to cure any non-monetary default, failure, breach or other event or condition, and so long as there are no uncured monetary defaults, and the Collateral Agent has commenced foreclosure or other appropriate proceedings to obtain possession of the Project, the Collateral Agent shall be allowed a reasonable time (not to exceed a total of sixty (60) additional days beyond the time period in the Assigned Agreement) to complete such proceedings before the time periods specified herein for curing a failure, default, breach or other event or condition commences. If the Collateral Agent is prohibited from curing any non-monetary failure, default, breach or other event or condition by any process, stay or injunction issued by any governmental authority or pursuant to any bankruptcy or insolvency proceeding or other similar proceeding involving the Assignor, and there are no uncured monetary defaults, then the time periods specified in the Assigned Agreement for curing such failure, default, breach or other event or condition shall be extended a reasonable time (not to exceed a total of one hundred eighty (180) additional days beyond the time period in the Assigned Agreement) during the pendency of such prohibition; *provided, however*, that Collateral Agent shall reimburse Consenting Party for any additional costs resulting from the additional days allowed beyond the time period in the Assigned Agreement.

(c) Substitute. In the event that the Collateral Agent (or its designee or assignee pursuant to Section 4(e)) succeeds to the Assignor's interest under the Assigned Agreement, whether by foreclosure or otherwise, and the Collateral Agent or its designee or assignee assumes liability for all of the Assignor's obligations under the Assigned Agreement, and cures any outstanding monetary defaults, the Collateral Agent or its designee or assignee shall be substituted for the Assignor under the Assigned Agreement and the Consenting Party shall recognize the substitute and will continue to perform its obligations under the Assigned Agreement in favor of the substitute party. Upon the effective date of the substitution, the Assignor shall be released from its obligations arising under the Assigned Agreement thereafter, and cease to be a party to, the Assigned Agreement to the extent of such assignment.

(d) New Assigned Agreement. In the event that (i) the Assigned Agreement is rejected by a trustee or debtor-in-possession in any bankruptcy or insolvency proceeding involving the Assignor or (ii) the Assigned Agreement is terminated as a result of any bankruptcy or insolvency proceeding involving the Assignor, and if within sixty (60) days after such rejection or termination, the Collateral Agent (or its designee or assignee pursuant to Section 4(e)) shall so request and shall certify in writing to the Consenting Party that it intends to perform the obligations of the Assignor as and to the extent required under the Assigned Agreement and cure any outstanding monetary defaults, the Consenting Party shall execute and deliver to the Collateral Agent or such designee or assignee such a new agreement ("**new Assigned Agreement**"), pursuant to which the Consenting Party shall agree to perform the obligations contemplated to be performed by the Consenting Party under the original Assigned Agreement and which shall be for the balance of the remaining term and for the obligations and services remaining to be performed under such original Assigned Agreement before giving effect to such rejection or termination and shall contain the same conditions, agreements, terms, provisions and limitations as such original Assigned Agreement, *provided* that the rights and obligations of the Consenting Party under the new Assigned Agreement shall be equitably adjusted to reflect the effects of the rejection or termination (including any passage of time between the rejection or termination and the effectiveness of the new Assigned Agreement).

(e) Right to Assignment. The Collateral Agent or its assignee or designee may assign any rights and interests it may have as substitute party pursuant to Section 4(c) hereof or as a party to a new Assigned Agreement pursuant to Section 4(d) hereof to any purchaser or transferee of the Project, if such purchaser or transferee shall assume all of the obligations of the Assignor under the Assigned Agreement in writing, and the Collateral Agent or its assignee or designee shall be relieved of all its obligations arising under the Assigned Agreement upon such assignment and assumption; *provided however*, that the Consenting Party shall have reasonably determined that the purchaser or transferee has the technical and financial capability to perform the Assignor's obligations under the Assigned Agreement, or if a proposed purchaser or transferee lacks such technical capability, such purchaser or transferee shall have contracted with advisers who possess such capability. The Consenting Party hereby agrees to be bound by any such assignment and assumption.

(f) No Obligations. Nothing herein shall require the Collateral Agent or its assignee or designee to perform any of the Assignor's obligations or cure any default under the Assigned Agreement except during any period in which the Collateral Agent or its assignee or designee is a substitute party pursuant to Section 4(c) hereof or has entered into a new Assigned Agreement pursuant to Section 4(d) hereof, in which case the obligations of such party shall be those of the Assignor under the Assigned Agreement. In the event that the Collateral Agent or its assignee or designee so elects to perform any such obligations, other than in connection with Section 4(c) or 4(d), it shall not have any personal liability to the Consenting Party for the performance of the Assignor's obligations under the Assigned Agreement, it being understood that the sole recourse of the Consenting Party shall be limited to the entire interest of the Assignor and its assets.

(g) No Consent Required. A foreclosure or other exercise of remedies under the Security Agreement or any sale thereunder by the Collateral Agent or its assignee or designee, whether by judicial proceedings or under any power of sale contained therein, or any conveyance from the Assignor to the Collateral Agent or such assignee or designee, in lieu thereof, shall not in any event require the consent of the Consenting Party.

(h) Limitation on Amendments. The Consenting Party shall not, without the prior written consent of the Collateral Agent, enter into any amendment, supplement or other modification of the Assigned Agreement except pursuant to any Scope Change Order or Work Order entered into under the Assigned Agreement or otherwise as expressly contemplated by the Assigned Agreement or the Comprehensive Agreement.

(i) Notices. The Consenting Party shall deliver to the Collateral Agent at the addresses set forth on the signature pages hereof, or at such other address as the Collateral Agent may designate in writing from time to time to the Consenting Party, concurrently with the delivery thereof to the Assignor, a copy of each notice of default and each other similar material notice or demand or request given by the Consenting Party pursuant to the Assigned Agreement, and the applicable time periods under Section 4(b) hereof shall commence to run against the Collateral Agent only from the date such notice is provided.

5. Payments Under the Assigned Agreement.

If instructed to do so by the Collateral Agent in writing, the Consenting Party will pay all amounts thereafter payable by it under the Assigned Agreement directly to the Collateral Agent, on behalf of the Secured Parties, pursuant to the payment provisions in the Assigned Agreement to such person or account as shall be specified from time to time by the Collateral Agent to the Consenting Party in writing. By its acceptance and agreement to this Agreement, the Assignor, for itself and its successors and permitted assigns, consents to the making by the Consenting Party of payments as provided in the previous sentence.

6. Miscellaneous.

(a) Notices. All notices to be given under this Agreement shall be in writing and shall be delivered personally, sent by certified or registered first-class mail, postage prepaid, or dispatched by facsimile or courier to the intended recipient at its address as set forth on the signature pages below. All payments to be made under this Agreement shall be made by wire

transfer of immediately available funds or check representing immediately collectible funds to the account or address of the intended recipient as set forth on the signature pages hereto, unless the recipient has given notice of another address or account for receipt of notices or payments.

(b) Governing Law; Jurisdiction. This Agreement shall be governed by and construed in accordance with the laws of New York. The Consenting Party and the Collateral Agent, on its own behalf and on the behalf of any assignee or designee and their respective permitted successors and assigns hereunder, hereby irrevocably waive all right of trial by jury in any action, proceeding or counterclaim arising out of or in connection with this Agreement or any matter arising hereunder.

(c) Headings. The headings of the several sections and subsections of this Agreement are inserted for convenience only and shall not in any way affect the meaning or construction of any provision of this Agreement.

(d) Severability. In case any provision in or obligation under this Agreement shall be invalid, illegal or unenforceable in any jurisdiction, the validity, legality and enforceability of the remaining provisions or obligations, or of such provision or obligation in any other jurisdiction, shall not in any way be affected or impaired thereby.

(e) Amendment, Waiver. Neither this Agreement nor any of the terms hereof may be terminated, amended, supplemented, waived or modified except by an instrument in writing signed by the Consenting Party and the Collateral Agent (at the direction of the Secured Parties).

(f) Successors and Assigns. This Agreement shall be binding upon the Consenting Party and its permitted successors and assigns and shall inure to the benefit of the Collateral Agent, on behalf of the Secured Parties, its permitted assignees, designees and their respective permitted successors and assigns, and any holder of any debt that amends, restates or refinances the debt of the Assignor relating to the Financing Documents. Nothing contained in this Agreement is intended to limit the right of any Secured Party to assign, transfer, or grant participations in its rights in its respective Secured Obligations and the Financing Documents.

(g) Further Assurances. The Consenting Party hereby agrees to execute and deliver all such instruments and take all such action as may be necessary to effectuate fully the purposes of this Agreement.

(h) Counterparts. This Agreement may be executed in any number of counterparts and by the different parties hereto on separate counterparts, each of which when so executed and delivered shall be an original, but all of which shall together constitute one and the same instrument.

[THE REMAINDER OF THIS PAGE HAS BEEN INTENTIONALLY LEFT BLANK.]

IN WITNESS WHEREOF, each of the undersigned by its officer duly authorized has caused this Agreement to be duly executed and delivered as of the first date written above.

[DB Contractor],
a [STATE] corporation

By: _____

Name: _____

Title: _____

Address for Notices:

95 EXPRESS LANES LLC,
a Delaware limited liability company

By: _____

Name: _____

Title: _____

Address for Notices:

95 Express Lanes LLC
6440 General Green Way
Alexandria, VA 22312

Attention: 395 Project Director

Telephone: (571) 419-6100

Facsimile: (571) 419-6101

With a copy to:

Transurban (USA) Inc.

7900 Westpark Drive

Suite T500

Tysons, VA 22102

Attention: Head of Delivery

Telephone:

Facsimile:

U.S. BANK NATIONAL ASSOCIATION,
as Collateral Agent

By: _____

Name: _____

Title: _____

Address for Notices:

U.S. Bank National Association
1021 East Cary Street, Suite 1850
Richmond, Virginia 23219

Attention: Stephanie E. Haysley

Telephone: (804) 343-1567

Facsimile: (804) 343-1572

PART 5
DIVISION 1 AMENDMENTS TO THE STANDARD SPECIFICATIONS

PART 5

Division I Amendments to the Standard Specifications

These Division I Amendments supersede Division I of the Standard Specifications

SECTION 101—DEFINITIONS OF ABBREVIATIONS, ACRONYMS, AND TERMS

101.01—Abbreviations and Acronyms

Abbreviations and Acronyms shall be as stated in Section 101.01 of the Standard Specifications.

101.02—Terms

In these Division I Amendments to the Standard Specifications and other 395 Contract Documents, the following terms and pronouns used in place of them shall be interpreted as follows, except that if such terms and pronouns are defined in Part 3 (395 Design-Build Contract), Part 4 (395 General Conditions), or Part 2 (395 Project Information and Technical Requirements), such definitions shall govern:

-A-

Alkali Soil. Soil in which total alkali chlorides calculated as sodium chloride are more than 0.10 percent based on total solids.

-B-

Backfill. Material used to replace, or the act of replacing, Material removed during construction; may also denote Material placed, or the act of placing, Material adjacent to structures.

Balance Point. The approximate point, based on estimated shrinkage or swell, where the quantity of Earthwork Excavation and borrow, if required, is equal to the quantity of Embankment Material plus any surplus Excavation material.

Base Course. A layer of material of specified thickness on which the intermediate or surface course is placed.

Base Flood. The flood or tide having a one percent chance of being exceeded in any given year.

Board. Commonwealth Transportation Board of Virginia.

Borrow. Suitable material from sources outside the Roadway that is used primarily for Embankments.

Brackish Water. Water in which total alkali chlorides calculated as sodium chloride are more than 0.10 percent based on total solids.

Bridge. A structure, including supports, that is erected over a depression or an obstruction, such as water, a Highway, or a railway, that has a track or passageway for carrying traffic.

Bridge Lift. A layer of fill material placed in excess of standard depth over an area that does not support the weight of hauling Equipment and for which compaction effort is not required.

-C-

Camber. A vertical curvature induced or fabricated into beams or girders and a deck slab or slab span formwork; a vertical curvature set in the grade line of a pipe culvert to accommodate differential settlement.

Change Order. As defined in Article 9 of the Part 4 (395 General Conditions).

Channel. A watercourse or drainage way.

Commissioner. The Chief Executive Officer of the Virginia Department of Transportation, whose title is Commissioner of Highways or as otherwise designated by the Code of Virginia.

Commonwealth. Commonwealth of Virginia.

Composite Hydrograph. A graph showing the mean daily discharge versus the day, indicating trends in high and low flow for a one-year period.

Construction Area. The area where authorized construction on this 395 Project occurs.

Construction Limits (On-Site). The disturbed area utilized for the construction of a 395 Project including the intersection of side slopes with the original ground plus slope rounding and slopes for Drainage Ditches, Bridges, Culverts, Channels, temporary or incidental construction, and identified by the surface planes as shown or described within the 395 Contract Documents.

Contract. The Part 3 (395 Design-Build Contract) between the Concessionaire and Design-Builder for the 395 Project, inclusive of all 395 Contract Documents as defined in Article 2 of the Part 3 (395 Design-Build Contract). Oral agreements, representations or promises shall not be considered a part of the Contract.

Corporation. A business entity organized and existing under the laws of the Commonwealth or other jurisdiction, by virtue of articles of incorporation, amendment or merger.

Cul-de-sac. An area at the terminus of a dead-end Street or Road that is constructed for the purpose of allowing vehicles to turn around.

Culvert. A structure that is not classified as a bridge which provides an opening under any Roadway.

Cut. When used as a noun with reference to Earthwork, that portion of a Roadway formed by excavating below the existing surface of the earth and limited by design.

Cut Slope. See also Fill Slope. A surface plane generally designated by design, which is formed during Excavation below existing ground elevations that intersects with existing ground at its termini.

-D-

Deflection. The vertical or horizontal movement occurring between the supports of a Bridge superstructure, guardrail, other structure, or the components (beams, girders, and slabs) thereof that results from their own weight and from dead and live loads. Although all parts of a structure are subject to deflections, usually only those deflections that occur in the superstructure are of significance during construction.

Design Flood. The magnitude of flood that a given structure can convey without exceeding a designated flood level.

Disposable Material. Material generally found to be unsuitable for roadway construction or surplus material that is to be placed in a disposal area, unless specified otherwise.

Disposal Areas. Areas generally located outside of the Construction Limits identified in the 395 Contract Documents where Disposable Material is deposited.

Disqualification. The suspension or revocation of a bidder's prequalification privileges.

Drainage Ditch. An artificial depression constructed to carry off surface water.

-E-

Earthwork. The work consisting of constructing Roadway earthwork in conformity with the specified tolerances for the lines, grades, typical sections, and cross sections shown on the 395 Contract Documents. Earthwork shall include regular, borrow, undercut, and minor structure Excavation; constructing Embankments; disposing of surplus and Unsuitable Material; shaping; grading, compaction; sloping; dressing; and temporary erosion control work.

Easement. A grant of the right to use property for a specific use.

Embankment. A structure of soil, soil aggregate, soil-like materials, or broken rock between the existing ground and Subgrade.

Employee. Any individual working on the 395 Project who is under the direction or control of or receives compensation from the Design-Builder or a Subcontractor at any tier.

Equipment. Machinery, tools, and other apparatus, together with the necessary supplies for upkeep and maintenance that are necessary for acceptable completion of the work.

Excavation (Excavate). The act of creating a man-made cavity in the existing soil for the removal of material necessary to obtain a specific elevation or to install a structure, material, component, or item necessary to complete a specific task or form a final surface or subsurface.

Extra Work. Any work that was not provided for or included in the Contract as awarded but the Concessionaire determines is essential to the satisfactory fulfillment of the Contract within its intended scope and authorized pursuant to Article 9 of Part 4 (395 General Conditions).

-F-

Falsework. A temporary framework used to support work while in the process of constructing permanent structural units.

Federal Agencies or Officers. An agency or officer of the federal government and any agency or officer succeeding, in accordance with the law to the powers, duties, jurisdictions, and authority of the agency or officer mentioned.

Fill Slope (See also Cut Slope). A surface plane formed during the construction of an Embankment above existing ground elevations that intersects with existing ground at its termini.

Flood Frequency. A statistical average recurrence interval of floods of a given magnitude.

Formwork. A temporary structure or mold used to retain the plastic or fluid concrete in its designated shape until it hardens. Formwork shall be designed to resist the fluid pressure exerted by plastic concrete and additional fluid pressure generated by vibration and temporary construction loads.

Frontage Street or Road. A local Street or Road auxiliary to and located on the side of a Highway for service to abutting property and adjacent areas and control of access.

-G-

Gage. U.S. Standard Gage.

Grade Separation. Any structure that provides a Traveled Way over or under another Traveled Way or over a body of water.

-H-

Highway. The entire Right of Way reserved for use in constructing or maintaining the roadway and its appurtenances.

Historical Flood Level. The highest flood level that is known to have occurred at a given location.

Hydrologic Data Sheet. A tabulation of hydrologic data for facilities conveying a 100-year discharge equal to or greater than 500 cubic feet per second.

-I-

Inspector. The Concessionaire's authorized representative who is assigned to make detailed inspections of the quality and quantity of the 395 Work and its conformance to the requirements and provisions of the Contract.

Invert. The lowest point in the internal cross-section of a pipe or other drainage structure.

-J-K-L-

Laboratory. The testing laboratory of the Department or any other testing laboratory that may be designated by the Contract or by the Design-Builder.

-M-N-

Material. Any substance that is used in the 395 Work specified in the Contract.

Median. The portion of a divided Highway that separates the Traveled Ways.

-O-

Ordinary High Water. A water elevation based on analysis of all daily high waters that will be exceeded approximately 25 percent of the time during any 12 month period.

-P-Q-

Pavement Structure. The combination of Select or stabilized materials, Subbase, Base, and surface courses, described in the typical pavement section in the 395 Contract Documents that is placed on a Subgrade to support the traffic load and distribute it to the Roadbed.

Plans. The approved 395 Project plans and profiles, which may include but are not limited to survey data, typical sections, summaries, general notes, details, plan and profile views, cross-sections, special design drawings, computer output listings, supplemental drawings, or exact reproductions thereof, and all subsequently approved revisions thereto which show the location, character, dimensions, and details of the 395 Work specified in the Contract.

Prequalification. The procedure for qualifying a Design-Builder to bid or work on Department contracts specified in the Department's Rules Governing Prequalification Privileges which are available on the Department's website at: www.viriniadot.org/business/const/prequal.asp.

Professional Engineer (PE). An engineer holding a valid license to practice engineering in the State of Virginia.

Profile Grade. The line of a vertical plane intersecting the top surface of the proposed wearing surface, usually along the longitudinal centerline of the Roadbed.

-R-

Ramp. A connecting Roadway between two Highways or Traveled Ways or between two intersecting Highways at a Grade Separation.

Road. A general term denoting a public way for purposes of vehicular travel including the entire area within the Right of Way; the entire area reserved for use in constructing or maintaining the Roadway and its appurtenances.

Roadbed. The graded portion of a Highway within the top and side slopes that is prepared as a foundation for the Pavement Structure and Shoulders.

Roadbed Material. The material below the Subgrade in cuts, Embankments, and Embankment foundations that extends to a depth and width that affects the support of the pavement structure.

Roadside. A general term that denotes the area within the Right of Way that adjoins the outer edges of the Roadway; extensive areas between the Roadways of a divided Highway.

Roadside Development. Items that are necessary to complete a Highway that provide for the preservation of landscape materials and features; rehabilitation and protection against erosion of areas disturbed by construction through placing seed, sod, mulch, and other ground covers; and such suitable plantings and other improvements as may increase the effectiveness, service life and enhance the appearance of the Highway.

Roadway. The portion of a Highway within the limits of construction and all structures, ditches, channels, and waterways which are necessary for the correct drainage thereof.

Rootmat. Any material that by volume, contains approximately 60 percent or more roots.

-S-

Schedule of Record (SOR). The latest accepted Baseline Schedule in accordance with Part 3, Article 11 of the Contract by which all schedule references will be made and progress evaluated.

Seawater. Water in which total alkali chlorides calculated as sodium chloride are more than 0.10 percent of total solids.

Select Borrow. Borrow material that has specified physical characteristics.

Select Material. Material obtained from Roadway Cuts, Borrow areas, or commercial sources that is designated or reserved for use as a foundation for the Subbase, Subbase material, Shoulder surfacing, or other specified purposes designated in the 395 Contract Documents.

Shoulder. The portion of the Roadway contiguous with the Traveled Way that is for the accommodation of stopped vehicles, emergency use, and lateral support of the Base and Surface courses.

Sidewalk. The portion of the Roadway constructed primarily for the use of pedestrians.

Skew. The acute angle formed by the intersection of a line normal to the centerline of the Roadway with a line parallel to the face of the abutments or, in the case of Culverts, with the centerline of the Culverts.

Special Provision (SP). See Section 1.5a of Part 2 (395 Project Information and Technical Requirements).

Special Provision Copied Note (SPCN). See Section 1.5a of Part 2 (395 Project Information and Technical Requirements).

Specifications. A general term that includes all directions, provisions, and requirements which are necessary for the proper fulfillment of the Contract. Specifications are found in the 395 Contract Documents.

Supplemental Specifications (SS). See Section 1.5a of Part 2 (395 Project Information and Technical Requirements).

Station. When used as a definition or term of measurement, 100 linear feet.

Storm Sewer System. A drainage system consisting of a series of at least two interconnecting pipes and structures (minimum of two drop inlets, manholes, junction boxes, etc.) designed to intercept and convey stormwater runoff from a specific storm event without surcharge.

Street. A general term denoting a public way for purposes of vehicular travel including the entire area within the Right of Way; the entire Right of Way reserved for use in constructing or maintaining the Roadway and its appurtenances.

Structures. Bridges, Culverts, catch basins, inlets, retaining walls, cribs, manholes, end walls, buildings, steps, fences, sewers, service pipes, underdrains, foundation drains, and other features that may be encountered in the 395 Work and are not otherwise classed herein.

Subbase. A layer(s) of specified or selected material of designed thickness that is placed on a Subgrade to support a Base Course.

Subgrade. The top Earthwork surface of a Roadbed, prior to application of Select (or stabilized) Material courses, shaped to conform to the typical section on which the Pavement Structure and Shoulders are constructed, or surface that must receive an additional material layer, such as topsoil, stone or other Select Material.

Subgrade Stabilization. The modification of Roadbed soils by admixing with stabilizing or chemical agents that will increase the load bearing capacity, firmness, and resistance to weathering or displacement.

Supplier. Any business who manufactures, fabricates, distributes, supplies or furnishes materials or equipment, but not on-site labor, for use in performing the 395 Work on or for the 395 Project according to the requirements of the 395 Contract Documents.

Surface Course (See Wearing Course). One or more top layers of a Pavement Structure designed to accommodate the traffic load, which is designed to resist skidding, traffic abrasion, and disintegrating effects of weather.

Surplus Material. Material that is present on the 395 Project as a result of unbalanced Earthwork quantities, excessive swell, slides, undercutting, or other conditions beyond the control of the Design-Builder, or is designated as surplus material in the 395 Contract Documents.

Suspension. A written notice issued by the Concessionaire to the Design-Builder that orders the 395 Work on the 395 Project to be stopped wholly or in part as specified. The notice will include the reason for the suspension.

-T-

Temporary Structure. Any structure that is required to maintain traffic while permanent structures or parts of structures specified in the Contract are constructed or reconstructed. The Temporary Structure shall include earth approaches.

Theoretical Maximum Density. The maximum compaction of materials that can be obtained in accordance with the values established VTM-1.

Tidewater, Virginia. Areas within the State as defined in the Department of Conservation and Recreation Erosion and Sediment Control Manual.

Ton. A short ton; 2,000 pounds avoirdupois.

Top of earthwork. The uppermost surface of the regular or embankment excavation, not including select material that is shaped to conform to the typical section shown in the plans or directed by the Concessionaire.

Topsoil: The uppermost original layer of material that will support plant life and contains more than 5 percent organic material and is reasonably free from roots exceeding 1 inch in diameter, brush, stones larger than 3 inches in the largest dimension, and toxic contaminants.

Traveled Way. The portion of the Roadway for the movement of vehicles, not including Shoulders.

-U-V-

Unsuitable Material. As defined in Part 2 of the 395 Contract Documents (“395 Project Information and Technical Requirements”).

-W-X-Y-Z-

Wearing Course (See Surface course). The top and final layer of any pavement

Working Drawings. Stress sheets, shop drawings, erection plans, Falsework plans, framework plans, cofferdam plans, bending diagrams for reinforcing steel, or any other supplementary plans or similar data the Design-Builder is required to submit to the Concessionaire’s Representative for record purposes.

SECTION 102—BIDDING REQUIREMENTS AND CONDITIONS (Not Used) Refer to RFQ and Part 1 (RFP).

SECTION 103—AWARD AND EXECUTION OF DESIGN-BUILD CONTRACTS (Not Used) Refer to Part 1 (RFP).

SECTION 104—SCOPE OF WORK

104.01—Intent of Contract

The intent of the Contract is to provide for completion of the 395 Work specified therein in accordance with the Contract for the 395 Contract Price and within the 395 Contract Times. Further, it is understood that the Design-Builder shall perform the 395 Work under the Contract as an independent contractor and not as an agent of the Concessionaire, Department, the Commissioner, or the Board.

104.02—Changes in Quantities or Alterations in the Work

(a) General

The Concessionaire reserves the right to make, in writing, at any time during the 395 Work, such changes in quantities and such alterations in the 395 Work as are necessary to complete the 395 Project satisfactorily. Such changes shall be administered under Article 9 of Part 4 (395 General Conditions), and shall not invalidate the Contract or release the Surety, and the Design-Builder shall agree to perform the 395 Work as altered. No change, alteration, or modification in or deviations from the 395 Contract Documents, or the giving by the Concessionaire of any extension of time for the performance of the 395 Work, or the forbearance on the part of the Concessionaire shall release or exonerate in whole or in part either the Design-Builder or any Surety on the obligations of any bond given in connection with the Contract. Neither the Concessionaire nor the Design-Builder shall be under any obligation to notify the Surety or sureties of any such alteration, change, extension, or forbearance notice thereof being expressly waived. Any increase in the 395 Contract Price shall automatically result in a corresponding increase in the penal amount of the bonds without notice to or consent from the Surety, such notice and consent being hereby waived. Decreases in the 395 Contract Price shall not, however, reduce the penal amount of the bonds unless specifically provided in any Change Order decreasing the scope of the 395 Work.

(b) Value Engineering Proposals

The Design-Builder may submit to the Concessionaire written Value Engineering Contractor Proposals (VECP) for modifying the requirements of 395 Contract Documents for the purpose of reducing the total 395 Contract Price or 395 Contract Times without reducing the design capacity or quality of the finished product. If the Concessionaire accepts VECP, the Concessionaire and the Design-Builder will equally divide the net savings or 395 Contract Time, or both.

Each VECP shall result in a net savings over the 395 Contract Price or 395 Contract Times, or both without impairing essential functions and characteristics of the item(s) or of any other part of the 395 Project, including, but not limited to, service life, reliability, economy of operation, ease of maintenance, aesthetics, and safety. At least the following information shall be submitted with each VECP:

- Statement that the proposal is submitted as a VECP
- Statement concerning the basis for the VECP benefits to the Concessionaire and an itemization of the pay items and requirements affected by the VECP
- Detailed estimate of the cost under the existing Contract and under the VECP
- Proposed specifications and recommendations as to the manner in which the VECP changes are to be accomplished
- Statement as to the time by which a contract Change Order adopting the VECP must be issued so as to obtain the maximum cost-effectiveness

The Concessionaire will process the VECP in the same manner as prescribed for any other proposal that would necessitate issuance of a Change Order. The Concessionaire may accept a VECP in whole or part by issuing a Change Order that will identify the VECP on which it is based. The Concessionaire will not be liable to the Design-Builder for failure to accept or act on any VECP submitted pursuant to these requirements or for delays in the work attributable to any VECP. Until a VECP is put into effect by a Change Order, the Design-Builder shall remain obligated to the terms and conditions of the existing Contract. If an executed Change Order has not been issued by the date on which the Design-Builder's proposal specifies that a decision should be made or such other date as the Design-Builder may subsequently have specified in writing, the VECP shall be deemed rejected.

The Change Order effecting the necessary modification of the Contract will establish the net savings agreed on, and provide for adjustment of the 395 Contract Price, or 395 Contract Time, or both. The Design-Builder shall absorb all costs incurred in preparing a VECP. Costs for reviewing and administering a VECP will be borne by the Concessionaire. The Concessionaire may include in the agreement any conditions it deems appropriate for consideration, approval, and implementation of the VECP. The Design-Builder's 50 percent share of the net savings or 395 Contract Time or both shall constitute full compensation to him for effecting all changes pursuant to the VECP Change Order.

Unless specifically provided for in the Change Order authorizing the VECP, acceptance of the VECP and performance of the work thereunder will not change the 395 Contract Time.

The Concessionaire may adopt a VECP for general use in contracts the Concessionaire administers if it determines that the VECP is suitable for application to other contracts. VECPs identical with or similar to previously submitted VECPs will be eligible for consideration and compensation under these provisions if the Concessionaire has not previously adopted the VECPs for general application to other contracts administered by the Concessionaire. When a VECP is adopted for general use, compensation pursuant to these requirements will be applied only to those awarded contracts for which the VECP was submitted prior to the date of adoption of the VECP.

Proposed changes in the basic design of a Bridge or pavement type or those changes that require different right of way limits will not normally be considered an acceptable VECP. If a VECP is based on or is similar to a change in the 395 Contract Documents prior to submission of the VECP, the Concessionaire will not accept the VECP.

The Concessionaire will be the sole judge of the acceptability of a VECP. The requirements herein apply to each VECP initiated, developed, and identified as such by the Design-Builder at the time of its submission to the Concessionaire. However, nothing herein shall be construed as requiring the Concessionaire to approve a VECP.

Subject to the provisions herein, the Concessionaire or any other public agency shall have the right to use all or part of an accepted VECP without obligation or compensation of any kind to the Design-Builder.

104.03—Differing Site Conditions (Not Used) Refer to Part 4 (395 General Conditions) – Section 4.3 (Differing Site Conditions)

SECTION 105—CONTROL OF WORK

105.01—Notice to Proceed (Not Used) Refer to Part 3 (395 Design-Build Contract)

105.02—Pre-Construction Conference (Not Used)

105.03—Authorities of 395 Project Personnel, Communication and Decision Making (Not Used)

105.04—Gratuities

Gifts, gratuities, or favors shall not be given or offered by the Design-Builder to personnel of the Concessionaire or the Department. A gift, gratuity, or favor of any nature whatsoever or offer of such by the Design-Builder to personnel of the Concessionaire or the Department shall be a violation of this provision.

The Design-Builder shall not employ any personnel of the Concessionaire or the Department for any services without the prior written consent.

If the Concessionaire or the Department determines after investigation that the Design-Builder or the Design-Builder's Employees, representatives, or agents of any Person acting in his behalf have violated this Section, the Concessionaire or the Department may, at its discretion, disqualify the Design-Builder from bidding on future

contracts with the Concessionaire or the Department for a period of six months from the date of the determination of such a violation. Any implicated Employees, agents, or representatives of the Design-Builder may be prohibited from working on any contract the Concessionaire or the Department awards for the period of the Design-Builder's disqualification.

105.05—Character of Workers, Work Methods, and Equipment

(a) Workers

Workers shall have sufficient skill and experience to perform properly the 395 Work assigned to them. Workers engaged in special or skilled work shall have sufficient experience in such work and in the operation of Equipment required to perform it properly and satisfactorily. The term "Workers" means the Design-Builder's employees, its Subcontractors at any tier, or any of their respective employees.

The Design-Builder shall immediately remove from the 395 Project any Workers who, in the Concessionaire's opinion, do not perform their work in a proper, skillful and satisfactory manner or are intemperate or disorderly. The Concessionaire shall direct the Design-Builder to do so in writing and such Workers shall not be employed again on any portion of the 395 Work without the Concessionaire's written approval. If the Design-Builder fails to immediately remove the Workers, or furnish suitable and sufficient Workers for satisfactory prosecution of the 395 Work, the Concessionaire may withhold all monies that are or may become due the Design-Builder and may suspend the 395 Work until the Design-Builder has complied with the Concessionaire's directive.

(b) Equipment

Equipment shall be of sufficient size and quantity, and in such good mechanical condition as to comply with the Contract requirements and to produce a satisfactory quality of work. Equipment shall be such that no damage to the Roadway, adjacent property, or other Highways, or no danger to the public will result from its use. The Concessionaire may order the removal and require replacement of unsatisfactory Equipment.

(c) Work Methods

When methods and Equipment to be used by the Design-Builder are not prescribed in the Contract, the Design-Builder is free to use whatever methods or Equipment he feels will accomplish the 395 Work in conformity with the Contract requirements.

When the Contract specifies that construction be performed by the use of particular methods and Equipment, they shall be used unless others are authorized by the Concessionaire. If the Design-Builder desires to use a different method or type of Equipment, he may request permission from the Concessionaire to do so. The request shall be in writing and shall include a full description of the methods and Equipment he proposes to use and an explanation of the reasons for desiring to make the change. If permission is not given, the Design-Builder shall use the specified methods and Equipment. If permission is given, it will be on the condition that the Design-Builder shall be fully responsible for producing construction work in conformity with contract requirements. If, after trial use of the substituted methods or Equipment, the Concessionaire determines that the work produced does not conform to the Contract requirements, the Design-Builder shall discontinue the use of the substitute method or Equipment and shall complete the remaining construction with the specified methods and Equipment. The Design-Builder shall remove any deficient work and replace it with work of the specified quality or take such other corrective action as the Concessionaire may direct. No change will be made in the basis of payment for the construction items involved or the 395 Contract Times as the result of authorizing or denying a change in methods or Equipment under these provisions.

105.06—Subcontracting

- (a) The Design-Builder shall notify the Concessionaire of the name of the firm to whom the work will be subcontracted, and the amount and items of work involved. Such notification shall be made and verbal approval given by the Concessionaire prior to the Subcontractor beginning work.

- (b) The Design-Builder shall perform with his own organization work amounting to not less than 30 percent of the total original 395 Contract Price unless otherwise indicated in the Contract.

The term “perform work with its own organization” refers to Workers employed or leased by the Design-Builder, and equipment owned or rented by the Design-Builder, with or without operators. Such term does not include employees or equipment of a Subcontractor or lower tier Subcontractor, agents of the Design-Builder, or any other assignees. The term may include payments for the costs of hiring leased employees from an employee leasing firm meeting all relevant Federal and State regulatory requirements. Leased employees may only be included in this term if the Design-Builder meets all of the following conditions:

1. The Design-Builder maintains control over the supervision of the day-to-day activities of the leased employees;
2. The Design-Builder remains responsible for the quality of the work of the leased employees;
3. The Design-Builder retains all power to accept or exclude individual employees from work on the 395 Project; and
4. The Design-Builder remains ultimately responsible for the payment of predetermined minimum wages, the submission of payrolls, statements of compliance and all other Federal regulatory requirements.

- (c) The Design-Builder shall not subcontract any part of the work to a contractor who is not prequalified with the Department, unless otherwise indicated in the Contract. This restriction does not apply to service providers, Design Consultants, consultants, manufacturers, suppliers, or haulers. Consent to subcontract or otherwise dispose of any portion of the work shall not relieve the Design-Builder of any responsibility for the satisfactory fulfillment of the entire Contract. All subcontracts shall be evidenced by written binding agreements that shall be available to the Concessionaire upon request, before, during, and after their approval.

105.07—Cooperation of Design-Builder

The Design-Builder shall give the 395 Work the constant attention necessary to facilitate quality and progress and shall fully cooperate with the Concessionaire, and other contractors involved in the prosecution of the work. If any portion of the 395 Project is located within the limits of a municipality, military installation, or other federally owned property, the Design-Builder shall cooperate with the appropriate officials and their agents in the prosecution of the 395 Work to the same extent as with the Concessionaire.

The Design-Builder shall have on the 395 Project at all times during prosecution of the 395 Work a competent Design-Builder Representative who is capable of reading and understanding the 395 Contract Documents, experienced in the type of work being performed, and who shall receive instructions from the Design-Builder or the Concessionaire or the Concessionaire’s authorized representatives. The Design-Builder Representative shall have full authority to execute the orders and directions of the Concessionaire without delay and supply promptly such Materials, Equipment, tools, labor, and incidentals as may be required.

105.08—Cooperation With Regard to Utilities (Not Used) Refer to Section 1.7 of Part 2 (395 Project and Technical Requirements)

105.09—Cooperation among Contractors (Not Used) Refer to Section 3.6 of Part 4 (395 General Conditions)

105.10—Plans and Working Drawings

(a) General

Refer to Article 2 of the Part 4 (395 General Conditions) for Required Submittals and Section 1.2.6 of Part 2 (395 Project Information and Technical Requirements) for further details.

(b) Plans

Design-Builder shall furnish all plans consisting of general drawings and showing such details as are necessary to give a comprehensive understanding of the work specified. Except as otherwise shown on the plans, dimensions shown on the plans are measured in the respective horizontal or vertical planes. Dimensions that are affected by gradients or vertical curvatures shall be adjusted as necessary to accommodate actual field conditions and shall be specifically denoted on the Working Drawings.

(c) Working Drawings

The Design-Builder shall furnish Working Drawings and maintain a set for the Concessionaire as may be required. Working Drawings shall not incorporate any changes from the requirements of the Contract unless the changes are specifically denoted, together with justification, and are approved in writing by the Concessionaire. The Design-Builder shall identify Working Drawings and submittals by the complete 395 Project and job designation numbers. Items or component materials shall be identified by the specific Contract Item number and Specification reference in the Contract.

The Design-Builder shall provide five sets of any submittal. If a railroad, municipality, or other entity as specified in the 395 Contract Documents is required to review the Working Drawings, the reviewed Working Drawings will be returned within 28 days from the date of receipt by the Concessionaire. If the Working Drawings are not returned by the time specified, no additional compensation will be allowed, but Design-Builder may submit, in accordance with the applicable requirements of the 395 Contract Documents, a request for a time extension. Upon completion of the 395 Work, the original tracings, if required, shall be supplied to the Concessionaire.

Deviations from the Contract requirements initiated by the Design-Builder shall be requested in writing and clearly identified on the Working Drawings. Explicit supporting justification shall be furnished specifically describing the reason for the requested deviations as well as any impact such deviations shall have on the schedule of 395 Work. Failure to address time or other impacts associated with the Design-Builder's request will be cause for rejection of the Design-Builder's request. Deviations from the Contract requirements shall not be made unless authorized by the Concessionaire. If authorized by the Concessionaire, such authorization shall not relieve the Design-Builder from the responsibility for complying with the requirements of the Contract for a fully functional finished work item as specified or designed.

The Design-Builder shall submit as-built Working Drawings upon completion of the 395 Work, if required, by the Contract.

The Design-Builder may authorize the fabricator in writing to act for him in matters relating to 395 Working Drawings. Such authorization shall have the force and effect of any other representative of the Design-Builder's organization.

1. Steel Structures

Working Drawings for steel structures, including metal handrails, shall consist of shop detail, erection, and other Working Drawings showing details, dimensions, sizes of units, and other information necessary for the fabrication and erection of metal work. Such drawings shall be signed and sealed by a PE.

2. Falsework

Working Drawings for Falsework supporting a Bridge Superstructure shall be signed and sealed by a PE.

3. Concrete Structures and Prestressed Concrete Members

Working Drawings for concrete structures and prestressed concrete members shall provide such details as required for the successful prosecution of the 395 Work and which are not included in the RFP Documents furnished by the Concessionaire. Drawings shall include plans for items such as prestressing strand details and elongation calculations, location of lift points, Falsework, bracing, centering, formwork, masonry, layout diagrams, camber management plan for prestressed members, and bending diagrams for reinforcing steel when necessary or when requested. Such drawings shall be signed and sealed by a PE.

4. Lighting, signal and pedestal poles, overhead and Bridge mounted sign structures, breakaway support systems, anchor bolts, framing units, panels, and foundations.

Prior to fabrication or construction, the Design-Builder shall submit for review one original and six copies of each Working Drawing and design calculation for lighting, signal and pedestal poles, overhead and Bridge mounted sign structures, breakaway support systems, anchor bolts, framing units, panels, and foundations. All sheets of these submittals shall include the PE's signature and seal. Certification for foundations will be required only when the designs are furnished by the Design-Builder. The designs shall be in accordance with the specific editions of the AASHTO *Standard Specifications for Structural Supports for Highway Signs, Luminaires, and Traffic Signals* as required in Section 700. Such designs shall be signed and sealed by a PE.

5. Reinforced Concrete Pipe

When specified, and prior to manufacture of reinforced concrete pipe, the Design-Builder shall furnish to the Concessionaire a certification of the acceptability of the design of such pipe, as determined from a review that has been signed and sealed by a PE. Such certification shall cover all design data, supporting calculations, and materials. Pipe designs previously certified or approved by the Department will not require recertification.

105.11—Conformity with 395 Contract Documents

All Materials to be used in the 395 Work shall conform to the qualities, Part 2 (395 Project Information and Technical Requirements), values or range of values specified in the Contract. Less than complete conformity may be tolerated if obtaining exact or complete conformity would not be feasible and if authorized in writing by the Concessionaire.

Permissible tolerances for the elevation of Subgrade and finished grade and for the thickness of the various courses of Pavement Structure are specified in the 395 Contract Documents. If permissive tolerances are exceeded or if consistent deviations from the 395 Contract Documents or abrupt changes in grade occur, even though within the tolerances, the affected areas shall be reconstructed to conform to the specified tolerance and provide a smooth riding surface.

When the 395 Contract Documents require the finished surface to tie into any structural item whose elevation is fixed, the elevation of the finished surface must coincide with the elevation of the structural item.

105.12—Coordination of 395 Contract Documents

The Design-Builder shall be responsible for the coordination of the 395 Contract Documents. In the event of any inconsistency, conflict, or ambiguity between or among the 395 Contract Documents, such inconsistency, conflict or ambiguity shall be interpreted as set forth in Section 3.1 of the Part 3 (395 Design-Build Contract).

The Design-Builder shall not take advantage of any obvious or apparent ambiguity, conflict, error, or omission in the 395 Contract Documents. If after beginning work the Design-Builder discovers an ambiguity, conflict, error, or omission in the 395 Contract Documents, he shall immediately notify the Concessionaire of the corrections in

accordance with the 395 Contract Documents and make such corrections as necessary for fulfilling the intent of the 395 Contract Documents before proceeding further with the effected work.

105.13—Construction Stakes, Lines, and Grades

The Design-Builder shall perform all construction and other surveying that the Design-Builder deems necessary to construct this 395 Project in accordance with the 395 Contract Documents. The cost for all surveying performed by the Design-Builder is included in the 395 Contract Price. All construction surveys shall be performed under the direct supervision of a land surveyor duly registered and licensed in the State.

105.14—Maintenance During Construction

(a) Traffic Control

1. The Design-Builder shall have at least one person on the 395 Project site during all work operations who is currently verified either by the Department's Intermediate Work Zone Traffic Control training or by the American Traffic Safety Services Association (ATSSA) Virginia Intermediate Traffic Control Supervisor (TCS) training by a Department approved training provider. This person must have their verification card with them while on the 395 Project site. This person shall be responsible for the oversight of Work zone traffic control within the 395 Project limits in compliance with the Contract requirements, the VWAPM, and the MUTCD. This person's duties shall include the supervision of the installation, adjustment (if necessary), inspection, maintenance, and removal when no longer required, of all 395 Work zone traffic control devices on the 395 Project.

If none of the Design-Builder's on-site personnel responsible for the supervision of such work have the required verification with them or if they have an outdated verification card showing they are not currently verified as a Traffic Control Supervisor (TCS) either by the Department in Intermediate 395 Work Zone Traffic Control, or by the ATSSA, the Concessionaire will suspend all work on the 395 Project until the 395 Work is appropriately supervised in accordance with the requirements herein.

2. The Design-Builder shall have at least one person on site who is, at a minimum, verified in Basic Work Zone Traffic Control by the Department for each construction and/or maintenance operation that involves installing, maintaining, or removing work zone traffic control devices. This person shall be responsible for the placement, maintenance and removal of work zone traffic control devices.

In the event none of the Design-Builder's on-site personnel for any construction and/or maintenance operation have, at a minimum, the required verification in Basic Work Zone Traffic Control, the Concessionaire will suspend that construction/maintenance operation until that operation is appropriately staffed in accordance with the requirements herein.

3. **Flagging Traffic:** Certified flaggers shall be provided in sufficient number and locations as necessary for control and protection of vehicular and pedestrian traffic in accordance with the VWAPM. Flaggers shall be able to communicate to the traveling public in English while performing the job duty as a flagger at the flagger station. Flaggers shall use sign paddles to regulate traffic in accordance with the VWAPM.

Certification for flaggers will be awarded upon a candidate's satisfactory completion of an examination. Certification cards shall be carried by flaggers while performing flagging duties. Flaggers found not to be in possession of their certification card shall be removed from the flagging site and operations requiring flagging will be suspended by the Concessionaire until a certified flagger is on-site to perform flagging duties in accordance with the requirements herein. Further, flaggers performing duties improperly will have their certifications revoked.

(b) Maintenance of Traffic

1. The Design-Builder shall prosecute the 395 Work so as to avoid obstructions to traffic to the greatest extent practicable. The Design-Builder shall provide for the safety and convenience of the general public and residents along the roadway, and for the protection of persons and property.

Highways closed to traffic shall be protected by barricades and other warning devices as required by the Contract, the VWAPM, and the MUTCD. Barricades and warning devices shall be illuminated where required during periods of darkness and low visibility. The Design-Builder shall erect warning devices in advance of a location on the 395 Project where operations or obstructions may interfere with the use of the road by traffic and at all intermediate points where the new work crosses or coincides with an existing roadway. The Design-Builder shall maintain sign faces and reflective surfaces of warning devices in a clean and visible condition. The Design-Builder shall cover or remove signs when the messages thereon are not applicable. Barricades, warning signs, lights, temporary signals, and other protective devices shall conform to Section 512.

2. The road shall be kept open to all traffic while undergoing improvements, unless otherwise permitted in the Contract. The Design-Builder shall keep the portion of the 395 Project being used by public, pedestrian, and vehicular traffic in such condition that all such traffic will be safely and adequately accommodated. However, removal of snow and control of ice on roads open to public travel will be performed by the Department.

The Design-Builder shall keep the portions of the road being used by the public free from irregularities and obstructions that could present a hazard or annoyance to traffic. When directed by the Concessionaire, allaying of dust shall be performed in accordance with Section 511. Holes in hard surface pavements shall be filled with approved asphalt patching material.

If any damage is sustained by an accepted unit or portion of the 395 Project attributable to causes beyond the control of the Design-Builder, the Concessionaire may authorize the Design-Builder to make the necessary repairs. These repairs will be paid for at the 395 Contract Price for the items requiring repair. In the absence of Contract prices covering the items of repair, the repair work will be paid for in accordance with Section 109.05.

3. **Detours:** Detours may be indicated on the plans or in the special provisions or may be used with the Concessionaire's approval. Unless otherwise designated in the Contract, the Design-Builder shall furnish, install and maintain all directional markings, for through-traffic on off-project detours authorized or requested by the Concessionaire with the exception of municipalities. Municipalities shall be responsible for off-project roadway maintenance within their own corporate limits. Detours over existing state roads shall be designated, marked, and maintained by the Design-Builder. Directional markings for detours shall include signs. Responsibility for installation and maintenance of the signs shall be in accordance with Section 512.03(a). If any 395 Project is located wholly or in part within a municipality's corporate limits and through traffic is to be detoured at the municipality's request, the municipality will provide and maintain the detours within the corporate limits and will furnish, install and maintain all directional markings. The provision of detours and marking of alternate routes will not relieve the Design-Builder of the responsibility for ensuring the safety of the public or from complying with any Contract requirements affecting the rights of the public within his Contract area of operations, including those concerning lights and barricades. Maintenance of all other detours shall be the Design-Builder's responsibility.
4. **Maintenance of Traffic During Suspension of Work:** During any suspension of work, the Design-Builder shall temporarily open to traffic such portions of the 395 Project and temporary roadways as may be agreed upon by the Design-Builder and the Concessionaire.
5. **Minimizing Traffic Delays:** Two-way traffic shall be maintained at all times unless the Contract or the Concessionaire permits one-way traffic. The Design-Builder shall not stop traffic without the Concessionaire's permission.

If one-way traffic is permitted, the Design-Builder shall provide certified flaggers to direct the traffic. When specified in the Contract, pilot vehicles shall be furnished in accordance with Section 512. Upon the Design-Builder's request and where deemed appropriate by the Concessionaire, the Design-Builder will install traffic signals that may be used for the control of one-way traffic. The Design-Builder shall pay the costs of installation, electrical service, maintenance or repair work.

6. **Connections and Entrances:** Connections with other roads and public and private entrances shall be kept in a reasonably smooth condition at all times.

Stabilization or surfacing material shall be applied to connections and entrances.

The Design-Builder shall schedule construction operations so that approved continuous access is provided for all property adjacent to the construction when the property is shown on the plans to require access. When frontage roads are shown on the plans, they shall be constructed prior to the closing of any access routes unless other approved access is provided and is acceptable to the property owner.

The Design-Builder shall not disturb connections or entrances until necessary. Once disturbed, the Design-Builder shall maintain and complete connections or entrances as follows:

- a. **Connections:** Connections that had an original paved surface shall be brought to a grade that will smoothly and safely accommodate vehicular traffic through the intersection, using temporary pavement as soon as practicable after connections are disturbed. Connections that had an original unpaved surface shall be brought to a grade that will smoothly and safely accommodate vehicular traffic through the intersection, using either the required material or a temporary aggregate stabilization course that shall be placed as soon as practicable after connections are disturbed.

If there are delays in prosecution of work for connections, connections that were originally paved shall have at least two lanes maintained with a temporary paved surface. Those that were not originally paved shall be maintained with a temporary aggregate stabilization course.

- b. **Entrances:** Entrances shall be graded concurrently with the roadway with which they intersect. Once an entrance has been disturbed, it shall be completed as soon as is practicable, including placing the required base and surface course or stabilization. If the entrance must be constructed in stages, such as when there is a substantial change in the elevation of the roadway with which it intersects, the surface shall be covered with a temporary aggregate stabilization course or other suitable salvaged material until the entrance can be completed and the required base and surface or stabilization course can be placed.
7. **Obstruction Crossing Roadways:** Where the Design-Builder places obstructions such as suction or discharge pipes, pump hoses, steel plates, or any other obstruction that must be crossed by vehicular traffic, they shall be bridged as directed by the Concessionaire at the Design-Builder's expense. Traffic shall be protected by the display of warning devices both day and night. If operations or obstructions placed by the Design-Builder damage an existing traveled roadway, the Design-Builder shall cease operations and repair damages to the roadway at no additional cost to the Concessionaire.
8. **Patching Operations:** Where existing hydraulic cement concrete pavement is to be patched, the operation of breaking and excavating old pavement shall extend for a distance of not more than two miles. Patching shall be coordinated with excavating so that an area of not more than one-half mile in which excavated patches are located shall be left at the end of any day's work. Necessary precautions shall be taken to protect traffic during patching operations.
9. **Temporary Structures:** The Design-Builder shall construct, maintain, and remove temporary structures and approaches necessary for use by traffic. After new structures have been opened to traffic, temporary

structures and approaches shall be removed. The materials contained therein shall remain the property of the Design-Builder.

The proposed design of temporary structures shall be submitted to the Concessionaire prior to the beginning of construction in accordance with Section 105.10.

10. **Haul Route:** The Design-Builder shall select haul routes between the 395 Project and material source(s) that will minimize disturbance to the community. The Design-Builder shall furnish to the Concessionaire, for review, his plan for the haul route and for minimizing the adverse effects of hauling operations on persons who reside adjacent to the haul route or persons who otherwise use a portion of the haul route for ingress or egress to their residential or work area. The Concessionaire may select alternate haul routes, divide the hauling traffic over several routes, and impose other restrictions deemed necessary to minimize the impact of the hauling operation on local residents.

11. Opening Sections of 395 Project to Traffic

Certain sections of the 395 Work may be opened to traffic when specified in the Contract or when directed by the Concessionaire. Such opening shall not constitute acceptance of the 395 Work or any part thereof or a waiver of any provision of the Contract.

If the Design-Builder is not continuously prosecuting the 395 Work to the Concessionaire's satisfaction as determined by the Schedule of Record, the Design-Builder shall not be relieved of the responsibility for maintenance of the completed work during the period that the section of the 395 Work is opened to traffic prior to Final Completion. The Design-Builder shall be responsible for any expense resulting from the opening of such portions of the 395 Work under these circumstances, except for slides. The Design-Builder shall conduct the remainder of the construction operations so as to cause the least obstruction to traffic.

(c) Maintenance of Work

1. The Design-Builder shall maintain the 395 Work, the 395 Project site, construction area and roadway from the beginning of construction operations until Final Completion with adequate equipment and forces to keep the roadway and structures in a safe and satisfactory condition at all times and to ensure the continuous and effective day by day prosecution of the 395 Work.

If any damage is sustained by an accepted unit or portion of the 395 Project attributable to causes beyond the control of the Design-Builder, the Concessionaire may authorize the Design-Builder to make the necessary repairs. In the absence of Contract prices covering the items of repair, the repair work will be paid for in accordance with Section 109.05.

2. Where the Contract specifies placing a course on another course or subgrade of embankment, base, subgrade, concrete, asphalt pavement, or other courses previously constructed, the Design-Builder shall maintain the courses or subgrades previously constructed in accordance with the Contract requirements when placing such course. This maintenance includes, but is not limited to draining, re-compacting, re-grading, or, if unacceptable or destroyed, the removal of work the Concessionaire previously accepted.
3. **Grading Operations:** When the Design-Builder elects to complete the rough grading operations that exceed the length of one full day's surfacing operations, the rough grade shall be machined to a uniform slope from the top edge of the existing pavement to the ditch line.

When the surface is to be widened on both sides of the existing pavement, construction operations involving grading or paving shall not be conducted simultaneously on sections directly opposite each other.

The surface of pavement shall be kept free from soil and other materials that might be hazardous to traffic. Prior to opening of new pavement to traffic, shoulders shall be roughly dressed for a distance of 3 feet from the edge of the paved surface.

(d) Maintenance Cost

The Design-Builder shall bear all costs of performing maintenance work before Final Completion, and of constructing and maintaining necessary approaches, crossings, intersections, and other features without direct compensation except as provided for herein. When the Design-Builder confines his operation to the surface of the roadway and reasonable width of the shoulder and the surface is disturbed or damaged by his operations or equipment, he shall be responsible for the restoration and maintenance of the surface that is disturbed or damaged.

- (e) Failure to Maintain Roadway or Structures:** If the Design-Builder fails to remedy unsatisfactory maintenance immediately after receipt of a notice by the Concessionaire, the Concessionaire may proceed with adequate forces, equipment, and material to maintain the 395 Project. The cost of the maintenance, plus 25 percent for supervisory and administrative personnel, will be deducted from monies due the Design-Builder for the 395 Project.

105.15—Removing and Disposing of Structures and Obstructions

The Design-Builder shall remove and dispose of or store, as directed by the Concessionaire, fences, buildings, structures, or encumbrances within the construction limits. Materials so removed, including existing drains or pipe culverts, shall become the property of the Design-Builder, with the exception of those materials to be stored or delivered to the Concessionaire or others as designated in the Contract.

- (a) Signs:** The Design-Builder shall relocate all signs within the construction limits that conflict with construction work as approved by the Concessionaire. Signs that are not needed for the safe and orderly control of traffic during construction as determined by the Concessionaire shall be removed and stored at a designated location within the 395 Project limits. The removed signs shall be stored above ground in a manner that will preclude damage and shall be reinstalled in their permanent locations prior to Final Completion. If any of the removed signs are not to be reinstalled, the Design-Builder shall notify the Concessionaire at the time the signs have been properly stored. Such signs will be removed from the storage area by the Concessionaire. Any sign that is damaged or lost because of the fault of the Design-Builder shall be repaired or replaced at his expense. Costs for removing, storing, protecting, and reinstalling such signs shall be included in the 395 Contract Price and no additional compensation will be made.
- (b) Mailboxes and Newspaper Boxes:** When removal of existing mailboxes and newspaper boxes is made necessary by construction operations, the Design-Builder shall place them in temporary locations so that access to them will not be impaired. Prior to Final Completion, boxes shall be placed in their permanent locations as designated by the Concessionaire and left in the same condition as when found. Boxes or their supports that are damaged through negligence on the part of the Design-Builder shall be replaced at his expense. The cost of removing and resetting existing boxes shall be included in other pay Contract items. New mailboxes designated in the plans shall be paid for in accordance with Section 521 of the Specifications.

105.16—Cleanup

Removal from the 395 Project of rubbish, scrap material, and debris caused by the Design-Builder's personnel or construction operations shall be a continuing process throughout the course of the 395 Work. The work site shall be kept in a neat, safe and orderly condition at all times.

Before Final Completion, the Highway, Borrow pits, quarries, Disposal Areas, storage areas, and all ground occupied by the Design-Builder in connection with the 395 Work shall be cleaned of rubbish, surplus materials, and Temporary Structures, except where the Design-Builder owns or controls the property. All parts of the 395 Work and the Construction Area shall be left in a neat, safe, and orderly condition.

Within 30 days after Final Completion, the Design-Builder shall remove his Equipment, Materials and debris from the Right of Way and from property adjacent to the 395 Project that he does not own or control.

105.17—Inspection of Work (Not Used) Refer to Section 3.2 of Part 2 (395 Project Information and Technical Requirements)

105.18—Removal of Unacceptable Work

Work will be considered as unacceptable if it: (a) does not conform to the requirements of the 395 Contract Documents; (b) is performed contrary to the instructions of the Concessionaire; or (c) is performed without the authorization of the Concessionaire. Unacceptable work shall be remedied or removed immediately unless otherwise determined by the Concessionaire, and replaced in an acceptable manner at the Design-Builder's expense. The Concessionaire may elect, in its sole discretion, to accept otherwise unacceptable work at a reduced price and a warranty extended to five (5) years for the subject portion of the work when acceptance is considered to be in the best interest of the public.

The Design-Builder shall not perform destructive sampling or testing of the 395 Work without written authorization of the Concessionaire. Unauthorized destructive sampling or testing will cause the 395 Work to be considered unacceptable.

In the event the Design-Builder is granted authorization to perform destructive sampling or testing, the Design-Builder shall obtain the approval of the Concessionaire for the method and location of each test prior to beginning such sampling or testing. In addition, destructive sampling and testing shall be performed in the presence of the Concessionaire.

If the Design-Builder fails to comply immediately with any order of the Concessionaire made under this Section, the Concessionaire will have the authority to cause unacceptable or unauthorized work to be removed and replaced and to deduct the cost from any monies due or to become due the Design-Builder.

105.19—Submission and Disposition of Claims (Not Used) Refer to Article 10 Contract Adjustments and Disputes of Part 4 (395 General Conditions)

SECTION 106—CONTROL OF MATERIAL

106.01—Source of Supply and Quality Requirements

The Materials used throughout the 395 Work shall conform to the requirements of the Contract. The Design-Builder shall regulate his supplies so that there will be a sufficient quantity of tested Material on hand at all times to prevent any delay of work. Except as otherwise specified, Materials, Equipment, and components that are to be incorporated into the finished work shall be new and fit for their intended purpose.

At the option of the Concessionaire, Materials may be approved at the source of supply. If it is found during the life of the Contract that previously approved sources of supply do not supply Materials or Equipment conforming to the Contract requirements, do not furnish the valid test data required to document the quality of the Material or Equipment, or do not furnish documentation to validate quantities to document payment, the Design-Builder shall change the source of supply and furnish Material or Equipment from other approved sources. The Design-Builder shall notify the Concessionaire of this change, and provide the same identifying information noted in this Section, at least 60 days prior to their use on the 395 Project, but not less than two weeks prior to delivery.

Materials shall not contain toxic, hazardous, or regulated solid wastes or be furnished from a source containing toxic, hazardous or regulated solid wastes.

When optional Materials are included in the Contract, the Design-Builder shall advise the Concessionaire in writing of the specific Materials selected. Thereafter, the Design-Builder shall use the selected Materials throughout the 395 Project unless a change is authorized in writing by the Concessionaire. However, when the Design-Builder has an

option as to the type of pipe that may be used, he may use any of the approved types for each size of pipe, but he shall use the same type for a particular line. The Concessionaire may authorize other types and sources in an emergency that will not unreasonably delay delivery of the selected Material.

Equipment and Material guaranties or warranties that are normally given by a manufacturer or supplier, or are otherwise required in the Contract, shall be obtained by the Design-Builder and assigned to the Concessionaire in writing. The Design-Builder shall also provide an in-service operation guaranty on all mechanical and electrical Equipment and related components for a period of at least six months beginning on the date of partial acceptance of that specific item(s) or Final Completion of the 395 Project.

106.02—Material Delivery

The Design-Builder shall advise the Quality Assurance Manager and the Concessionaire at least 2 weeks prior to the delivery of any Material from a commercial source. Upon delivery of any such Material to the 395 Project, the Design-Builder shall provide the Concessionaire with one copy of all invoices (prices are not required). The following Materials shall also comply with Section 109.01: asphalt concrete; dense graded aggregate, to include aggregate base, Subbase, and Select Material; fine aggregate; open graded coarse aggregate; crusher run aggregate; and Road stabilization aggregate. The printed weights of each load of these Materials, as specified in Section 109.01, shall accompany the delivery, and such information shall be furnished to the Lead QA Inspector at the 395 Project.

106.03—Local Material Sources (Pits and Quarries)

The requirements set forth herein apply exclusively to non-commercial pits and quarries from which Materials are obtained for use on contracts awarded by the Concessionaire.

- (a) Local Material sources shall be concealed from view from the completed Roadway and any existing public Roadway. Concealment shall be accomplished by selectively locating the pit or quarry and spoil pile, providing environmentally compatible screening between the pit or quarry site and the Roadway, or using the site for another purpose after removal of the Material, or restoration equivalent to the original use (such as farm land, pasture, turf, etc.). The foregoing requirements shall also apply to any pit or quarry opened or reopened by a Subcontractor. However, the requirements will not apply to commercial sand and gravel and quarry operations actively processing Material at the site prior to the date of the execution of the Contract.
- (b) The Design-Builder shall furnish the Concessionaire a statement signed by the property owner in which the property owner agrees to the use of his property as a source of Material for the 395 Project. Upon completion of the use of the property as a Material source, the Design-Builder shall furnish the Concessionaire a release signed by the property owner indicating that the property has been satisfactorily restored. The requirements for a signed statement and release will not apply to commercial sources, sources owned by the Design-Builder, and sources furnished by the Concessionaire.
- (c) Local Material pits and quarries that are not operated under a local or State permit shall not be opened or reopened without authorization by the Concessionaire. The Design-Builder shall submit for approval a site plan, including, but not limited to, the following:
 - 1. The location and approximate boundaries of the Excavation; with a slope gradient of 3:1 or greater;
 - 2. Procedures to minimize erosion and siltation;
 - 3. Provision of environmentally compatible screening;
 - 4. Restoration;
 - 5. Cover vegetation;

6. Other use of the pit or quarry after removal of Material, including the spoil pile;
7. The drainage pattern on and away from the area of land affected, including the directional flow of water and a certification with appropriate calculations that verify all receiving Channels are in compliance with Minimum Standard 19 of the Virginia Erosion and Sediment Control Regulations;
8. Location of haul Roads and stabilized construction entrances if construction Equipment will enter a paved Roadway;
9. Constructed or natural waterways used for discharge;
10. A sequence and schedule to achieve the approved plan;
11. The total drainage area for temporary sediment traps and basins shall be shown. Sediment traps are required if the runoff from a watershed area of less than three acres flows across a disturbed area. Sediment basins are required if the runoff from a watershed area of three acres or more flows across a disturbed area. The Design-Builder shall certify that the sediment trap or basin design is in compliance with the 395 Contract Documents and all Legal Requirements. Once a sediment trap or basin is constructed, the dam and all outfall areas shall be immediately stabilized.

The Design-Builder's design and restoration shall be in accordance with the 395 Contract Documents and all Legal Requirements.

If the approved plan provides for the continued use or other use of the pit or quarry beyond the date of Final Completion, the Design-Builder shall furnish the Concessionaire a bond made payable to the Concessionaire in an amount equal to the Concessionaire's estimate of the cost of performing the restoration work. If the pit or quarry is not used in accordance with the approved plan within eight months after Final Completion, the Design-Builder shall perform restoration work as directed by the Concessionaire, forfeit his bond, or furnish the Concessionaire with evidence that he has complied with the applicable requirements of the State Mining Law.

- (d) Topsoil on Department owned or furnished Borrow sites shall be stripped and stockpiled as directed by the Concessionaire for use as needed within the construction limits of the 395 Project or in the reclamation of Borrow and Disposal Areas.
- (e) If payment is to be made for Material measured in its original position, Material shall not be removed until Digital Terrain Model (DTM) or cross-sections have been taken. The Material shall be reserved exclusively for use on the 395 Project until completion of the 395 Project or until final DTM or cross-sections have been taken.
- (f) If the Design-Builder fails to provide necessary controls to prevent erosion and siltation, if such efforts are not made in accordance with the approved sequence, or if the efforts are found to be inadequate the Concessionaire will withdraw approval for the use of the site and may cause the Design-Builder to cease all contributing operations and direct his efforts toward corrective action or may perform the 395 Work with State forces or other means as determined by the Concessionaire. If the Design-Builder does not perform such work, the cost of performing the 395 Work plus 25 percent for supervisory and administrative personnel will be deducted from monies due the Design-Builder.
- (g) Costs for applying seed, fertilizer, lime, mulch, and for restoration, drainage, erosion and siltation control, regrading, haul Roads, and screening shall be included in the 395 Contract Price for the type of Excavation or other appropriate Contract items.
- (h) If the Design-Builder fails to fulfill the provisions of the approved plan for screening or restoring Material sources, the Concessionaire may withhold and use for the purpose of performing such work any monies due the Design-Builder. The Design-Builder shall be held liable for penalties, fines, or damages incurred by the Concessionaire as a result of his failure to prevent erosion or siltation and take restorative action.

- (i) After removing all the Material from the local material sources, the Design-Builder shall remove metal, lumber, and other debris resulting from his operations and shall shape and landscape the area in accordance with the approved plan for such work.
- (j) **Sources Furnished by the Department:** Sources furnished by the Department will be made available to the Design-Builder together with the right to use such property as may be required for a plant site, stockpiles, and haul roads. The Design-Builder shall confine his Excavation operations to those areas of the property specified in the Contract. The Design-Builder shall be responsible for Excavation that shall be performed in order to furnish the specified Material.
- (k) **Sources Furnished by the Design-Builder:** When the Design-Builder desires to use local Material from sources other than those furnished by the Department, he shall first secure the approval of the Concessionaire. The use of Material from such sources will not be permitted until test results have been approved by the Concessionaire and written authority for its use has been issued by the appropriate agency, organization or individual.

The Design-Builder shall acquire the necessary rights to take Material from sources he locates and shall pay all related costs, including costs that may result from an increase in the length of the haul. Costs of exploring, sampling, testing, and developing such sources shall be borne by the Design-Builder. The Design-Builder shall obtain representative samples from at least two borings in parcels of 10 acres or less and at least three additional borings per increment of 5 acres or portion thereof to ensure that lateral changes in Material are recorded. Drill logs for each test shall include a soil description and the moisture content at intervals where a soil change is observed or at least every 5 feet of depth for consistent Material. Samples obtained from the boring shall be tested by an approved Laboratory for grading, Atterberg limits, CBR, maximum density, and optimum moisture. The Concessionaire will review and evaluate the Material based on test results provided by the Design-Builder. The Concessionaire will reject any Material from a previously approved source that fails a visual examination or whose test results show that it does not conform to the 395 Contract Documents.

106.04—Disposal Areas

The Design-Builder shall dispose of unsuitable or Surplus Material shown in the 395 Contract Documents according to Contract requirements as specified herein. Material not used on the 395 Project shall be disposed of by the Design-Builder off the Right of Way. The Design-Builder shall obtain the necessary rights to property to be used as an approved Disposal Area. For the purpose of these Division I Amendments to the Standard Specifications an approved Disposal Area is defined as that which is owned privately, not operated under a local or State permit, and has been approved by the Concessionaire for use in disposing of Material not used on the 395 Project.

The Design-Builder shall furnish the Concessionaire a statement signed by the property owner in which the owner agrees to the use of his property for the deposit of Material from the 395 Project. Upon completion of the use of the property as an approved Disposal Area, the Design-Builder shall furnish the Concessionaire a release signed by the property owner indicating that the property has been satisfactorily restored. This requirement will be waived for commercial sources, sources owned by the Design-Builder, and sources furnished by the Department.

If an approved Disposal Area is not designated in the Contract, the Design-Builder shall obtain the necessary rights to property to be used as an approved Disposal Area.

Prior to the Concessionaire approving the Design-Builder's Disposal Area, the Design-Builder shall submit a site plan that shall show:

1. The location and approximate boundaries of the Disposal Area.
2. Procedures to minimize erosion and siltation.
3. Provision of environmentally compatible screening.

4. Restoration.
5. Cover vegetation.
6. Other use of the Disposal Area.
7. The drainage pattern on and away from the area of land affected, including the directional flow of water and a certification with appropriate calculations that verify all receiving Channels are in compliance with Minimum Standard 19 of the Virginia Erosion and Sediment Control Regulations.
8. Location of haul roads and stabilized construction entrances if construction Equipment will enter a paved Roadway.
9. Constructed or natural waterways used for discharge.
10. A sequence and schedule to achieve the approved plan.
11. The total drainage area for temporary sediment traps and basins shall be shown. Sediment traps are required if the runoff from a watershed area of less than three acres flows across a disturbed area. Sediment basins are required if the runoff from a watershed area of three acres or more flows across a disturbed area. The Design-Builder shall certify that the sediment trap or basin design is in compliance with the 395 Contract Documents and all Legal Requirements. Once a sediment trap or basin is constructed, the dam and all outfall areas shall be immediately stabilized. Costs for the work described herein shall be included in the Contract Price. The Design-Builder shall certify that the sediment basin design is in compliance with the Virginia Erosion and Sediment Control Regulations, all local, state, and federal ordinances, and Section 107.16.

Disposal Areas shall be cleared but need not be grubbed. The clearing work shall not damage grass, shrubs, or vegetation outside the limits of the approved area and haul roads thereto. After the Material has been deposited, the area shall be shaped to minimize erosion and siltation of nearby streams and landscaped in accordance with the approved plan for such work or shall be used as approved by the Concessionaire. The Design-Builder's design and restoration shall conform to the Contract requirements and federal, state, and local laws and regulations.

Excavated rock in excess of that used in Embankments in accordance with the requirements of Section 303 shall be deposited off the Right of Way in an approved Disposal Area. Deposits whose surface is composed largely of rock shall be leveled by special arrangement of the Material or reduction of the irregularity of the surface by crushing projections to create a reasonably uniform and neat appearance.

The Design-Builder's design and restoration shall be in accordance with the requirements of the 395 Contract Documents and Legal Requirements.

If the Design-Builder fails to provide and maintain necessary controls to prevent erosion and siltation, if such efforts are not made in accordance with the approved sequence, or if the efforts are found to be inadequate, the Concessionaire will withdraw approval for the use of the site and may cause the Design-Builder to cease all contributing operations and direct his efforts toward corrective action or may perform the 395 Work with State forces or other means as determined by the Concessionaire, and deduct the cost of performing the 395 Work plus 25 percent for supervisory and administrative personnel from monies due or to become due the Design-Builder.

Costs for applying seed, lime, fertilizer, and mulch; reforestation; drainage; erosion and siltation control; regrading; haul roads; and screening shall be included in the 395 Contract Price.

Materials encountered by the Design-Builder shall be handled and disposed of as follows:

1. **Unsuitable Material** -. The Design-Builder's geotechnical engineer shall confirm that slopes, earthwork, pavement, and foundation subgrades satisfy the design and 395 Contract Document requirements. The Design-Builder's geotechnical engineer shall perform an inspection of all embankment and pavement

subgrades and minor structure excavations immediately prior to placement of embankment fill, aggregate base, subbase or bedding materials to identify excessively soft, loose, dry or saturated soils that exhibit excessive pumping, weaving or rutting under the weight of the construction equipment. Materials unsuitable for use in the 395 Work, as defined in Attachment 3.4a (395 Geotechnical Data Report) of Part 2 (395 Project Information and Technical Requirements), shall be disposed of at an approved Disposal Area or landfill licensed to receive such Material unless the materials can be adequately treated in place through chemical and/or mechanically stabilized method that shall be approved by the Concessionaire. Such method shall be approved prior to use in the 395 Work. All Unsuitable Materials shall be disposed of off-site and/or treated in place at no cost to the Concessionaire unless specifically stated otherwise in the 395 Contract Documents. Design-Builder shall identify unsuitable Materials and methods of treatment on the plans and cross sections.

2. **Surplus Material** as shown in the 395 Contract Documents that is not classified as unsuitable may be used to flatten slopes, to fill in ramp gores and medians provided the material is placed in accordance with the earthwork specifications. Surplus Material that is not needed shall be disposed of at an approved Disposal Area, a landfill licensed to receive such Material, or as directed by the Concessionaire in writing.

Surplus Material stockpile areas on the right-of-way shall be cleared but need not be grubbed. The clearing work shall not damage grass, shrubs, or vegetation outside the limits of the approved area and the haul Roads thereto. Placement of fill material shall not adversely affect existing drainage structures. Within 7 days after the material has been deposited, the area shall be shaped and stabilized to minimize erosion and siltation.

3. **Organic materials** such as, but not limited to, tree stumps and limbs (not considered merchantable timber), roots, rootmat, leaves, grass cuttings, or other similar materials shall be chipped or shredded and used on the 395 Project as mulch, given away, sold as firewood or mulch, burned at the Design-Builder's option if permitted by local ordinance, or disposed of at a facility licensed to receive such materials. Organic material shall not be buried in State Rights of Way or in an approved Disposal Area.
4. **Inorganic materials** such as brick, cinder block, broken concrete without exposed reinforcing steel, or other such material shall be disposed of at an approved Disposal Area or landfill licensed to receive such materials. If disposed of in an approved Disposal Area, the material shall have enough cover to promote soil stabilization in accordance with Section 303 and shall be restored in accordance with other provisions of this Section.

Concrete without exposed reinforcing steel, may be crushed and used as rock in accordance with Section 303. If approved by the Concessionaire, these materials may be blended with soils that meet AASHTO M57 requirements and deposited in fill areas within the right-of-way in accordance with the requirements of Section 303 as applicable.

5. **Excavated rock** in excess of that used within the 395 Project site in accordance with Section 303 shall be treated as surplus material.
6. **Other materials** such as, but not limited to, antifreeze, asphalt (liquid), building forms, concrete with reinforcing steel exposed, curing compound, fuel, Hazardous Materials, lubricants, metal, metal pipe, oil, paint, wood or metal from building demolition, or similar materials shall not be disposed of at an approved Disposal Area but shall be disposed of at a landfill licensed to receive such material.
7. Coal or other valuable materials uncovered during prosecution of the 395 Work that are not specifically addressed by the Contract shall be disposed of as the Concessionaire directs in writing.

If the Design-Builder fails to fulfill the provisions of the approved plan for screening or restoring Disposal Areas, the Concessionaire may withhold and use for the purpose of performing such work any moneys due the Design-

Builder. The Design-Builder shall be held liable for all penalties, fines, or damages incurred by the Concessionaire as a result of his failure to prevent erosion or siltation.

106.05—Rights For and Use of Materials Found on 395 Project

With the approval of the Concessionaire, the Design-Builder may use in the 395 Project any materials found in the Excavation that comply with the requirements of the 395 Contract Documents. The Design-Builder shall replace at his own expense with other acceptable material the Excavation material removed and used that is needed for use in Embankments, Backfills, approaches, or otherwise. The Design-Builder shall not excavate or remove any material from within the construction limits that is not within the grading limits, as indicated by the slope and grade lines. The Design-Builder shall not own and shall not have the right to sell, trade or exchange, any coal or other valuable materials uncovered during the prosecution of the work without the Concessionaire's specific written authorization.

106.06—Samples, Tests, and Cited Specifications

The Design-Builder shall inspect and test materials in accordance with the QA/QC Plan. Unless reference is made to a specific dated specification or special provision, references in the 395 Contract Documents to AASHTO, ASTM, VTM, and other standard test methods and materials requirements shall refer to either the test specifications that have been formally adopted or the latest interim or tentative specifications that have been published by the appropriate committee of such organizations as of the date of the RFP.

Where permitted by the Special Provision for Use of Domestic Material, the inspection cost of structural steel items, precast concrete items, and prestressed concrete items fabricated in a country other than the continental United States shall be borne by the Design-Builder. Inspection of structural fabrication shall be performed in accordance with the requirements of the appropriate VTM by a commercial Laboratory approved by the Department. Additional cleaning or repair necessary because of environmental conditions in transit shall be at the Design-Builder's expense. Materials requiring an MSDS will not be accepted at the 395 Project site for sampling without the document.

106.07—Plant Inspection

If the Concessionaire inspects materials at the source, the following conditions shall be met:

- (a) The Concessionaire shall have the cooperation and assistance of the Design-Builder and producer of the Materials.
- (b) The Concessionaire shall have full access to parts of the plant that concern the manufacture or production of the Materials being furnished.
- (c) For Materials accepted under a quality assurance plan, the Design-Builder or producer shall furnish equipment and maintain a plant laboratory at locations approved for plant processing of Materials. The Design-Builder or producer shall use the laboratory and equipment to perform quality control testing.

The laboratory shall be of weatherproof construction, tightly floored and roofed, and shall have adequate lighting, heating, running water, ventilation, and electrical service. The ambient temperature shall be maintained between 68 degrees F and 86 degrees F and thermostatically controlled. The laboratory shall be equipped with a telephone, intercom, or other electronic communication system connecting the laboratory and scale house if the facilities are not in close proximity to each other. The laboratory shall be constructed in accordance with the requirements of local building codes.

The Design-Builder or producer shall furnish, install, maintain, and replace, as conditions necessitate, testing equipment specified by the appropriate ASTM, AASHTO method, or VTM being used and provide necessary office equipment and supplies to facilitate keeping records and generating test reports. The Design-Builder or producer's technician shall maintain current copies of test procedures performed in the laboratory. The Design-Builder shall calibrate or verify all balances, scales, and weights associated with testing performed as specified in AASHTO R18. The Design-Builder or producer shall also provide and maintain an approved test stand for

accessing truck beds for the purpose of sampling and inspection. The Concessionaire may approve a single laboratory to service more than one plant belonging to the same Design-Builder or producer.

For crushed glass, the plant equipment requirements are waived in lieu of an independent third-party evaluation and certification of crushed glass properties by an AASHTO Materials Reference Laboratory (AMRL)-accredited commercial soil testing Laboratory demonstrating that the supplied Material conforms to Section 203 requirements. Random triplicate samples will be evaluated and analyzed for every 1,000 tons of Material supplied to the 395 Project. The averaged results will be used for evaluation purposes. Suppliers of crushed glass shall maintain third party certification records for a period of three years.

- (d) Adequate safety measures shall be provided and maintained.
- (e) Design-Builder shall inspect all Materials upon delivery to the site for compliance with Contract requirements. All non-conforming Materials shall be rejected and removed from the site.

106.08—Storing Materials

Materials shall be stored in a manner so as to ensure the preservation of their quality and fitness for the work. When considered necessary by the Concessionaire, Materials shall be stored in weatherproof buildings on wooden platforms or other hard, clean surfaces that will keep the Material off the ground. Materials shall be covered when directed by the Concessionaire. Stored Material shall be located so as to facilitate their prompt inspection. Approved portions of the Right of Way may be used for storage of Material and Equipment and for plant operations. However, Equipment and Materials shall not be stored within the clear zone of the travel lanes open to traffic.

The Design-Builder shall provide additional required storage space at his expense. Private property shall not be used for storage purposes without the written permission of the owner or lessee. The Design-Builder shall furnish copies of the owner's written permission to the Concessionaire. Upon completion of the use of the property, the Design-Builder shall furnish the Concessionaire a release signed by the property owner indicating that the property has been satisfactorily restored.

Chemicals, fuels, lubricants, bitumens, paints, raw sewage, and other harmful materials as determined by the Concessionaire and the VDPES *General Permit for Discharge of Stormwater from Construction Activities* shall not be stored within any floodplain unless no other location is available and only then shall the material be stored in a secondary containment structure(s) with an impervious liner. Also, any storage of these materials in proximity to natural or man-made drainage conveyances or otherwise where the materials could potentially reach a waterway if released under adverse weather conditions, must be stored in a bermed or diked area or inside a container capable of preventing a release. Double-walled storage tanks shall meet the berm/dike containment requirement except for storage within flood plains. Any spills, leaks, or releases of such materials shall be addressed in accordance with Section 107.16(b) and (e). Accumulated rain water may also be pumped out of the impoundment area into approved dewatering devices. All proposed pollution prevention measures and practices must be identified by the Design-Builder in his Pollution Prevention Plan as required by the Specifications, other 395 Contract Documents and/or the VDPES *General Permit for Discharge of Stormwater from Construction Activities*.

106.09—Handling Materials

Materials shall be handled in a manner that will preserve their quality, integrity, and fitness for the 395 Work. Aggregates shall be transported in vehicles constructed to prevent loss or segregation of materials.

106.10—Unacceptable Materials

Materials that do not conform to the requirements of the 395 Contract Documents shall be considered unacceptable. Such Materials, whether in place or not, will be rejected and shall be removed from the site of the 395 Work and replaced at no additional cost to the Concessionaire. If it is not practical for the Design-Builder to remove rejected Material immediately, the Concessionaire will mark the rejected Material for identification. Rejected Material whose defects have been corrected shall not be used until the Concessionaire gives written approval for its use. Upon the

Design-Builder's failure to comply promptly with any order of the Concessionaire made under this Section, the Concessionaire may, in addition to other rights and remedies, have the unacceptable material removed and replaced, and deduct the cost of such removal and replacement from monies due or to become due the Design-Builder. The Concessionaire shall file documentation of the correction with resolution of the Non-conformance report (NCR).

106.11—Material Furnished by the Concessionaire

The Design-Builder shall furnish all Materials required to complete the 395 Work except those specified to be furnished by the Concessionaire.

Material furnished by the Concessionaire will be delivered or made available to the Design-Builder at the points specified in the Contract. The cost of handling and placing Materials after delivery to the Design-Builder shall be included in the Contract Price

After receipt of the Materials, the Design-Builder shall be responsible for Material delivered to him, including shortages, deficiencies, and damages that occur after delivery, and any demurrage charges.

106.12—Critical Materials (Not Used)

SECTION 107—LEGAL RESPONSIBILITIES

107.01—Legal Requirements to Be Observed (Not Used) Refer to Part 4 (395 General Conditions) – Section 2.5, Legal Requirements

107.02—Permits, Certificates, and Licenses. (Not Used) Refer to Part 4 (395 General Conditions) – Section 2.6, Governmental Approvals, and Section 3.5, Governmental Approvals

107.03—Federal-Aid Provisions (Not Used) Refer to Part 3 (395 Design-Build Contract) Exhibit 11.3 federal Requirements

107.04—Furnishing Right of Way (Not Used) Refer to Part 4 (395 General Conditions)

107.05—Patented Devices, Materials, and Processes (Not Used) Refer to Part 4 (395 General Conditions) – Article 7, Indemnification

107.06—Personal Liability of Public Officials (Not Used) Refer to Part 4 (395 General Conditions)

107.07—No Waiver of Legal Rights (Not Used)

107.08—Protecting and Restoring Property and Landscape

The Design-Builder shall preserve property and improvements along the boundary lines of and adjacent to the 395 Work unless their removal or destruction is specified in the 395 Contract Documents. The Design-Builder shall use suitable precautions to prevent damage to such property.

When the Design-Builder finds it necessary to enter on private property, beyond the limits of the construction Easement shown in the 395 Contract Documents, he shall secure from the owner or lessee a written permit for such entry prior to moving thereon. An executed copy of this permit shall be furnished to the Concessionaire.

The Design-Builder shall be responsible for any damage or injury to property during the prosecution of the 395 Work resulting from any act, omission, neglect, or misconduct in the Design-Builder's method of executing the 395 Work or attributable to defective work or Materials. This responsibility shall not be released until Final Completion of the 395 Project and a written release from the owner or lessee of the property is obtained. The term "property" includes motor vehicles.

When direct or indirect damage is done to property by or on account of any act, omission, neglect, or misconduct in the Design-Builder's method of executing the 395 Work or in consequence of the non-execution thereof on the part of the Design-Builder, the Design-Builder shall restore such property to a condition similar or equal to that existing before such damage was done by repairing, rebuilding, or restoring, as may be directed by the Concessionaire, or shall make a settlement with the property owner for such property damage. The Design-Builder shall secure from the owner a written release from any claim against the Concessionaire without additional compensation therefore. A copy of this release shall be furnished to the Concessionaire.

107.09—Design-Builder's Responsibility for Utility Property and Services

At points where the Design-Builder's operations are on or adjacent to the properties of any utility, including railroads, and damage to which might result in expense, loss, or inconvenience, work shall not commence until arrangements necessary for the protection thereof have been completed.

The Design-Builder shall cooperate with owners of utilities so that removal and adjustment operations may progress in a timely, responsible, and reasonable manner, duplication of adjustment work may be reduced to a minimum, and services rendered by those parties will not be unnecessarily interrupted.

If any utility service is interrupted as a result of accidental breakage or of being exposed or unsupported, the Design-Builder shall promptly notify the proper authority and shall cooperate fully with the authority in the restoration of service. If utility service is interrupted, repair work shall be continuous until service is restored. No work shall be undertaken around fire hydrants until provisions for continued service have been approved by the local fire authority. When the Design-Builder's work operations require the disconnection of "in service" fire hydrants, the Design-Builder shall notify the locality's fire department or communication center at least 24 hours prior to disconnection. In addition, the Design-Builder shall notify the locality's fire department or communications center no later than 24 hours after reconnection of such hydrants. The Design-Builder shall be responsible for any damage to utilities that, in the investigation and determination of the Concessionaire, is found to be attributable to the Design-Builder's neglect, means, or methods of performing the 395 Work.

Nothing in this Section shall be construed to be in conflict with Section 107.08.

The Design-Builder shall comply with all requirements of the *Virginia Underground Utility Damage Prevention Act* (the Miss Utility law). The Design-Builder shall not make or begin any Excavation or demolition without first notifying the Miss Utility notification center for the area where the 395 Project is located. The Design-Builder shall wait to begin its Excavation or demolition until 7:00 a.m. on the third working day following the Design-Builder's notice to the notification center, unless the underground utilities cannot be marked within that time due to extraordinary circumstances. The Design-Builder may commence Excavation or demolition work only if confirmed through the Ticket Information Exchange (TIE) System, or the Design-Builder is notified directly, that all applicable utilities have either marked their underground line locations or reported that no lines are present in the 395 Work zone.

107.10—Restoration of Work Performed by Others (Not Used) Refer to Section 1.7.3 of Part 2 (395 Project Information and Technical Requirements)

107.11—Use of Explosives (Not Used) Refer to Section 1.8.10 of Part 2 (395 Project Information and Technical Requirements)

107.12—Responsibility for Damage Claims (Not Used) Refer to Part 4 (395 General Conditions), Article 7 Indemnification)

107.13—Labor and Wages (Not Used) Refer to Part 3 Exhibit 11.3 (Federal Requirements)

107.14—Equal Employment Opportunity (Not Used) Refer to Part 3 Exhibit 11.3 (Federal Requirements)

107.15—Use of Disadvantaged Business Enterprises (DBEs), Small, Women-Owned, and Minority-Owned Businesses (SWaMs), and Local and Veteran Hiring Program Requirements

Design-Builder shall comply with all requirements of Exhibit 107.15.1, Exhibit 107.15.2, and Exhibit 107.15.3 of Part 5. During performance of the Design-Build Work for the 395 Project, the Department has established an on-the-job training goal of seventeen (17) participants for the 395 Express Lanes Work and an on-the-job training goal of seven (7) participants for the Additional Department Improvements Work. New hire participation represents employees paid specifically for work performed on the 395 Project and may be randomly verified through the checking of payrolls. Hiring by subcontractors will count toward meeting the goals.

107.16—Environmental Stipulations

By signing the Proposal, the Offeror shall have stipulated (1) that any facility to be used in the performance of the Contract (unless the Contract is exempt under the Clean Air Act as amended [42 U.S.C. 1857, et seq., as amended by P.L. 91-604], the Federal Water Pollution Control Act as amended [33 U.S.C. 1251 et seq. as amended by P.L. 92-500], and Executive Order 11738 and regulations in implementation thereof [40 C.F.R., Part 15]) is not listed on the EPA's List of Violating Facilities pursuant to 40 C.F.R. 15.20; and (2) that the Concessionaire will be promptly notified prior to the Award of the Contract if the Offeror receives any communication from the Director, Office of Federal Activities, EPA, indicating that a facility to be used for the Contract is under consideration to be listed on the EPA's List of Violating Facilities.

No separate payment will be made for the 395 Work or precautions described herein.

Reference is made in various subsections of this section to Tidewater, Virginia. For the purposes of identifying the affected regions assigned to this designation and the requirements therein Tidewater, Virginia is defined as the Counties of Accomack, Arlington, Caroline, Charles City, Chesterfield, Essex, Fairfax, Gloucester, Hanover, Henrico, Isle of Wight, James City, King George, King and Queen, King William, Lancaster, Mathews, Middlesex, New Kent, Northampton, Northumberland, Prince George, Prince William, Richmond, Spotsylvania, Stafford, Surry, Westmoreland and York and the Cities of Alexandria, Chesapeake, Colonial Heights, Fairfax, Falls Church, Fredericksburg, Hampton, Hopewell, Newport News, Norfolk, Petersburg, Poquoson, Portsmouth, Richmond, Suffolk, Virginia Beach and Williamsburg.

- (a) **Erosion and Siltation:** The Design-Builder shall exercise every reasonable precaution, including temporary and permanent soil stabilization measures, throughout the duration of the 395 Project to control erosion and prevent siltation of adjacent lands, rivers, streams, wetlands, lakes, and impoundments. Soil stabilization or erosion control measures shall be applied to erodible soil or ground materials exposed by any activity associated with construction, including clearing, grubbing, and grading, but not limited to local or on-site sources of materials, stockpiles, Disposal Areas and haul roads.

The Design-Builder shall comply with Sections 301.02 and 303.03 of the Specifications. Should the Design-Builder as a result of negligence or noncompliance fail to provide soil stabilization in accordance with these specifications, the cost of temporary soil stabilization in accordance with the provisions of Section 303 shall be at the Design-Builder's expense.

Temporary measures shall be coordinated with the 395 Work to ensure effective and continuous erosion and sediment control. Permanent erosion control measures and drainage facilities shall be installed as the 395 Work progresses.

The Design-Builder shall have within the limits of the 395 Project during land disturbance activities, an employee certified by the Department in Erosion and Sediment control who shall inspect erosion and sediment control and pollution prevention practices, devices and measures for proper installation and operation and promptly report their findings to the Inspector. Failure on the part of the Design-Builder to maintain appropriate erosion and sediment control or pollution prevention devices in a functioning condition may result in the Concessionaire notifying the Design-Builder in writing of specific deficiencies. Deficiencies shall be corrected

immediately or as otherwise directed by the Concessionaire. If the Design-Builder fails to correct or take appropriate actions to correct the specified deficiencies within 24 hours (or as otherwise directed) after receipt of such notification, the Concessionaire may do one or more of the following: require the Design-Builder to suspend work in other areas and concentrate efforts towards correcting the specified deficiencies, withhold payment of monthly progress estimates, or proceed to correct the specified deficiencies and deduct the entire cost of such work from monies due the Design-Builder. Failure on the part of the Design-Builder to maintain a Department certified erosion and sediment control employee within the 395 Project limits when land disturbance activities are being performed will result in the Concessionaire suspending work related to any land disturbance activity until such time as the Design-Builder is in compliance with this requirement.

(b) Pollution:

1. **Water:** The Design-Builder shall exercise every reasonable precaution throughout the duration of the 395 Project to prevent pollution of rivers, streams, and impoundments. Pollutants such as, but not limited to, chemicals, fuels, lubricants, bitumens, raw sewage, paints, sedimentation, and other harmful material shall not be discharged into or alongside rivers, streams, or impoundments or into Channels leading to them. The Design-Builder shall provide the Concessionaire a contingency plan for reporting and immediate actions to be taken in the event of a dump, discharge, or spill within eight hours after he has mobilized to the 395 Project site.

Construction discharge water shall be filtered to remove deleterious materials prior to discharge into State waters. Filtering shall be accomplished by the use of a standard dewatering basin or a dewatering bag or other measures approved by the Concessionaire. Dewatering bags shall conform to Section 245. During specified spawning seasons, discharges and construction activities in spawning areas of State waters shall be restricted so as not to disturb or inhibit aquatic species that are indigenous to the waters. Neither water nor other effluence shall be discharged onto wetlands or breeding or nesting areas of migratory waterfowl. When used extensively in wetlands, heavy Equipment shall be placed on mats. Temporary construction fills and mats in wetlands and flood plains shall be constructed of approved non-erodible materials and shall be removed by the Design-Builder to natural ground when the Concessionaire so directs.

If the Design-Builder dumps, discharges, or spills any oil or chemical that reaches or has the potential to reach a waterway, he shall immediately notify all appropriate jurisdictional Governmental Units in accordance with the requirements of the Contract and the *VPDES General Permit For Discharge of Stormwater From Construction Activities* and shall take immediate actions to contain, remove, and properly dispose of the oil or chemical.

Solids, sludges, or other pollutants removed in the course of the treatment or management of pollutants shall be disposed of in a manner that prevents any pollutant from such materials from entering surface waters in compliance with all applicable state and federal laws and regulations.

Excavation material shall be disposed of in approved areas above the mean high water mark shown in the 395 Contract Documents in a manner that will prevent the return of solid or suspended materials to State waters. If the mark is not shown on the Plans, the mean high water mark shall be considered the elevation of the top of stream banks.

Constructing new Bridge(s) and dismantling and removing existing Bridge(s) shall be accomplished in a manner that will prevent the dumping or discharge of construction or Disposable Materials into rivers, streams, or impoundments.

Construction operations in rivers, streams, or impoundments shall be restricted to those areas where identified on the Plans and to those that must be entered for the construction of structures. Rivers, streams, and impoundments shall be cleared of Falsework, piling, debris, or other obstructions placed therein or caused by construction operations. Stabilization of the streambed and banks shall occur immediately upon completion of work if work is suspended for more than 14 days.

The Design-Builder shall prevent stream constriction that would reduce stream flows below the minimum, as defined by the State Water Control Board, during construction operations.

If it is necessary to relocate an existing stream or drainage facility temporarily to facilitate construction, the Design-Builder shall design and provide temporary Channels or culverts of adequate size to carry the normal flow of the stream or drainage facility. The Design-Builder shall submit a temporary relocation design to the Concessionaire for review and acceptance in sufficient time to allow for discussion and correction prior to beginning the 395 Work the design covers. Costs for the temporary relocation of the stream or drainage facility shall be included in the Contract. Stabilization of the streambed and banks shall occur immediately upon completion of, or during the 395 Work, if the 395 Work is suspended for more than 14 days.

Temporary Bridges or other minimally invasive structures shall be used wherever the Design-Builder finds it necessary to cross a stream more than twice in a 6 month period unless otherwise authorized by water quality permits issued by the U. S. Army Corps of Engineers, Virginia Marine Resources Commission, or the Virginia Department of Environmental Quality for the Contract.

Conduct all operations near rivers, streams, or impoundments in accordance with applicable water quality permits. Do not conduct clearing or grubbing within 100 feet of the limits of Ordinary High Water or a delineated wetland until authorized by the Concessionaire.

2. **Air:** The Design-Builder shall comply with the provisions of the Contract and the State Air Pollution Control Law and Rules of the State Air Pollution Control Board, including notifications required therein.

Burning shall be performed in accordance with all applicable local laws and ordinances and under the constant surveillance of watchpersons. Care shall be taken so that the burning of materials does not destroy or damage property or cause excessive air pollution. The Design-Builder shall not burn rubber tires, asphalt, used crankcase oil, or other materials that produce dense smoke. Burning shall not be initiated when atmospheric conditions are such that smoke will create a hazard to the motoring public or airport operations. Provisions shall be made for flagging vehicular traffic if visibility is obstructed or impaired by smoke. At no time shall a fire be left unattended.

Asphalt mixing plants shall be designed, equipped, and operated so that the amount and quality of air pollutants emitted will conform to the rules of the State Air Pollution Control Board.

- a. **VOC Emission Control Areas** - The Design-Builder is advised that when the 395 Project is located in a volatile organic compound (VOC) emissions control area identified in the State Air Control Board Regulations (9 VAC 5-20-206) and in the Table I-3 below the following limitations shall apply:

- (1) Open burning is prohibited during the months of May, June, July, August, and September in VOC Emissions Control areas
- (2) Cutback asphalt is prohibited April through October except when use or application as a penetrating prime coat or tack is necessary in Virginia Department of Environmental Quality Volatile Organic Compound (VOC) Emissions Control Areas.* See the 9 VAC 5-40, Article 39 (Emission Standards for Asphalt Paving Operations) and 9 VAC 5-130 (Regulation for Open Burning) for further clarification.

TABLE I-3			
VOC Emissions Control Area	VDOT District	Jurisdiction	
Northern Virginia	NOVA	Alexandria City Arlington County Fairfax County Fairfax City Falls Church City Loudoun County Manassas City Manassas Park City Prince William County	
Northern Virginia	Fredericksburg	Stafford County	
Fredericksburg	Fredericksburg	Spotsylvania County Fredericksburg City	
Hampton Roads	Fredericksburg	Gloucester County	
Hampton Roads	Hampton Roads	Chesapeake City Hampton City Isle of Wight County James City County Newport News City Norfolk City Poquoson City Portsmouth City Suffolk City Virginia Beach City Williamsburg City York County	
Richmond	Richmond	Charles City County Chesterfield County Colonial Heights City Hanover County Henrico County Hopewell City Petersburg City Prince George County Richmond City	
Western Virginia	Staunton	Frederick County Winchester City	
Western Virginia	Salem	Roanoke County Botetourt County Roanoke City Salem City	

* Regulations for the Control and Abatement of Air Pollution ([9 VAC 5-20-206](#))

- (3) Emission standards for asbestos incorporated in the EPA’s National Emission Standards for Hazardous Air Pollutants apply to the demolition or renovation of any institutional, commercial, or industrial building, structure, facility, installation, or portion thereof that contains friable asbestos or where the Design-Builder’s methods for such actions will produce friable asbestos.

The Design-Builder shall submit demolition notification the United States Environmental Protection Agency (USEPA) and the Virginia Department of Labor and Industry a minimum of 10 business days prior to starting work on the following bridge activities:

- a) Dismantling and removing existing structures
- b) Moving an entire structure
- c) Reconstruction and repairs involving the replacement of any load-bearing component of a structure

Address notifications to:

Virginia Department of Labor and Industry
Asbestos Program
Powers-Taylor Building
13 South Thirteenth Street
Richmond, VA 23219

Land and Chemical Division
EPA Region III
Mail Code LC62
1650 Arch St.
Philadelphia, PA 19103-2029

3. **Noise:** The Design-Builder's operations shall be performed so that exterior noise levels measured during a noise-sensitive activity shall not exceed 80 decibels. Such noise level measurements shall be taken at a point on the perimeter of the construction limit that is closest to the adjoining property on which a noise sensitive activity is occurring. A *noise-sensitive activity* is any activity for which lowered noise levels are essential if the activity is to serve its intended purpose and not present an unreasonable public nuisance. Such activities include, but are not limited to, those associated with residences, hospitals, nursing homes, churches, schools, libraries, parks, and recreational areas.

The Design-Builder shall monitor construction-related noise. If construction noise levels exceed 80 decibels during noise sensitive activities, the Design-Builder shall take corrective action before proceeding with operations. The Design-Builder shall be responsible for costs associated with the abatement of construction noise and the delay of operations attributable to noncompliance with these requirements.

The Concessionaire may prohibit or restrict to certain portions of the 395 Project any work that produces objectionable noise between 10 PM and 6 AM If other hours are established by local ordinance, the local ordinance shall govern.

Equipment shall in no way be altered so as to result in noise levels that are greater than those produced by the original equipment.

When feasible, the Design-Builder shall establish haul routes that direct his vehicles away from developed areas and ensure that noise from hauling operations is kept to a minimum.

These requirements shall not be applicable if the noise produced by sources other than the Design-Builder's operation at the point of reception is greater than the noise from the Design-Builder's operation at the same point.

- (c) **Forest Fires:** The Design-Builder shall take all reasonable precautions to prevent and suppress forest fires in any area involved in construction operations or occupied by him as a result of such operations. The Design-Builder shall cooperate with the proper authorities of Governmental Units in reporting, preventing, and

suppressing forest fires. Labor, tools, or equipment furnished by the Design-Builder upon the order of any forest official issued under authority granted the official by law shall not be considered a part of the Contract. The Design-Builder shall negotiate with the proper forest official for compensation for such labor, tools, or equipment

- (d) **Archeological, Paleontological, and Rare Mineralogical Findings:** In the event of the discovery of prehistoric ruins, Indian or early settler sites, burial grounds, relics, fossils, meteorites, or other articles of archeological, paleontological, or rare mineralogical interest during the prosecution of 395 Work, the Design-Builder shall act immediately to suspend work at the site of the discovery and notify the Concessionaire. The Concessionaire will immediately notify the proper State authority charged with the responsibility of investigating and evaluating such finds. The Design-Builder shall cooperate and, upon the request of the Concessionaire, assist in protecting, mapping, and removing the findings. Labor, tools, or Equipment furnished by the Design-Builder for such work will be paid for in accordance with the requirements of Section 104.03. Findings shall become the property of the Commonwealth unless they are located on federal lands, in which event they shall become the property of the U.S. government.

When such findings delay the progress or performance of the 395 Work, the Design-Builder shall notify the Concessionaire in accordance with the Contract.

- (e) **Storm Water Pollution Prevention Plan and VPDES General Permit for the Discharge of Stormwater from Construction Activities**

A Stormwater Pollution Prevention Plan (SWPPP) identifies potential sources of pollutants which may reasonably be expected to affect the stormwater discharges from the construction site and any off site support facilities located on VDOT rights of way and easements. The SWPPP also describes and ensures implementation of practices which will be used to minimize or prevent pollutants in such discharges.

The SWPPP shall include, but not be limited to, the approved Erosion and Sediment Control (ESC) Plan, the approved Stormwater Management (SWM) Plan (if applicable), the approved Pollution Prevention Plan, and all related Specifications, Standards, and requirements contained within the 395 Contract Documents and shall be required for all land-disturbing activities that disturb 10,000 square feet or greater, or 2,500 square feet or greater in Tidewater, Virginia.”

Land-disturbing activities that disturb one 1 acre or greater require coverage under the Department of Environmental Quality’s VPDES General Permit for the Discharge of Stormwater from Construction Activities (hereafter referred to as the VPDES Construction Permit) According to IIM-LD-242, VDOT will apply for and secure VPDES Construction Permit coverage for all applicable land disturbing activities on VDOT rights of way or easements for which it has contractual control, including off-site (outside the 395 Project limits) support facilities on VDOT rights of way or easements that directly relate to the construction activity.

The Design-Builder shall be responsible for securing VPDES Construction Permit coverage and complying with all permit conditions for all support facilities that are not located on VDOT rights of way or easements.

The required contents of a SWPPP for those land disturbance activities requiring coverage under the VPDES Construction Permit are found in Section II of the permit. While a SWPPP is an important component of the VPDES Construction Permit, it is only one of the many requirements for the land disturbing activity that must be addressed in order to be in full compliance with the conditions of this permit. The requirements of this permit will be satisfied by the Design-Builder’s compliance with the 395 Project’s SWPPP terms and conditions.

The Design-Builder and all other persons that oversee or perform activities covered by the VPDES Construction Permit shall be responsible for reading, understanding, and complying with all of the terms, conditions and requirements of the permit and the 395 Project’s SWPPP including, but not limited to, the following:

1. 395 Project Implementation Responsibilities

The Design-Builder shall be responsible for the installation, maintenance, inspection, and, on a daily basis, ensuring the functionality of all erosion and sediment control measures on a daily basis and all other stormwater runoff control and pollution prevention measures identified within or referenced within the SWPPP, the construction plans, the specifications, all applicable permits, and all other 395 Contract Documents or applicable governmental approvals.

The Design-Builder shall be solely responsible for the temporary erosion and sediment control protection and permanent stabilization of all borrow areas and soil disposal areas located outside of VDOT right of way or easement.

The Design-Builder shall prevent or minimize any storm water or non-storm water discharge that will have a reasonable likelihood of adversely affecting human health or public and/or private properties.

2. Certification Requirements

In addition to satisfying the Section 107.16(a) personnel certification requirements, the Design-Builder shall certify his activities by completing, signing, and submitting Form C-45 VDOT SWPPP Design-Builder Certification Statement to the Concessionaire at least 7 days prior to commencing any 395 Project-related land-disturbing activities, both within the 395 Project limits and any support facilities located on VDOT rights of way or easements outside the 395 Project limits.

3. SWPPP Requirements for Support Facilities

Support facilities shall include, but not be limited to, off-site Borrow and Disposal Areas, construction and waste materials or Equipment storage areas, equipment and vehicle washing, maintenance, storage and fueling areas, storage areas for fertilizers, fuels, or chemicals, concrete wash out areas, sanitary waste facilities and any other areas that may generate a storm water or non-stormwater discharge directly related to the construction site.

Support Facilities located on VDOT rights of way or easements:

- a. For those support facilities located within the 395 Project limits but not included in the construction plans for the 395 Project, the Design-Builder shall develop a SWPPP in accordance with Chapter 10 of the VDOT Drainage Manual which shall include, where applicable, an erosion and sediment control plan according to IIM-LD-11, a stormwater management plan according to IIM-LD-195, and a pollution prevention plan according to these Specifications and the SWPPP General Information Sheet notes in the construction plans or other such 395 Contract Documents. All plans developed shall be reviewed and approved by appropriate personnel certified through DEQ's ESC and SWM Certification program and shall be developed according to Section 105.10 and shall be submitted to the Concessionaire for review and approval. Once approved, the Concessionaire will notify the Design-Builder in writing that the plans are accepted as a component of the 395 Project's SWPPP and VPDES Construction Permit coverage (where applicable) and shall be subject to all conditions and requirements of the VPDES Construction Permit and all other 395 Contract Documents. No land disturbing activities can occur in the support area(s) until written notice to proceed is provided by the Concessionaire.
- b. For support facilities located outside the 395 Project limits and not included in the construction plans for the 395 Project, the Design-Builder shall develop a SWPPP in accordance with Chapter 10 of the VDOT Drainage Manual which shall include, where applicable, an erosion and sediment control plan according to IIM-LD-11, a stormwater management plan (where applicable) according to IIM-LD-195, a pollution prevention plan according to these specifications and the SWPPP General Information Sheet notes in the construction plans or other such 395 Contract Documents and all necessary documents for obtaining VPDES Construction Permit coverage according to IIM-LD-242. All plans

developed shall be reviewed and approved by appropriate personnel certified through DEQ's ESC and SWM Certification program and shall be developed according to Section 105.10 and shall be submitted to the Concessionaire for review and approval. Once approved by the Concessionaire, the Design-Builder will apply for VPDES Construction Permit coverage according to IIM-LD-242. The support facility shall be subject to all conditions and requirements of the VPDES Construction Permit and all other 395 Contract Documents. No land disturbing activities can occur in the support area(s) until written notice to proceed is provided by the Concessionaire.

4. Inspection Procedures

a. Inspection Requirements

The Design-Builder shall be responsible for conducting site inspections in accordance with the requirements herein. Site inspections shall include erosion and sediment control and pollution prevention practices and facilities. The Design-Builder shall document such inspections by completion of Form C-107, Construction Runoff Control Inspection Form, in strict accordance with the directions contained within the form. Inspections shall include all areas of the site disturbed by construction activity, all on-site support facilities and all off site support facilities within VDOT right of way or easement. Inspections shall be conducted at least once every 7 calendar days (equivalent to once every five business days) and within 48 hours following any measureable storm event. In the event a measureable storm event occurs when there are more than 48 hours between business days, the inspection shall occur no later than the next business day. A business day is defined as Monday through Friday excluding State holidays. A measurable storm event is defined as one producing 0.25 inches of rainfall or greater over a 24 hour time period. The Design-Builder shall install rain gage(s) in accordance with VDOT Drainage Manual on the 395 Project site for the purposes of determining the occurrence of a measureable storm event. The rain gage(s) shall be observed no less than once each business day at the time prescribed in the SWPPP General Information Sheet notes in the construction plans or other 395 Contract Documents to determine if a measureable storm event has occurred. The procedures for determining the occurrence of a measurable storm event are identified in the SWPPP General Information Sheet notes in the construction plans or other 395 Contract Documents. For those areas of the site that have been temporarily stabilized or where land disturbing activities have been suspended due to continuous frozen ground conditions and stormwater discharges are unlikely, the inspection schedule may be reduced to once per month. If weather conditions (such as above freezing temperatures or rain or snow events) make stormwater discharges likely, the Design-Builder shall immediately resume the regular inspection schedule. Those definable areas where final stabilization has been achieved will not require further inspections provided such areas have been identified in the 395 Project's Stormwater Pollution Prevention Plan.

b. Corrective Actions

If a site inspection identifies an existing control measure that is not being maintained properly or operating effectively; an existing control measure that needs to be modified; locations where an additional control measure is necessary; or any other deficiencies in the erosion and sediment control and pollution prevention plan, corrective action(s) shall be completed as soon as practical and prior to the next anticipated measurable storm event but no later than seven days after the date of the site inspection that identified the deficiency.

5. Unauthorized Discharges and Reporting Requirements

The Design-Builder shall not discharge into State waters sewage, industrial wastes, other wastes, or any noxious or deleterious substances nor shall otherwise alter the physical, chemical, or biological properties of such waters that render such waters detrimental for or to domestic use, industrial consumption, recreational or other public uses.

a. Notification of non-compliant discharges

The Design-Builder shall immediately notify the Concessionaire upon the discovery of or the potential of any unauthorized, unusual, extraordinary, or non-compliant discharge from the land construction activity or any of support facilities located on VDOT right of way or easement. Where immediate notification is not possible, such notification shall be not later than 24 hours after said discovery.

b. Detailed report requirements for non-compliant discharges

The Design-Builder shall submit to the Concessionaire within 5 days of the discovery of any actual or potential non-compliant discharge a written report describing details of the discharge to include a description of the nature and location of the discharge; the cause of the discharge; the date of occurrence; the length of time that the discharge occurred, the volume of the discharge; the expected duration and total volume if the discharge is continuing; a description of any apparent or potential effects on private and/or public properties and State waters or endangerment to public health; and any steps planned or taken to reduce, eliminate, and prevent a recurrence of the discharge. A completed Form C-107 shall be used for such reports.

6. Changes and Deficiencies (Not Used)

7. Amendments, Modifications, Revisions and Updates to the SWPPP

- a. The Design-Builder shall amend the SWPPP whenever site conditions, construction sequencing or scheduling necessitates revisions or modifications to the erosion and sediment control plan, the pollution prevention plan, or any other component of the SWPPP for the land disturbing activity or onsite support facilities,
- b. The Design-Builder shall amend the SWPPP to identify any additional or modified erosion and sediment control and pollution prevention measures implemented to correct problems or deficiencies identified through any inspection or investigation process.
- c. The Design-Builder shall amend the SWPPP to identify any new or additional person(s) or contractor(s) not previously identified that will be responsible for implementing and maintaining erosion and sediment control and pollution prevention devices.
- d. The Design-Builder shall update the SWPPP to include:
 - (1) A record of dates when major grading activities occur, construction activities temporarily or permanently cease on a portion of the site, and stabilization measures are initiated.
 - (2) Documentation of replaced or modified erosion and sediment control and pollution prevention controls where periodic inspections or other information have indicated that the controls have been used inappropriately or incorrectly.
 - (3) Identification of areas where final stabilization has occurred and where no further SWPPP or inspection requirements apply.
 - (4) The date of any prohibited discharges, the discharge volume released, and what actions were taken to minimize the impact of the release.
 - (5) A description of any measures taken to prevent the reoccurrence of any prohibited discharge.
 - (6) A description of any measures taken to address any issues identified by the required erosion and sediment control and pollution prevention inspections.

- e. The Design-Builder shall update the SWPPP no later than seven days after the implementation and/or the approval of any amendments, modifications, or revisions to the erosion and sediment control plan, the pollution prevention plan, or any other component of the SWPPP.
- f. Revisions or modifications to the SWPPP shall be approved by the Concessionaire and shall be documented by the Design-Builder on a designated plan set (Record Set) in accordance with Chapter 10 of the VDOT Drainage Manual. All updates to the SWPPP shall be signed by the delegated authority as identified on the SWPPP.
- g. The record set of plans shall be maintained with other SWPPP documents on the 395 Project site or at a location convenient to the 395 Project site where no on site facilities are available.

107.17—Construction Safety and Health Standards

- (a) In the performance of this Contract the Design-Builder shall comply with all applicable Federal, State, and local laws governing safety, health, and sanitation (23 CFR 635). The Design-Builder, Subcontractors at any tier, and their respective employees, agents and invitees, shall at all times while in or around the 395 Project site comply with all applicable laws, regulations, provisions, and policies governing safety and health under the Virginia Occupational Safety and Health (VOSH) Standards adopted under the Code of Virginia, and any laws, regulations, provisions, and policies incorporated by reference including but not limited to the Federal Construction Safety Act (Public Law 91-54), 29 CFR Chapter XVII, Part 1926, Occupational Safety and Health Regulations for Construction, and the Occupation Safety and Health Act (Public Law 91-596), 29 CFR Chapter XVII, Part 1910 Occupational Safety and Health Standards for General Industry, and subsequent publications updating these regulations.
- (b) The Design-Builder shall provide all safeguards, safety devices and protective equipment, and take any other needed actions as it determines, or as the Concessionaire may determine, to be reasonably necessary to protect the life and health of employees on the job and the safety of the public, and to protect property in connection with the performance of the 395 Work. The Design-Builder shall be responsible for maintaining and supervising all safety and health protections and programs to ensure compliance with this Section. The Design-Builder shall routinely inspect the 395 Project site for safety and health violations. The Design-Builder shall immediately abate any violations of the safety and health requirements or duties at no cost to the Concessionaire.
- (c) It is a condition of this Contract, and shall be made a condition of each subcontract ,which the Design-Builder enters into pursuant to this Contract, that the Design-Builder and any Subcontractor shall not permit any employees in performance of the Contract, to work in surroundings or under conditions which are unsanitary, hazardous, or dangerous to their health or safety as determined by the Virginia Work Area Protection Manual or under construction safety and health standards (29 CFR 1926) promulgated by the Secretary of Labor, in accordance with Section 107 of the Contract Work Hours and Safety Standards Act (40 U.S.C. 3704).
- (d) VOSH personnel, on all Federal-aid construction contracts and related subcontracts, pursuant to 29 CFR 1926.3, the Secretary of Labor or authorized representative thereof, shall have right of entry to any site of contract performance to inspect or investigate the matter of compliance with the construction safety and health standards and to carry out their duties.

107.18—Sanitary Provisions

The Design-Builder shall provide and maintain in a neat, sanitary condition such accommodations for the use of Employees as may be necessary to comply with the requirements of the State and local Board of Health or other bodies or tribunals having jurisdiction.

107.19—Railway-Highway Provisions (Not Used)

107.20— U.S. Coast Guard Coordination of Construction Over or Adjacent to Navigable Waters

Although a U.S. Coast Guard permit is not required for the sign replacement work over the Potomac River (because the Design-Builder should not need to block the navigation channel to perform this work), formal coordination with the U.S. Coast Guard is required. Prior to starting construction operations, the Design-Builder shall meet with the Concessionaire, Department and the U.S. Coast Guard (U.S. Coast Guard Coordination Meeting) to present its planned operations and the potential impacts those operations may pose to water traffic. As part of this meeting, the parties shall establish in writing the proper protocol for emergency closures and be governed accordingly.

Following the U.S. Coast Guard Coordination meeting, the Design-Builder shall submit its proposed schedule of operations in writing to the Concessionaire. The Concessionaire shall review and provide written comments, if applicable, to the Design-Builder within 7 days following receipt of the Design-Builder's schedule of operations. The Design-Builder shall incorporate the Concessionaire's comments and submit its notice of scheduled operations to the Concessionaire, Department and to the U.S. Coast Guard at least 30 days prior to commencement of any permitted construction or demolition operations. U.S. Coast Guard acceptance of the Design-Builder's written schedule of operations is a condition precedent to the Design-Builder's commencement of those operations.

In addition, the Design-Builder shall request and obtain Concessionaire and U.S. Coast Guard approval in writing before commencing any operations that deviate from the Design-Builder's schedule of operations when these operations interfere or have the potential to interfere with navigation of water traffic outside of timeframes previously approved by the Concessionaire and the U.S. Coast Guard.

Notices shall be sent to the U.S. Coast Guard, Fifth District Bridge Office (OBR), 431 Crawford Street, Portsmouth, VA 23704-5004. Payment of any penalty or fine that may be levied by the U.S. Coast Guard for Design-Builder violations of Bridge regulations found in 33 CFR Parts 114, 115, 116, 117 and 118 shall be the responsibility of the Design-Builder. Further, any delay to the Contract as a result of actions or inaction by the Design-Builder relative to the requirements herein that are determined by the Concessionaire to be the fault of the Design-Builder will be a non-compensable and non-excusable delay.

The cost to comply with the requirements of this provision and to provide and maintain and temporary navigation lights, signals and other temporary work associated with the structure(s) under this Contract required by the U.S. Coast Guard for the protection of navigation during construction or demolition operations shall be included in the 395 Contract Price.

107.21—Size and Weight Limitations

- (a) **Hauling or Moving Material and Equipment on Public Roads Open to Traffic:** The Design-Builder shall comply with legal size and weight limitations in the hauling or moving of Material and Equipment on public Roads open to traffic unless the hauling or moving is covered by a hauling permit.
- (b) **Hauling or Moving Material and Equipment on Public Roads Not Open to Traffic:** The Design-Builder shall comply with legal weight limitations in the hauling or moving of Material and Equipment on public Roads that are not open to traffic unless the hauling or moving is permitted elsewhere herein or is otherwise covered by a hauling permit. The Design-Builder shall be liable for damage that results from the hauling or moving of Material and Equipment. The hauling or moving of Material and Equipment on the Pavement Structure or across any structure during various stages of construction shall be subject to additional restrictions as specified or directed by the Concessionaire.
- (c) **Furnishing Items in Component Parts of Sections:** If the size or weight of fabricated or manufactured items together with that of the hauling or moving vehicle exceeds the limitations covered by hauling permit policies and other means of transportation are not available, permission will be given to furnish the items in component parts of sections with adequately designed splices or connections at appropriate points. Permission for such adjustments shall be requested in writing, and approval in writing shall be secured from the Concessionaire prior to fabrication or manufacture of the items. The request shall state the reasons for adjustment and shall be accompanied by supporting data, including Working Drawings where necessary.

- (d) **Construction Loading of Structures:** In the construction, reconstruction, widening, or repair of bridge, culvert, retaining wall and other similar type structures including approaches, the Design-Builder shall consider construction loads during the planning and prosecution of the work. If the loading capacity of these type structure(s) is not shown in the Contract, the Design-Builder is responsible for contacting the office of the appropriate district bridge engineer to obtain the loading capacity information. Construction loads include but are not limited to the weight of cranes, trucks, other heavy construction or material delivery equipment, as well as the delivery or storage of materials placed on or adjacent to the structure or parts thereof during the various stages (phases) of the work in accordance with the Design-Builder's proposed work plan. The Design-Builder shall consider the effect(s) of construction loads on the loading capacity of these type structure(s) in his sequencing of the work and operations, including phase construction. At the Concessionaire's request the Design-Builder shall be prepared to discuss or review his proposed operations with the Concessionaire with regard to construction loads to demonstrate he has taken such into consideration in the planning and execution of the work.

SECTION 108—PROSECUTION AND PROGRESS OF WORK

108.01—Prosecution of Work (Not Used) Refer to Part 2 (395 Project Information and Technical Requirements)

108.02—Limitation of Operations (Not Used) Refer to Part 2 (395 Project Information and Technical Requirements)

108.03—Progress Schedule (Not Used) Refer to Part 3 (395 Design-Build Contract) – Article 11 - Other Provisions

108.04—Determination and Extension of Completion Date (Not Used) Refer to Part 4 (395 General Conditions) – Article 8 Time, Article 9 Changes to the 395 Contract Price and Time, and Article 10 Contract Adjustments and Disputes

108.05—Suspension of 395 Work Ordered by the Concessionaire (Not Used) Refer to Part 4 (395 General Conditions) Article 11 Stop Work and Termination for Cause

108.06—Failure to Complete on Time (Not Used) Refer to Part 4 (395 General Conditions) – Article 8 Time

108.07—Default of Contract (Not Used) Refer to Part 4 (395 General Conditions) – Article 11 Stop Work and Termination for Cause

108.08—Termination of Contract (Not Used) Refer to Part 4 (395 General Conditions) – Article 11 Stop Work and Termination for Cause

108.09—Acceptance (Not Used) Refer to Part 4 (395 General Conditions) – Article 6 Payment

108.10—Termination of Design-Builder's Responsibilities (Not Used) Refer to Part 4 (395 General Conditions) – Article 11 Stop Work and Termination for Cause

SECTION 109—MEASUREMENT AND PAYMENT

109.01—Measurement of Quantities

- (a) **General:** Unless otherwise specifically stated to the contrary in Article 6 of the Part 3 (395 Design-Build Contract), this Section 109.01 will only be applicable to 395 Contract Price adjustments made under Article 9 of Part 4 (395 General Conditions). The methods of measurement and computations to be used to determine quantities of Material furnished and work performed will be those generally recognized as conforming to good engineering practice.

Longitudinal measurements for surface area computations will be made along the surface and transverse measurements will be the surface measure shown in the 395 Contract Documents or ordered in writing by the Concessionaire. Individual areas of obstructions with a surface area of 9 square feet or less will not be deducted from surface areas measured for payment.

Structures will be measured in accordance with the neat lines shown in the 395 Contract Documents

Items that are measured by the linear foot will be measured parallel to the base or foundation upon which they are placed.

Allowance will not be made for surfaces placed over an area greater than that shown in the 395 Contract Documents or for any Material moved from outside the area of the cross-section and lines shown in the 395 Contract Documents.

When standard manufactured items are specified and are identified by weights or dimensions, such identification will be considered nominal. Unless more stringently controlled by tolerances in the 395 Contract Documents, manufacturing tolerances established by the industries involved will be accepted.

- (b) **Measurement by Weight:** Materials that are measured or proportioned by weight shall be weighted on accurate scales as specified in this Section. When material is paid for on a tonnage basis, personnel performing the weighing shall be certified by the Department and shall be bonded to the Commonwealth of Virginia in the amount of \$10,000 for the faithful observance and performance of the duties of the weighperson required herein. The bond shall be executed on a form having the exact wording as the Weighpersons Surety Bond Form furnished by the Department and shall be submitted to the Department prior to the furnishing of the tonnage material.

The Design-Builder shall have the weighperson perform the following:

1. Furnish a signed weigh ticket for each load that shows the date, load number, plant name, size and type of material, project number, schedule or purchase order number, and the weights specified herein.
2. Maintain sufficient documentation so that the accumulative tonnage and distribution of each lot of material, by contract, can be readily identified.
3. Submit by the end of the next working day a summary of the number of loads and total weights for each type of material by contract.

Trucks used to haul Material being paid for by weight shall display the truck uniform identification number and legal gross and legal net weight limits. These markings shall be no less than 2 inches high and permanently stenciled on each side of the truck with contrasting color and located as to be clearly visible when the vehicle is positioned on the scales and observed from normal position of the weigh Person at the scale house.

The truck to be used in the weighing operation shall be the weight of the empty truck determined with full tank(s) of fuel and the operator seated in the cab. The tare weight of trucks shall be recorded to the nearest 20 pounds. At the option of the Design-Builder, a new tare may be determined for each load. When a new tare is obtained for each load, the requirement for full tank(s) of fuel will be waived.

Net rail shipment weights may be used for pay quantities when evidenced by railroad bills of lading. However, such weights will not be accepted for pay quantities of Materials that subsequently pass through a stationary mixing plant.

Scales shall conform to the requirements for accuracy and sensitivity as set forth in the *National Institute of Standards and Technology Handbook No. 44 for Specification Tolerances and Requirements for Commercial and Weighing Devices*. Scales used in the weighing of Materials paid for on a tonnage basis shall be approved

and sealed in accordance with the requirements of the policies of the Bureau of Weights and Measures of the Department of Agriculture and Consumer Services, or other approved agencies, at least once every six months and upon being moved. Hopper and truck scales shall be serviced and tested by a scale service representative at least once every six months. Hopper scales shall be checked with a minimum 500 pounds of test weights and truck scales shall be checked with a minimum 20,000 pounds of test weights.

Copies of scale test reports shall be maintained on file at the scale location for at least 18 months, and copies of all scale service representative test reports shall be forwarded to the Concessionaire.

The quantity of Materials paid for on a tonnage basis shall be determined on scales equipped with an automatic printer. Truck scale printers shall print the net weight and either the gross or tare weight of each load. Hopper scale printers shall print the net weight of each load. The weigh ticket shall also show the legal gross weight for Material weighed on truck scales and the legal net weight for Material weighed on hopper scales.

If the automatic printer becomes inoperative, the weighing operation may continue for 48 hours provided satisfactory visual verification of weights can be made. The written permission of the District Materials Engineer shall be required for the operation of scales after 48 hours.

If significant discrepancies are discovered in the printed weight, the ultimate weight for payment will be calculated on volume measurements of the Materials in place and unit weights determined by the Department.

- (c) **Measurement by Cubic Yard:** Material that is measured by the cubic yard, loose measurement or vehicular measurement, shall be hauled in approved vehicles and measured therein at the point of delivery. Material measured in vehicles, except streambed gravel, silt cleanout, or other self-consolidating material will be allowed at the rate of 2/3 the volume of the vehicle. The full volume of the vehicle will be allowed for streambed gravel. Such vehicles may be of any size or type acceptable to the Concessionaire provided the body is of such shape that the actual contents can be readily and accurately determined. Unless all approved vehicles are of uniform capacity, each vehicle shall bear a plainly legible identification mark indicating the specific approved capacity. Each vehicle shall be loaded to at least its water level capacity.

When approved by the Concessionaire in writing, Material specified to be measured by the cubic yard may be weighed and such weights converted to cubic yards for payment purposes. Factors for conversion from weight to volume measurement will be determined by the Concessionaire and shall be agreed to by the Design-Builder before they are used.

- (d) **Measurement by Lump Sum:** When used as an item of payment, the term *lump sum* will mean full payment for completion of work described in the Contract. When a complete structure or structural unit is specified as a Contract Item, the unit of measurement will be lump sum, and shall include all necessary fittings and accessories. The quantities may be shown in the 395 Contract Documents for items for which lump sum is the method of measurement. If shown, the quantities are approximate and are shown for estimating purposes only and no measurement of quantities will be made for payment. Items that are to be measured as complete units will be counted by the Concessionaire in the presence of a representative of the Design-Builder.

(e) **Measurement for Specific Materials:**

1. **Concrete (Measured by Volume Measure):** Concrete will be measured and computed by dividing the work into simple geometrical figures and adding their volumes.
2. **Concrete (Measured by Square or Lineal Measure):** Concrete will be measured and computed by dividing the work into simple geometrical figures and adding their areas or measuring linearly along the item's surface.
3. **Excavation, Embankment, and Borrow:** In computing volumes of Excavation, Embankment, and Borrow, methods having general acceptance in the engineering profession will be used. When the measurement is based on the cross-sectional area, the average end area method will be used.

4. **Asphalt:** Asphalt will be measured by the gallon, volumetric measurement, based on a temperature of 60 degrees F using the following correction factors:
 - a. 0.00035 per degree F for petroleum oils having a specific gravity 60/60 degrees F above 0.966
 - b. 0.00040 per degree F for petroleum oils having a specific gravity 60/60 degrees F between 0.850 and 0.966
 - c. 0.00025 per degree F for emulsified asphalt

Unless volume correction tables are available, the following formula shall be used in computing the volume of asphalt at temperatures other than 60 degrees F:

$$V^1 = V x [1 - K(T - 60)]$$

Where:

V = volume of asphalt to be corrected;

V^1 = volume of asphalt at 60 degrees F;

K = correction factor (coefficient of expansion); and

T = temperature in degrees F of asphalt to be corrected.

When asphalt is delivered by weight, the volume at 60 degrees F will be determined by dividing the net weight by the weight per gallon at 60 degrees F.

Asphalt will be measured by weight. Net certified scale weights, or weights based on certified volumes in the case of rail shipments, will be used as a basis of measurement, subject to correction when asphalt has been lost from the car or the distributor, disposed of, or otherwise not incorporated in the work.

When asphalt is shipped by truck or transport, net certified weights or volumes subjected to correction for loss or foaming may be used to compute quantities.

Only the quantity of asphalt actually placed in the work and accepted will be considered in determining the amount due the Design-Builder.

5. **Timber:** Timber will be measured in units of 1,000 foot-board-measure actually incorporated in the structure. Measurement will be based on nominal widths and thicknesses and the extreme length of each piece.
6. **Equipment rental:** Equipment rental will be measured by time in hours of actual working time and necessary traveling time of the Equipment within the limits of the 395 Project or source of supply and the 395 Project except when another method of measurement is specified.

109.02—Plan Quantities (Not Used)

109.03—Scope of Payment (Not Used) Refer to Part 4 (395 General Conditions)

109.04—Compensation for Altered Quantities (Not Used) Refer to Part 3 (395 Design-Build Contract) - Article 6, Contract Price and Part 4 (395 General Conditions) - Article 9, Changes to 395 Contract Price and Time

109.05—395 Contract Price Adjustments

395 Contract Price adjustments shall be made in conformance with the requirements of Article 9 of the Part 4 (395 General Conditions). In the event the 395 Contract Price adjustment is to be made under Subparagraphs .3 or .4 of

Section 9.4.1, or in the event of claims by Design-Builder under Article 10, then the rates for labor, Equipment, Materials and otherwise will be compensated in the following manner:

- (a) **Labor:** Unless otherwise approved, the Design-Builder will receive the rate of wage or scale as set forth in his most recent payroll for each classification of laborers, forepersons, and superintendent(s) who are in direct charge of the specific operation. The time allowed for payment will be the number of hours such workers are actually engaged in the work. If overtime work is authorized, payment will be at the normal overtime rate set forth in the Design-Builder's most recent payroll. If workers performing the class of labor needed have not been employed on the 395 Project, mutually agreed on rates will be established. However, the rates shall be not less than those predetermined for the 395 Project, if applicable. An amount equal to 45 percent of the approved payroll will be included in the payment for labor to cover administrative costs, profit, and benefits or deductions normally paid by the Design-Builder.
- (b) **Insurance and Tax:** The Design-Builder will receive an amount equal to 25 percent of the approved payroll exclusive of additives of administrative cost as full compensation for property damage and liability, workers' compensation insurance premiums, unemployment insurance contributions, and social security taxes.
- (c) **Materials:** The Design-Builder will receive the actual cost of Materials accepted by the Concessionaire that are delivered and used for the work including taxes, transportation, and handling charges paid by the Design-Builder, not including labor and Equipment rentals as herein set forth, to which 15 percent of the cost will be added for administration and profit. The Design-Builder shall make every reasonable effort to take advantage of trade discounts offered by Material suppliers. Any discount received shall pass through to the Concessionaire. Salvageable temporary construction Materials will be retained by the Concessionaire or their appropriate salvage value shall be credited, as agreed on by the Concessionaire.
- (d) **Equipment:** The Design-Builder shall provide the Concessionaire a list of all Equipment to be used in the work. For each piece of Equipment, the list shall include the serial number; date of manufacture; location from which Equipment will be transported; and for rental Equipment, the rental rate and name of the company from which it is rented. The Design-Builder will be paid rental rates for pieces of machinery, Equipment, and attachments necessary for prosecution of the work that are approved for use by the Concessionaire. Equipment rental will be measured by time in hours of actual time engaged in the performance of the work and necessary traveling time of the Equipment within the limits of the 395 Project or source of supply and the 395 Project. Hourly rates will not exceed 1/176 of the monthly rates of the schedule shown in the *Rental Rate Blue Book* modified in accordance with the *Rental Rate Blue Book* rate adjustment tables that are current at the time the Extra Work is performed. Equipment rental rates not modified by the adjustment factors or rate modifications indicated in the *Rental Rate Blue Book* will not be considered. Hourly rates for Equipment on standby will be at 50 percent of the rate paid for Equipment performing work. Operating costs shall not be included in the standby rate. For the purposes herein "standby time" is defined as the period of time Equipment ordered to the jobsite by the Concessionaire is available on-site for the work but is idle for reasons not the fault of the Design-Builder or normally associated with the efficient and necessary use of that Equipment in the overall operation of the work at hand.

Payment will be made for the total hours the Equipment is performing work. When Equipment is performing work less than 40 hours for any given week and is on standby, payment for standby time will be allowed for up to 40 hours, minus hours performing work. Payment will not be made for the time that Equipment is on the 395 Project in excess of 24 hours prior to its actual performance in the work. An amount equal to the *Rental Rate Blue Book* estimated operating cost per hour will be paid for all hours the Equipment is performing work. This operating cost shall be full compensation for fuel, lubricants, repairs, greasing, fueling, oiling, small tools, and other incidentals. No compensation will be paid for the use of machinery or equipment not authorized by the Concessionaire.

The Design-Builder will be paid freight cost covering the moving of Equipment to and from the specific work operation provided such cost is supported by an invoice showing the actual cost to the Design-Builder. However, such payment will be limited to transportation from the nearest source of available equipment. If

Equipment is not returned to the nearest equipment storage lot but is moved to another location, the freight cost paid will not exceed the cost of return to the nearest storage lot.

The rates for Equipment not listed in the *Rental Rate Blue Book* schedule shall not exceed the hourly rate being paid for such Equipment by the Design-Builder at the time of the performance of the Extra Work. In the absence of such rates, prevailing rates being paid in the area where the authorized work is to be performed shall be used.

If the Design-Builder does not possess or have readily available Equipment necessary for performing the Extra Work and such Equipment is rented from a source other than a company that is an Affiliate, payment will be based on actual invoice rates, to which 15 percent of the invoice cost will be added for administrative cost and profit. If the invoice rate does not include the furnishing of fuel, lubricants, repairs, and servicing, the invoice rate will be converted to an hourly rate, and an amount equal to the *Rental Rate Blue Book* estimated operating cost per hour will be added for each hour the Equipment is performing work.

- (e) **Miscellaneous:** No additional allowance will be made for attachments that are common accessories for Equipment as defined in the *Rental Rate Blue Book*, general superintendents, timekeepers, secretaries, the use of small hand held tools or other costs for which no specific allowance is herein provided. The Design-Builder will receive compensation equal to the cost of the bond, special railroad insurance premiums, and other additional costs necessary for the specific work as determined by the Concessionaire. The Design-Builder shall supply documented evidence of such costs.
- (f) **Compensation:** The compensation as set forth in this Section shall be accepted by the Design-Builder as payment in full for work performed on the basis described in this Section 109.05. At the end of each day, the Design-Builder's Representative and the Inspector shall compare and reconcile records of the hours of work and Equipment, labor, and Materials used in such work. Such accounting may not include actual costs or labor rates where these are not available but shall be used to verify quantities, types of Materials or labor, and number and types of Equipment.

If all or a portion of the work is performed by approved Design Consultants, Subcontractors, or Sub-Subcontractors, Design-Builder will be paid ten percent (10%) of the subcontract net costs to cover the Design-Builder's profit and administrative cost. The amount resulting will not be subject to any further additives. The itemized statements of costs as required below shall be submitted on a form that separates the subcontracted portions of the labor, Materials, and Equipment from the other costs.

- (g) **Statements:** Payments will not be made for work performed on the basis described in this Section 109.05 until the Design-Builder has furnished the Concessionaire duplicate itemized statements of the cost of such work detailed as follows:
 - 1. payroll indicating name, classification, date, daily hours, total hours, rate, and extension of each laborer, foreperson, and Superintendent.
 - 2. designation, dates, daily hours, total hours, rental rate, and extension for each unit of Equipment.
 - 3. quantities of Materials, prices, and extensions.
 - 4. transportation of Materials.

Statements shall be accompanied and supported by invoices for all Materials used and transportation charges. However, if Materials used are not specifically purchased for such work but are taken from the Design-Builder's stock, then in lieu of the invoices, the Design-Builder shall furnish an affidavit certifying that such Materials were taken from his stock; that the quantity claimed was actually used; and that the price, transportation, and handling claimed represented his actual cost.

109.06—Common Carrier Rates (Not Used)

109.07—Eliminated Items (Not Used)

109.08—Partial Payments (Not Used)

109.09—Payment for Material on Hand

When requested in writing by the Design-Builder, payment allowances may be made for materials secured for use on the 395 Project and required to complete the 395 Project. Such material payments will be made for only those actual quantities of materials identified in the Contract, approved change orders, or otherwise authorized and documented by the Concessionaire based on delivery tickets, bills of lading, or paid invoices. All such payments shall be in accordance with the following terms and conditions:

(a) **(Not Used)**

(b) **Other Materials:** For steel, precast, aggregate, pipe, guardrail, signs and sign assemblies, and other nonperishable material, an allowance of 100 percent of the cost to the Design-Builder for materials may be made when such material is delivered to the 395 Project and stockpiled or stored in accordance with the requirements specified herein. Prior to the granting of such allowances, the material shall have been tested and found acceptable to the Concessionaire. Allowances will be based on invoices, bills, or the estimated value of the material as approved by the Concessionaire.

(c) **Excluded Items:** No allowance will be made for fuels, form lumber, False Work, temporary structures, or other work that will not become an integral part of the finished construction. Additionally, no allowance will be made for perishable material such as cement, seed, plants, or fertilizer.

(d) **Storage:** Material for which payment allowance is requested shall be stored in an approved manner in areas where damage is not likely to occur. If any of the stored materials are lost or become damaged, the Design-Builder shall repair or replace them at no additional cost to the Concessionaire. Repair or replacement of such material will not be considered the basis for any extension of 395 Contract Time. If payment allowance has been made prior to such damage or loss, the amount so allowed or a proportionate part thereof will be deducted from the next progress estimate payment and withheld until satisfactory repairs or replacement has been made.

When it is determined to be impractical to store materials within the limits of the 395 Project, the Concessionaire may approve storage on private property or, for structural units and reinforcing steel, on the manufacturer's or fabricator's yard. Requests for payment allowance for such stored material shall be accompanied by a release from the owner or tenant of such property or yard agreeing to permit the removal of the materials from the property without cost to the Concessionaire. The Concessionaire must be allowed access to the materials for inspection during normal business hours.

(e) **Materials Inventory:** If the Design-Builder requests a payment allowance for properly stored Material, he shall submit a certified and itemized inventory statement to the Concessionaire no earlier than five days and no later than two days prior to the progress estimate date. The statement shall be submitted on forms furnished by the Concessionaire and shall be accompanied by invoices or other documents that will verify the Material's cost. Following the initial submission, the Design-Builder shall submit to the Concessionaire a monthly-certified update of the itemized inventory statement within the same time frame. The updated inventory statement shall show additional Materials received and stored with invoices or other documents and shall list Materials removed from storage since the last certified inventory statement, with appropriate cost data reflecting the change in the inventory. If the Design-Builder fails to submit the monthly-certified update within the specified time frame, the Concessionaire will deduct the full amount of the previous statement from the progress estimate.

At the conclusion of the 395 Project, the cost of Material remaining in storage for which payment allowance has been made will be deducted from the progress estimate.

109.10—Final Payment (Not Used)

109.11—Exhibits

The following exhibits are made part of, and incorporated into these Division I Amendments to the Standard Specifications.

EXHIBIT 107.15.1 - USE OF DISADVANTAGED BUSINESS ENTERPRISES FOR DESIGN-BUILD PROJECTS

EXHIBIT 107.15.2 - USE OF SMALL, WOMEN-OWNED, AND MINORITY-OWNED BUSINESSES

EXHIBIT 107.15.3 - LOCAL AND VETERAN HIRING PROGRAM FOR DESIGN-BUILD PROJECTS

**END OF PART 5
DIVISION I AMENDMENTS TO THE STANDARD SPECIFICATIONS**

VIRGINIA DEPARTMENT OF TRANSPORTATION
SPECIAL PROVISION

EXHIBIT 107.15.1

USE OF DISADVANTAGED BUSINESS ENTERPRISES FOR DESIGN-BUILD PROJECTS

January 4, 2017

A. Disadvantaged Business Enterprise (DBE) Program Requirements

Any Design-Builder, subcontractor, supplier, DBE firm, and contract surety involved in the performance of work on a federal-aid contract shall comply with the terms and conditions of the United States Department of Transportation (USDOT) DBE Program as the terms appear in Part 26 of the Code of Federal Regulations (49 CFR as amended), the USDOT DBE Program regulations; and the Virginia Department of Transportation's (VDOT or the Department) Road and Bridge Specifications and DBE Program rules and regulations.

For the purposes of this provision, Offeror is defined as any individual, partnership, corporation, or Joint Venture that formally submits a Statement of Qualification or Proposal for the work contemplated there under; Design-Builder is defined as any individual, partnership, or Joint Venture that contracts with the Department to perform the Work; and subcontractor is defined as any supplier, manufacturer, or subcontractor performing work or furnishing material, supplies or services to the contract. The Design-Builder shall physically include this same contract provision in every supply or work/service subcontract that it makes or executes with a subcontractor having work for which it intends to claim credit.

In accordance with 49 CFR Part 26 and VDOT's DBE Program requirements, the Design-Builder, for itself and for its subcontractors and suppliers, whether certified DBE firms or not, shall commit to complying fully with the auditing, record keeping, confidentiality, cooperation, and anti-intimidation or retaliation provisions contained in those federal and State DBE Program legal requirements. By submitting a Proposal on this contract, and by accepting and executing this contract, the Design-Builder agrees to assume these contractual obligations and to bind the Design-Builder's subcontractors contractually to the same at the Design-Builder's expense.

The Design-Builder and each subcontractor shall not discriminate on the basis of race, color, national origin, or sex in the performance of this contract. The Design-Builder shall carry out applicable requirements of 49 CFR Part 26 in the award, administration, and performance of this contract. Failure by the Design-Builder to carry out these requirements is a material breach of this contract, which will result in the termination of this contract or other such remedy, as VDOT deems appropriate.

All administrative remedies noted in this provision are automatic unless the Design-Builder exercises the right of appeal within the required timeframe(s) specified herein. Appeal requirements, processes, and procedures shall be in accordance with guidelines stated herein and current at the time of the proceedings. Where applicable, the Department will notify the Design-Builder of any changes to the appeal requirements, processes, and procedures after receiving notification of the Design-Builder's desire to appeal.

All time frames referenced in this provision are expressed in business days unless otherwise indicated. Should the expiration of any deadline fall on a weekend or holiday, such deadline will automatically be extended to the next normal business day.

B. DBE Certification

The only DBE firms eligible to perform work on a federal-aid contract for DBE contract goal credit are firms certified as Disadvantaged Business Enterprises by the Virginia Department of Small Business and Supplier Diversity (SBSD) or the Metropolitan Washington Airports Authority (MWAA) in accordance with federal and VDOT guidelines. DBE firms must be certified in the specific work listed for DBE contract goal credit. A directory listing of certified DBE firms can be obtained from the Virginia Department of Small Business and Supplier Diversity's website: <http://www.sbsd.virginia.gov>.

C. DBE Program-Related Certifications Made by Offerors/Design-Builders

By submitting a Proposal and by entering into any contract on the basis of that Proposal, the Offeror/Design-Builder certifies to each of the following DBE Program-related conditions and assurances:

1. That the Offeror/Design-Builder agrees to comply with the project construction and administration obligations of the USDOT DBE Program, 49 CFR Part 26 as amended, and the Standard Specifications setting forth the Department's DBE Program requirements.
2. Design-Builder shall comply fully with the DBE Program requirements in the execution and performance of the contract. Design-Builder acknowledges that failure to comply may result in enjoinderment from participation in future Department or State procurements and/or other legal sanctions.
3. To ensure that DBE firms have been given full and fair opportunity to participate in the performance of the contract. The Design-Builder certifies that all reasonable steps were, and will be, taken to ensure that DBE firms had, and will have, an opportunity to compete for and perform work on the contract. The Design-Builder further certifies that the Design-Builder shall not discriminate on the basis of race, color, age, national origin, or sex in the performance of the contract or in the award of any subcontract. Any agreement between a Design-Builder and a DBE whereby the DBE promises not to provide quotations for performance of work to other Design-Builders are prohibited.
4. Design-Builder shall make good faith efforts to obtain DBE participation in the proposed contract at or above the goal. The Offeror shall submit a written statement as a part of its Statement of Qualifications and/or Proposal indicating the Offeror's commitment to achieve the minimum requirement related to DBE goal indicated in Request for Qualification (RFQ) and/or Request for Proposal (RFP) for the entire value of the contract. The Offeror, by signing and submitting its Proposal, certifies the DBE participation information that will be submitted within the required time thereafter is true, correct, and complete, and that the information to be provided includes the names of all DBE firms that will participate in the contract, the specific item(s) that each listed DBE firm will perform, and the creditable dollar amounts of the participation of each listed DBE.
5. Offeror further certifies, by signing its Proposal, it has committed to meet the contract goal for DBE participation. Award of the contract will be conditioned upon meeting these and other listed requirements of 49 CFR Part 26.53 and the contract documents. By signing the Proposal, the Offeror certifies that good faith efforts will be made on work that it proposes to sublet; and that it will seek out and consider DBE firms as potential subcontractors and subconsultants. The Design-Builder shall, as a continuing obligation, contact DBE firms to solicit their interest, capability, and prices in sufficient time to allow them to respond effectively, and shall retain on file proper documentation to substantiate its good faith efforts.
6. Design-Builder shall not unilaterally terminate, substitute for, or replace any DBE firm that was designated in the executed contract in whole or in part with another DBE, any non-DBE firm, or with the Design-Builder's own forces or those of an affiliate of the Design-Builder without the prior written consent of Department as set out within the requirements of this Special Provision.

7. Design-Builder shall designate and make known to the Department a liaison officer who is assigned the responsibility of administering and promoting an active and inclusive DBE program as required by 49 CFR Part 26 for DBE firms. The designation and identity of this officer needs to be submitted only once by the Design-Builder.
8. Design-Builder shall comply fully with all contractual requirements and Legal Requirements of the USDOT DBE Program, and shall cause each DBE firm participating in the contract to fully perform the designated work items with the DBE firm's own forces and equipment under the DBE firm's direct supervision, control, and management. Where a contract exists and where the Design-Builder, DBE firm, or any other firm retained by the Design-Builder has failed to comply with federal or Department DBE Program requirements, Department has the authority and discretion to determine the extent to which the DBE contract regulations have not been met, and will assess against the Design-Builder any remedies available at law or provided in the contract.
9. If a bond surety assumes the completion of work, if for any reason VDOT has terminated the Design-Builder, the surety shall be obligated to meet the same DBE contract terms and requirements as were required of the original Design-Builder in accordance with the requirements of this specification.

D. DBE Program Compliance Procedures

The following procedures shall apply to the contract for DBE Program compliance purposes:

1. **Prequalification of Subcontractors:** All prospective DBE subcontractors shall prequalify with the Department in accordance with the *Rules Governing Prequalification*.
2. **DBE Goal, Good Faith Efforts Specified:** Design-Builder shall evidence attainment of the DBE commitment equal to or greater than the required DBE Goal through submission, to Department, of completed Form C-111, Minimum DBE Requirements; Form C-112, Certification of Binding Agreement; and Form C-48, Subcontractor/Supplier Solicitation and Utilization, as a part of the good faith efforts documentation set forth below:

Design Phase: Thirty (30) days after the Notice to Proceed for Design, the Design-Builder shall submit to Department for review and approval Forms C-111 and C-112 for each DBE firm to be utilized during the design phase to meet the DBE minimum requirement and Form C-48. Failure to submit the required documentation within the specified timeframe shall be cause to deny credit for any work performed by a DBE firm and delay approval of the Design-Builder's monthly payment.

Construction Phase: No later than thirty (30) days prior to the DBE firm undertaking any work, Design-Builder shall submit to Department for review and approval Forms C-111, C-112, and C-48. Failure to submit the required documentation within the specified timeframe shall result in disallowed credit of any work performed prior to approval of Forms C-111 and C-112 and delay approval of monthly payment.

The District Civil Rights Office (DCRO) will monitor good faith effort documentation quarterly to determine progress being made toward meeting the DBE minimum requirement established for the contract.

Forms C-48, C-49, C-111, and C-112 can be obtained from the VDOT website at:

<http://vdotforms.vdot.virginia.gov/>

3. **Good Faith Efforts Described:** Department will determine if Design-Builder demonstrated adequate good faith efforts, and if given all relevant circumstances, those efforts were made actively and aggressively to meet the DBE requirements. Efforts to obtain DBE participation are not good faith efforts if they could not reasonably be expected to produce a level of DBE firm

participation sufficient to meet the DBE Program requirements and DBE Goal. Good faith efforts may be determined through use of the following list of the types of actions the Design-Builder may make to obtain DBE participation. This is not intended to be a mandatory checklist, nor is it intended to be exclusive or exhaustive. Other factors or types of efforts of similar intent may be relevant in appropriate cases:

- (a) Soliciting through reasonable and available means, such as but not limited to, attendance at pre-bid meetings, advertising, and written notices to DBE firms who have the capability to perform the work of the contract. Examples include: advertising in at least one daily/weekly/monthly newspaper of general circulation, as applicable; phone contact with a completely documented telephone log, including the date and time called, contact person, or voice mail status; and internet contacts with supporting documentation, including dates advertised. DBE firms shall have no less than five (5) business days to reasonably respond to the solicitation. Design-Builder shall determine with certainty if the DBE firms are interested by taking reasonable steps to follow up initial solicitations as evidenced by documenting such efforts as requested on Form C-49, DBE Good Faith Efforts Documentation.
- (b) Selecting portions of the work to be performed by DBE firms in order to increase the likelihood that the DBE Goal will be achieved. This includes, where appropriate, breaking out work items into economically feasible units to facilitate DBE firm participation, even when the Design-Builder might otherwise prefer to completely perform all portions of this work in its entirety or use its own forces;
- (c) Providing interested DBE firms with adequate information about the plans, specifications, and requirements of the contract in a timely manner, which will assist the DBE firms in responding to a solicitation;
- (d) Negotiating for participation in good faith with interested DBE firms;
 - 1. Evidence of such negotiation shall include the names, addresses, and telephone numbers of DBE firms that were considered; dates DBE firms were contacted; a description of the information provided regarding the plans, specifications, and requirements of the contract for the work selected for subcontracting; and, if insufficient DBE participation seems likely, evidence as to why additional agreements could not be reached for DBE firms to perform the work;
 - 2. Design-Builder should, using good business judgment, consider a number of factors in negotiating with subcontractors/subconsultants, and should take a DBE firm's price, qualifications, and capabilities, as well as contract goals, into consideration. However, the fact that there may be some additional costs involved in finding and using DBE firms is not sufficient reason for a Design-Builder's failure to meet the DBE goal as long as such costs are reasonable and comparable to costs customarily appropriate to the type of work under consideration. Also, the ability or desire of a Design-Builder to perform the work with its own organization does not relieve the Design-Builder of the responsibility to make diligent good faith efforts. Design-Builders are not, however, required to accept higher quotes from DBE firms if the price difference can be shown by the Design-Builder to be excessive, unreasonable, or greater than would normally be expected by industry standards;
- (e) A Design-Builder cannot reject a DBE firm as being unqualified without sound reasons based on a thorough investigation of the DBE firm's capabilities. The DBE firm's standing within its industry, membership in specific groups, organizations, associations, and political or social affiliations, and union vs. non-union employee status are not legitimate causes for the rejection or non-solicitation of bids in the Design-Builder's efforts to meet the contract goal for DBE participation;

- (f) Making efforts to assist interested DBE firms in obtaining bonding, lines of credit, or insurance as required by Department or by Design-Builder;
- (g) Making efforts to assist interested DBE firms in obtaining necessary equipment, supplies, materials, or related assistance or services subject to the restrictions contained in this Special Provision;
- (h) Effectively using the services of appropriate personnel from VDOT and from SBSD; available minority/women community or minority organizations; contractors' groups; local, state, and Federal minority/ women business assistance offices; and other organizations as allowed on a case-by-case basis to provide assistance in the recruitment and utilization of qualified DBEs.

E. Documentation and Administrative Reconsideration of Good Faith Efforts

Design-Builder must provide Form C-49, DBE Good Faith Efforts Documentation, of its efforts made to meet the DBE goal within the time frames specified in this provision. The means of transmittal and the risk for timely receipt of this information shall be the responsibility of the Design-Builder. Design-Builder shall attach additional pages to the certification, if necessary, in order to fully detail specific good faith efforts made to obtain the DBE firm's participation in the proposed work.

However, Design-Builder shall timely submit its completed and executed forms C-111, C-112, C-48, and C-49, as aforementioned. Failure to submit the required documentation within the specified time frames shall be cause to disallow DBE goal credit and delay approval of the Design-Builder's monthly payment.

During the Contract: If a DBE, through no fault of the Design-Builder, is unable or unwilling to fulfill his agreement with the Design-Builder, the Design-Builder shall immediately notify the Department and provide all relevant facts. If a Design-Builder relieves a DBE subcontractor of the responsibility to perform work under their subcontract, the Design-Builder is encouraged to take the appropriate steps to obtain another DBE firm to perform the remaining subcontracted work for the amount that would have been paid to the original DBE firm. In such instances, Design-Builder is expected to seek DBE participation towards meeting the goal during the performance of the contract.

If at any point during the execution and performance of the contract it becomes evident that the remaining dollar value of allowable DBE goal credit for performing the subcontracted work is insufficient to obtain the DBE contract goal, and the Design-Builder has not taken the preceding actions, the Design-Builder and any aforementioned affiliates may be subject to disallowance of DBE credit until such time as sufficient progress toward achievement of the DBE goal is achieved or evidenced.

Project Completion: If, at final completion, the Design-Builder fails to meet the DBE goal, and fails to adequately document that it made good faith efforts to achieve sufficient DBE goal, then Design-Builder and any prime contractual affiliates, as in the case of a joint venture, may be enjoined from bidding, responding, or participating on Department projects for a period of ninety (90) days and be removed from Department's prequalification list.

Prior to such enjoinder or removal, Design-Builder may submit documentation to the State Construction Engineer or other designee of Department to substantiate that failure was due solely to quantitative underrun(s), elimination of items subcontracted to DBEs, or to circumstances beyond Design-Builder's control and that all feasible means had been used to achieve the DBE goal. The State Construction Engineer, or such other designee, upon verification of such documentation shall determine whether Design-Builder has met the requirements of the contract.

If it is determined that the aforementioned documentation is insufficient or the failure to meet required participation is due to other reasons, the Design-Builder may request an appearance before the Department's Administrative Reconsideration Panel to establish that all feasible means were used to meet such participation requirements. The Administrative Reconsideration Panel will be made up of Department Division Administrators or their designees, none of who took part in the initial determination that the Design-Builder failed to make the DBE goal or make adequate good faith efforts to do so. After

reconsideration, Department shall notify the Design-Builder in writing of its decision and explain the basis for finding that the Design-Builder did or did not meet the DBE goal or make adequate good faith efforts to do so. The decision of the Administrative Reconsideration Panel shall be administratively final. If the decision is made to enjoin the Design-Builder from bidding or participating on other Department work as described herein, the enjoinder period will begin upon Design-Builder's failure to request a hearing within the designated time frame or upon the Administrative Reconsideration Panel's decision to enjoin, as applicable.

F. DBE Participation for Contract Goal Credit

DBE participation on the contract will count toward meeting the DBE contract goal in accordance with the following criteria:

1. The applicable percentage of the total dollar value of the contract or subcontract awarded to the DBE firm will be counted toward meeting the DBE goal in accordance with the **DBE Program-Related Certifications Made by Offerors/Design-Builder's** section of this Special Provision for the value of the work, goods, or services that are actually performed or provided by the DBE firm itself or subcontracted by the DBE to other DBE firms.
2. When a DBE performs work as a participant in a joint venture with a non-DBE firm, the Design-Builder may count toward the DBE goal only that portion of the total dollar value of the subcontract equal to the distinctly defined portion of the work that the DBE firm has performed with the DBE firm's own forces or in accordance with the provisions of this Section. The Department shall be contacted in advance regarding any joint venture involving both a DBE firm and a non-DBE firm to coordinate Department review and approval of the joint venture's organizational structure and proposed operation where the Design-Builder seeks to claim the goal credit.
3. When a DBE firm subcontracts part of the work to another firm, the value of that subcontracted work may be counted toward the DBE contract goal only if the DBE firm's subcontractor is a DBE firm. Work that a DBE firm subcontracts to a non-DBE firm, or to a firm that may be eligible to be a DBE firm, but has not yet been certified as a DBE firm, will not count toward the DBE. The cost of supplies and equipment a DBE subcontractor purchases or leases from the Design-Builder or prime contractual affiliates, as in the case of a joint venture, will not count toward the DBE goal.
4. The Design-Builder may count expenditures to a DBE subcontractor toward the DBE goal only if the DBE performs a Commercially Useful Function (CUF) on that subcontract, as such term is defined in subparagraph H below.
5. A Design-Builder may not count the participation of a DBE subcontractor toward the DBE goal until the amount being counted has actually been paid to the DBE firm. Design-Builder may count sixty (60) percent of its expenditures actually paid for materials and supplies obtained from a DBE certified as a regular dealer, and one hundred (100) percent of such expenditures actually paid for materials and supplies obtained from a regular dealer of the goods or a manufacturer DBE firm.
 - (a) For the purposes of this Special Provision, a "regular dealer" is defined as a firm or person that owns, operates, or maintains a store, warehouse, or other establishment in which the materials, supplies, articles, or equipment required and used under the contract are bought, kept in stock, and regularly sold or leased to the public in the usual course of business. To be a regular dealer, the DBE firm or person shall be an established business that regularly engages, as its principal business and under its own name, in the purchase and sale or lease of the products or equipment in question. Packagers, brokers, manufacturers' representatives, or other persons who arrange or expedite transactions will not be considered regular dealers.
 - (b) A DBE firm or person may be a regular dealer in such bulk items as petroleum products, steel, cement, gravel, stone, or asphalt without owning, operating, or maintaining a place of business where it keeps such items in stock if the DBE firm both owns and operates distribution equipment

for the products it sells and provides for the work, provided further that the DBE firm or person has been certified with an appropriate North American Industry Classification System (NAICS) code for supply of such bulk items. Any supplementation of a regular dealer's own distribution equipment shall be by a long-term lease agreement and not on an *ad hoc* or contract-by-contract basis to be eligible for credit to meet the DBE goal credit.

- (c) If a DBE regular dealer is used for DBE goal credit, no additional credit will be given for hauling or delivery to the project site goods or materials sold by that DBE regular dealer. Those delivery costs shall be deemed included in the price charged for the goods or materials by the DBE regular dealer, which shall be responsible for distribution of the goods or materials.
- (d) For the purposes of this Special Provision, a manufacturer will be defined as a firm that operates or maintains a factory or establishment that produces on the premises the materials, supplies, articles, or equipment required under the contract and of the general character described by the project specifications. A manufacturer shall include firms that produce finished goods or products from raw or unfinished material, or purchase and substantially alter goods and materials to make them suitable for construction use before reselling them.
- (e) A Design-Builder may count toward the DBE goal the following expenditures to DBE firms that are not regular dealers or manufacturers for DBE program purposes:
 - 1. The entire amount of fees or commissions charged by a DBE firm for providing a bona fide service, such as professional, technical, consultant or managerial services, or for providing bonds or insurance specifically required for the performance of the federal-aid contract, if the fee is reasonable and not excessive or greater than would normally be expected by industry standards for the same or similar services.
 - 2. The entire amount of that portion of the contract that is performed by the DBE firm's own forces and equipment under the DBE firm's supervision. This includes the cost of supplies and materials ordered and paid for by the DBE firm for work, including supplies purchased or equipment leased by the DBE firm, except Design-Builder supplies and equipment a DBE subcontractor purchases or leases from the Design-Builder or its affiliates.
- (f) Design-Builder may count toward the DBE goal one hundred (100) percent of the fees paid to a DBE trucker or hauler for the delivery of material and supplies required on the project job site, but not for the cost of those materials or supplies themselves, provided that the trucking or hauling fee is determined by Department to be reasonable, as compared with fees customarily charged by non-DBE firms for similar services. Design-Builder shall not count costs for the removal or relocation of excess material from or on the job site when the DBE trucking company is the manufacturer of or a regular dealer in those materials and supplies. The DBE trucking firm shall also perform a CUF on the project and not operate merely as a pass through for the purposes of gaining DBE goal credit. Prior to entering into a trucking subcontract, Design-Builder shall determine, or contact the Department Civil Rights Division or its district offices for assistance in determining, whether a DBE trucking firm will meet the criteria for performing a CUF on the project. See section on **Miscellaneous DBE Program Requirements; Factors used to Determine if a DBE Trucking Firm is Performing a CUF.**
- (g) Design-Builder will receive DBE goal credit for the fees or commissions charged by and paid to a DBE broker who arranges or expedites sales, leases, or other work arrangements provided that those fees are determined by Department to be reasonable and not excessive as compared with fees customarily charged by non-DBE firms for similar services. For the purposes of this Special Provision, a broker is defined as a person or firm that regularly engages in arranging for delivery of material, supplies, and equipment, or regularly arranges for the providing of project services as a course of routine business, but does not own or operate the delivery equipment necessary to transport materials, supplies or equipment to or from a job site.

G. Performing a Commercially Useful Function (CUF)

No credit toward the DBE goal will be allowed for payments or reimbursement of expenditures to a DBE firm if that DBE firm does not perform a CUF on that contract. A DBE firm performs a CUF when the DBE is solely responsible for execution of a distinct element of the work and the DBE firm actually performs, manages, and supervises such work with the DBE firm's own forces or in accordance with the provisions of the **DBE Participation for Contract Goal Credit** section of this Special Provision. To perform a CUF the DBE firm alone shall be responsible and bear the risk for the material and supplies used on the contract, selecting a supplier or dealer from those available, negotiating price, determining quality and quantity, ordering the material and supplies, installing those materials with the DBE firm's own forces and equipment, and paying for those materials and supplies. The amount the DBE firm is to be paid under the subcontract shall be commensurate with the work the DBE actually performs and the DBE goal credit claimed for the DBE firm's performance.

Monitoring CUF Performance: It shall be the Design-Builder's responsibility to confirm that all DBE firms selected for subcontract work on the contract, for which he seeks to claim credit toward the DBE goal, perform a CUF. Further, the Design-Builder is responsible for and shall confirm that each DBE firm fully performs the DBE firm's designated tasks in accordance with the provisions of the **DBE**

Participation for Contract Goal Credit section of this Special Provision. For the purposes of this Special Provision the DBE firm's equipment will mean either equipment directly owned by the DBE as evidenced by title, bill of sale or other such documentation, or leased by the DBE firm, and over which the DBE has control as evidenced by the leasing agreement from a firm not owned in whole or part by the Design-Builder or an affiliate of the Design-Builder.

Department will monitor Design-Builder's DBE involvement during the performance of the contract. However, Department is under no obligation to warn the Design-Builder that a DBE firm's participation will not count toward the goal.

DBE Firms Must Perform a Useful and Necessary Role in Contract Completion: A DBE firm does not perform a CUF if the DBE firm's role is limited to that of an extra participant in a transaction, contract, or project through which funds are passed in order to obtain the appearance of DBE firm participation.

DBE Firms Must Perform The Contract Work With Their Own Workforces: If a DBE firm does not perform and exercise responsibility for at least thirty (30) percent of the total cost of the DBE firm's contract with the DBE firm's own work force, or the DBE firm subcontracts a greater portion of the work of a contract than would be expected on the basis of normal industry practice for the type of work involve, Department will presume that the DBE firm is not performing a CUF and such participation will not be counted toward the DBE goal.

Department Makes Final Determination On Whether a CUF Is Performed: Department has the final authority to determine, in its sole discretion, whether a DBE firm has performed a CUF on the contract. To determine whether a DBE is performing or has performed a CUF, Department will evaluate the amount of work subcontracted by that DBE firm or performed by other firms and the extent of the involvement of other firms' forces and equipment. Any DBE work performed by the Design-Builder or by employees or equipment of the Design-Builder shall be subject to disallowance under the DBE Program, unless the independent validity and need for such an arrangement and work is demonstrated. When a DBE firm is presumed not to be performing a commercially useful function the DBE may present evidence to rebut the Department's finding. Department has the final authority to determine, in its sole discretion, whether a DBE firm has performed a CUF on the contract.

H. Verification of DBE Participation and Imposed Damages

Within fourteen (14) days after subcontract execution between Design-Builder and DBE subcontractors (or subcontract execution between DBE subcontractors and DBE subcontractors), Design-Builder shall submit to the DCRO, a copy of the fully executed subcontract agreement for each DBE firm used to claim

credit in accordance with the requirements stated on Form C-111. The subcontract shall be executed by both parties stating the work to be performed, the details or specifics concerning such work, and the price which will be paid to the DBE subcontractor. Because of the commercial damage that the Design-Builder and its DBE subcontractor could suffer if their subcontract pricing, terms, and conditions were known to competitors, the Department staff will treat subcontract agreements as proprietary Design-Builder trade secrets with regard to Freedom of Information Act requests. In lieu of subcontracts, purchase orders may be submitted for haulers, suppliers, and manufacturers. These too, will be treated confidentially and protected. Such purchase orders must contain, as a minimum, the following information: authorized signatures of both parties; description of the scope of work to include contract item numbers, quantities, and prices; and required federal contract provisions.

The Design-Builder shall also furnish, and shall require each subcontractor to furnish, information relative to all DBE involvement on the project for each quarter during the life of the contract in which participation occurs and verification is available. The information shall be indicated on Form C-63, DBE and SWAM Payment Compliance Report. The Department reserves the right to request proof of payment via copies of cancelled checks with appropriate identifying notations. Failure to provide Form C-63 to the DCRO within five (5) business days after the reporting period may result in delay of approval of the Design-Builder's monthly payment. The names and certification numbers of DBE firms provided by the Design-Builder on the various forms indicated in this Special Provision shall be exactly as shown on SBSB's latest list of certified DBEs. Signatures on all forms indicated herein shall be those of authorized representatives of the Design-Builder as shown on the Prequalification Application, Form C-32 or the Prequalification/Certification Renewal Application, Form C-32A, or authorized by letter from the Design-Builder. If DBE firms are used which have not been previously documented with the Design-Builder's minimum DBE requirements documentation and for which the Design-Builder now desires to claim credit toward the contract goal, the Design-Builder shall be responsible for submitting necessary documentation in accordance with the procedures stipulated in this Special Provision to cover such work prior to the DBE firm beginning work. Form C-63 can be obtained from the VDOT website at: <http://vdotforms.vdot.virginia.gov/>

Design-Builder shall submit to the Department's Project Manager with a copy to the DCRO, a narrative with each project schedule submission, as required in the Special Provision for Design-Build Project Schedule (Part 3, Exhibit 11.1). The project schedule narrative shall include a log of applicable DBE participation activities in the Design-Builder's project schedule for which the Design-Builder intends to claim credit for attaining the DBE goal required in the contract. The log shall include the proposed start/finish dates, durations, and dollar values of the DBE participation activities. Narratives or other agreeable format of schedule information requirements and subsequent progress determination shall be based on the commitment information shown on the latest Form C-111 as compared with the appropriate Form C-63.

Prior to beginning any major component of the work to be performed by a DBE firm not previously submitted, Design-Builder shall furnish a revised Form C-111 showing the name(s) and certification number(s) of any such DBEs for which Design-Builder seeks DBE goal credit. Design-Builder shall obtain the prior approval of the Department for any assistance it may provide to the DBE firm beyond its existing resources in executing its commitment to perform the work in accordance with the requirements listed in the **Good Faith Efforts Described** section of this Special Provision. If Design-Builder is aware of any assistance beyond a DBE firm's existing resources that Design-Builder, or another subcontractor, may be contemplating or may deem necessary and that have not been previously approved, Design-Builder shall submit a new or revised narrative statement for Department's approval prior to assistance being rendered.

If the Design-Builder fails to correctly complete and any of the required documentation requested by this Special Provision within the specified time frames, the Department will withhold payment until such time as the required submissions are received by Department. Where such failures to provide required submittals or documentation are repeated, Department will move to enjoin the Design-Builder and any prime contractual affiliates, as in the case of a joint venture, from bidding, responding or participating Department projects until such submissions are received.

I. Documentation Required for Semi-final Payment

Design-Builder must submit Form C-63 to the DCRO sixty (60) days prior to date of final completion, set forth on the Baseline Schedule (as updated from time to time in accordance with the contract). The form must include each DBE firm used on the contract and the work performed by each DBE firm. The form shall include the actual dollar amount paid to each DBE firm for the accepted creditable work. The form shall be certified under penalty of perjury, or other applicable legal requirements, to be accurate and complete. Department will use this certification and other information available to determine applicable DBE credit allowed to date by Department and the extent to which the DBE firms were fully paid for that work. The Design-Builder acknowledges by the act of filing the form that the information is supplied to obtain payment regarding the contract as a federal participation contract. A letter of certification, signed by both the Design-Builder and appropriate DBE firms, will accompany the form, indicating the amount, including any retainage, if present, that remains to be paid to the DBE firm(s).

J. Documentation Required for Final Payment

In anticipation of final payment, Design-Builder shall submit a final Form C-63 marked "Final" to the DCRO, within thirty (30) days of the anticipated date of final completion, as set forth on the Baseline Schedule (as updated from time to time in accordance with the contract). The form must include each DBE firm used on the contract and the work performed by each DBE firm. The form shall include the actual dollar amount paid to each DBE firm for the creditable work. Department will use this form and other information available to determine if Design-Builder and DBE firms have satisfied the DBE goal and the extent to which credit was allowed. Design-Builder acknowledges by the act of signing and filing the form that the information is supplied to obtain payment regarding the contract as a federal participation contract.

K. Prompt Payment Requirements

Design-Builder shall make prompt and full payment to the subcontractor(s) (including DBE subcontractors) of any retainage held by Design-Builder after the subcontractor's work is satisfactorily completed.

For purposes of this Special Provision, a subcontractor's work is satisfactorily completed when all the tasks called for in the subcontract have been accomplished, documented, and accepted as required by the contract documents by Department. If Department has made partial acceptance of a portion of the contract, then Department will consider the work of any subcontractor covered by that partial acceptance to be satisfactorily completed. Payment will be made in accordance with the requirements of Section 107.01, Section 109.08, and Section 109.09 of the Division I Amendments to the Standard Specifications (Part 5).

Upon Department's payment of the subcontractor's portion of the work as shown on the application for payment and the receipt of payment by Design-Builder for such work, the Design-Builder shall make compensation in full to the subcontractor for that portion of the work satisfactorily completed and accepted by the Department. For the purposes of this Special Provision, payment of the subcontractor's portion of the work shall mean the Design-Builder has issued payment in full, less agreed upon retainage, if any, to the subcontractor for that portion of the subcontractor's work that Department paid to Design-Builder pursuant to the applicable application for payment.

Design-Builder shall make payment of the subcontractor's portion of the work within seven (7) days of the receipt of payment from Department in accordance with the requirements of Section 107.01, Section 109.08, and Section 109.09 of the Division I Amendments to the Standard Specifications (Part 5).

If Design-Builder fails to make payment for the subcontractor's portion of the work within the time frame specified herein, the subcontractor shall notify the Department and the Design-Builder's bonding company in writing. Upon written notice from the subcontractor, the Design-Builder's bonding company and Department will investigate the cause for non-payment. Barring mitigating circumstances that

would make the subcontractor ineligible for payment, the Design-Builder's bonding company shall be responsible for insuring payment to the subcontractor in accordance with the requirements of Section 107.01, Section 109.08, and Section 109.09 of the Division I Amendments to the Standard Specifications (Part 5).

By accepting and executing this contract, the Design-Builder agrees to assume these obligations, and to bind the Design-Builder's subcontractors contractually to these obligations.

Nothing contained herein shall preclude Design-Builder from withholding payment to the subcontractor in accordance with the terms of the subcontract in order to protect the Design-Builder from loss or cost of damage due to a breach of the subcontract by the subcontractor.

L. Miscellaneous DBE Program Requirements

Loss of DBE Eligibility: When a DBE firm has been removed from eligibility as a certified DBE firm, the following actions will be taken:

1. When a Design-Builder has made a commitment to use a DBE firm that is not currently certified, thereby making the Design-Builder ineligible to receive DBE goal credit for work performed, the ineligible DBE firm's work does not count toward the DBE goal. Design-Builder shall meet the DBE goal with a DBE firm that is eligible to receive DBE credit for work performed, or must demonstrate to the DCRO that it has made good faith efforts to do so.
2. When a Design-Builder has executed a subcontract with a DBE firm prior to official notification of the DBE firm's loss of eligibility, Design-Builder may continue to use the firm on the contract and shall continue to receive DBE credit toward DBE goal for the subcontractor's work.
3. When Department has executed a prime contract with a DBE firm that is certified at the time of contract execution but that is later ruled ineligible, the portion of the ineligible firm's performance on the contract before VDOT has issued the notice of its ineligibility shall count toward the contract goal.

Termination of DBE: If a DBE subcontractor is terminated, or fails, refuses, or is unable to complete the work on the contract for any reason, Design-Builder must promptly request approval to substitute or replace that DBE firm in accordance with this section of this Special Provision.

Design-Builder, shall notify DCRO in writing before terminating and/or replacing the DBE firm that is being used or represented to fulfill DBE-related contract obligations during the term of the contract. Written consent from the DCRO for terminating the performance of any DBE firm shall be granted only when the Design-Builder can demonstrate that the DBE firm is unable, unwilling, or ineligible to perform its obligations for which the Design-Builder sought credit toward the DBE goal. Such written consent by the Department to terminate any DBE shall concurrently constitute written consent to substitute or replace the terminated DBE with another DBE. Consent to terminate a DBE firm shall not be based on the Design-Builder's ability to negotiate a more advantageous contract with another subcontractor whether that subcontractor is, or is not, a DBE firm.

1. All Design-Builder requests to terminate, substitute, or replace a DBE firm shall be in writing, and shall include the following information:
 - (a) The date the Design-Builder determined the DBE to be unwilling, unable, or ineligible to perform.
 - (b) The projected date that the Design-Builder shall require a substitution or replacement DBE to commence work if consent is granted to the request.

- (c) A brief statement of facts describing and citing specific actions or inaction by the DBE firm giving rise to Design-Builder's assertion that the DBE firm is unwilling, unable, or ineligible to perform;
 - (d) A brief statement of the DBE firm's capacity and ability to perform the work as determined by the Design-Builder;
 - (e) A brief statement of facts regarding actions taken by the Design-Builder, that Design-Builder believes constitute good faith efforts toward enabling the DBE firm to perform;
 - (f) The current percentage of work completed by the DBE firm;
 - (g) The total dollar amount currently paid for work performed by the DBE firm;
 - (h) The total dollar amount remaining to be paid to the DBE firm for work completed, but for which the DBE firm has not received payment, and with which the Design-Builder has no dispute;
 - (i) The total dollar amount remaining to be paid to the DBE firm for work completed, but for which the DBE firm has not received payment, and over which the Design-Builder and/or the DBE firm have a dispute.
2. Design-Builder's Written Notice to DBE of Pending Request to Terminate and Substitute with another DBE.

Design-Builder shall send a copy of the "request to terminate and substitute" letter to the affected DBE firm and make best efforts to ensure its receipt by the DBE firm, in conjunction with submitting the request to the DCRO. The DBE firm may submit a response letter to the DCRO and Department within two (2) business days of receiving the notice to terminate from the Design-Builder. If the DBE firm submits a response letter, then Design-Builder shall, as part of its subcontract, obligate the DBE firm to explain its position concerning performance on the committed work. The Department will consider both the Design-Builder's request and the DBE firm's response and explanation before approving the Design-Builder's termination and substitution request.

If, after making its best efforts to deliver a copy of the "request to terminate and substitute" letter, the Design-Builder is unsuccessful in notifying the affected DBE firm, the Department will verify that the DBE firm is unable or unwilling to continue performing its subcontract let with respect to the contract. Department will timely approve the Design-Builder's request for a substitution.

3. Proposed Substitution of Another Certified DBE

Upon termination of a DBE firm, Design-Builder shall use reasonable good faith efforts to replace the terminated DBE firm. The termination of such DBE firm shall not relieve Design-Builder of its obligations under this Special Provision, and the unpaid portion of the terminated DBE firm's subcontract will not be counted toward the DBE goal.

When a DBE substitution is necessary, the Design-Builder shall submit an amended Form C-111 to the DCRO for approval with the name of another DBE firm, the proposed work to be performed by that DBE firm, and the dollar amount of the work to replace the unfulfilled portion of the work of the original DBE firm.

Should Design-Builder be unable to commit the remaining required dollar value to the substitute DBE firm, the Design-Builder shall provide written evidence of good faith efforts made to obtain the substitute value requirement. Department will review the quality, thoroughness, and intensity of those efforts. Efforts that are viewed by Department as merely superficial or pro-

forma will not be considered good faith efforts to meet the DBE goal. Design-Builder must document the steps taken that demonstrated its good faith efforts to obtain participation as set forth in the **Good Faith Efforts Described** section of this Special Provision.

Factors Used to determine if a DBE Trucking Firm is performing a CUF:

The following factors will be used to determine whether a DBE trucking company is performing a CUF:

1. To perform a CUF, the DBE trucking firm shall be completely responsible for the management and supervision of the entire trucking operation for which the DBE trucking firm is responsible by subcontract under the contract. There shall not be a contrived arrangement, including, but not limited to, any arrangement that would not customarily and legally exist under customary construction project subcontracting practices for the purpose of meeting the DBE goal;
2. The DBE firm must own and operate at least one fully licensed, insured, and operational truck used in the performance of the contract work. This does not include a supervisor's pickup truck or a similar vehicle that is not suitable for and customarily used in hauling the subject materials or supplies;
3. Design-Builder is eligible to receives full credit toward the DBE goal for the total reasonable amount the DBE firm is paid for the transportation services provided on the subcontract under the contract using acceptable trucks the DBE firm owns, insures, and operates using drivers that the DBE employs and manages;
4. The DBE trucking firm may lease trucks from another DBE firm, including from an owner-operator who is a DBE firm. Design-Builder is eligible to receive credit for the total fair market value actually paid for transportation services the lessee DBE firm provides to the DBE firm that leases trucks from such lessee DBE firm on the contract;
5. The DBE firm may also lease trucks from a non-DBE firm, including an owner-operator. Design-Builder may be eligible to receive DBE goal credit for the services of a DBE firm who leases trucks from a non-DBE firm up to the total value of the transportation services provided by non-DBE lessees, *not to exceed the value of transportation services provided by DBE-owned trucks on the contract*. For additional participation by non-DBE lessees, the DBE will only receive credit for the fee or commission it receives as a result of the lease arrangement.

Truck Counting

Design-Builders may count for credit against the DBE goal the dollar volume attributable to no more than twice the number of trucks owned by a DBE firm or leased from another DBE firm.

As an example, DBE credit would be awarded for the total transportation services provided by DBE Firm X and DBE Firm Y, and may also be awarded for the total value of transportation services by four (4) of the six (6) trucks provided by non-DBE Firm Z (not to exceed the value of transportation services provided by DBE-owned trucks).

Value of Transportation Services

(For Illustrative Purposes Only)

Firm X

Truck 1	Owned by DBE	\$100 per day
Truck 2	Owned by DBE	\$100 per day

Firm Y

Truck 3	Leased from DBE	\$110 per day
Truck 4	Leased from DBE	\$110 per day

Firm Z

Truck 1	Leased from Non-DBE	\$125 per day
Truck 2	Leased from Non-DBE	\$125 per day
Truck 3	Leased from Non-DBE	\$125 per day
Truck 4	Leased from Non-DBE	\$125 per day
Truck 5	Leased from Non-DBE*	\$125 per day
Truck 6	Leased from Non-DBE*	\$125 per day

DBE credit would be awarded for the total transportation services provided by DBE firm X and DBE Firm Y, and may also be awarded for the total value of transportation services by four (4) of the six (6) trucks provided by non-DBE Firm Z (not to exceed the value of transportation services provided by DBE-owned trucks).

Credit = 8 Trucks

Total Value of Transportation Services = \$820,000

In all, full DBE credit would be allowed for the participation of eight (8) trucks (twice the number of DBE trucks owned and leased) and the dollar value attributable to the Value of Transportation Services provided by the 8 trucks.

* With respect to the other two trucks provided by non-DBE Firm Z, DBE credit could be awarded only for the fees or commissions pertaining to those trucks that DBE Firm X receives as a result of the lease with non-DBE Firm Z.

6. For purposes of this section, the lease must indicate that the DBE firm leasing the truck has exclusive use of and control over the truck. This will not preclude the leased truck from working for others during the term of the lease with the consent of the DBE, provided the lease gives the DBE absolute priority for and control over the use of the leased truck. Leased trucks must display the name and identification number of the DBE firm that has leased the truck at all times during the life of the lease.

M. Suspect Evidence of Criminal Behavior

Failure of Design-Builder or any subcontractor to comply with the Standard Specifications, this Special Provision, or any other contract document wherein there appears to be evidence of criminal conduct shall be referred to the Attorney General for the Commonwealth of Virginia and/or the FHWA Inspector General for criminal investigation and, if warranted prosecution.

Suspected DBE Fraud

In appropriate cases, Department will bring to the attention of the United States Department of Transportation any appearance of false, fraudulent, or dishonest conduct in connection with the DBE program, so that USDOT can take the steps, e.g., referral to the Department of Justice for criminal prosecution, referral to the USDOT Inspector General, action under suspension and debarment or "Program Fraud and Civil Penalties" rules provided in 49 CFR Part 31.

VIRGINIA DEPARTMENT OF TRANSPORTATION
SPECIAL PROVISION

EXHIBIT 107.15 .2

USE OF SMALL, WOMEN-OWNED, AND MINORITY-OWNED
BUSINESSES (SWaM) FOR DESIGN-BUILD PROJECTS

January 4, 2017

It is the policy of the Department that Small, Women-Owned, and Minority-Owned Businesses (SWaMs) shall have the maximum opportunity to participate in the performance of the Contract. The Contractor is encouraged to take necessary and reasonable steps to ensure that SWaMs have the maximum opportunity to compete for and perform work on the Contract, including participation in any subsequent subcontracts.

A SWaM firm shall mean a small business concern (as defined pursuant to the Code of Virginia, Title 2.2 -1401 for the purpose of reporting small, women-owned, and minority-owned business participation in state contracts and purchases pursuant to §§ 2.2-1404 and 2.2-1405. To that end the following terms shall apply:

Small business means an independently owned and operated business which, together with affiliates, has 250 or fewer employees, or average annual gross receipts of \$10 million or less

Women-owned business means a business concern that is at least 51% owned by one or more women who are U.S. citizens or legal resident aliens, or in the case of a corporation, partnership, or limited liability company or other entity, at least 51% of the equity ownership interest is owned by one or more women who are citizens of the United States or non-citizens who are in full compliance with the United States immigration law, and both the management and daily business operations are controlled by one or more women who are U.S. citizens or legal resident aliens.

Minority-owned business means a business concern that is at least 51% owned by one or more minority individuals or in the case of a corporation, partnership, or limited liability company or other entity, at least 51% of the equity ownership interest in the corporation, partnership, or limited liability company or other entity is owned by one or more minority individuals and both the management and daily business operations are controlled by one or more minority individuals.

Minority individual means an individual who is a citizen of the United States or a non-citizen who is in full compliance with United States immigration law and who satisfies one or more of the following definitions:

1. African American means a person having origins in any of the original peoples of Africa and who is regarded as such by the community of which this person claims to be a part.
2. Asian American means a person having origins in any of the original peoples of the Far East, Southeast Asia, the Indian subcontinent, or the Pacific Islands, including but not limited to Japan, China, Vietnam, Samoa, Laos, Cambodia, Taiwan, Northern Mariana, the Philippines, a U.S. territory of the Pacific, India, Pakistan, Bangladesh, or Sri Lanka and who is regarded as such by the community of which this person claims to be a part.
3. Hispanic American means a person having origins in any of the Spanish-speaking peoples of Mexico, South or Central America, or the Caribbean Islands or other Spanish or Portuguese cultures and who is regarded as such by the community of which this person claims to be a part.

4. Native American means a person having origins in any of the original peoples of North America and who is regarded as such by the community of which this person claims to be a part or who is recognized by a tribal organization.
5. A member of another group, or other individual, found to be economically and socially disadvantaged by the Small Business Administration under 8(a) of the Small Business Act as amended (15 U.S.C. 637[a]).

State agency means any authority, board, department, instrumentality, institution, agency, or other unit of state government. "State agency" shall not include any county, city, or town.

A list of Virginia Department of Small Business and Supplier Diversity (SBSD) certified SWaM firms is maintained on the SBSBD web site (<http://www.sbsd.virginia.gov>) under the **SWaM Vendor Directory** link.

SWaM certification entitles firms to participate in VDOT's SWaM program; however, this certification does not guarantee that the firm will obtain work nor does it attest to the firm's abilities to perform any particular work.

The Contractor shall designate and make known to the Department a liaison officer who is assigned the responsibility of actively and effectively administering, encouraging and promoting a responsive program for the use of SWaMs.

The performance of the Contract for the purpose of this specification shall be interpreted to include, but not necessarily be limited to, subcontracting; furnishing materials, supplies, and services; and, leasing equipment or where applicable, any combination thereof.

If the Contractor intends to sublet a portion of the work on the project in accordance with the provisions of Section 105.06 of the Specifications, the Contractor is encouraged to seek out and consider SWaMs as potential subcontractors. The Contractor is encouraged to contact SWaMs to solicit their interest, capability, and prices and shall retain on file the proper documentation to substantiate such contacts.

If the Department has determined that specific opportunities for participation by SWaMs are available on a particular Contract and the bidder chooses to claim credit for SWaM participation, the extent of such participation will be shown as a percentage of the Contract amount and will be indicated on Form C-111, *SWaM Participation*.

Design Phase: Thirty (30) days after the Notice to Proceed for Design, the Design-Builder shall submit to the Department for review and approval Forms C-111 and C-112 for each SWaM firm to be utilized during the design phase to meet the SWaM contract goal requirement. Failure to submit the required documentation within the specified timeframe shall be cause to deny credit for any work performed by a SWaM firm and delay approval of the Design-Builder's monthly payment.

Construction Phase: No later than thirty (30) days prior to the SWaM firm undertaking any work, the Design-Builder shall submit to the Department for review and approval Forms C-111, and C-112. Failure to submit the required documentation within the specified timeframe shall result in disallowed credit of any work performed prior to approval of Forms C-111 and C-112 and delay in approval of monthly payment.

The following are examples of efforts the Department encourages bidders and Contractors to make in soliciting SWaM participation. Other factors or types of efforts may be relevant in appropriate cases. The Contractor is encouraged to:

- (a) attend any pre-solicitation or pre-bid meetings at which SWaMs could be present and/or informed of contracting and subcontracting opportunities;
- (b) advertise in general circulation, trade association and minority-focus media concerning the subcontracting opportunities;

- (c) provide written notice to a reasonable number of specific SWaMs that their interest in the Contract is being solicited in sufficient time to allow the SWaMs to participate effectively;
- (d) follow-up initial solicitations of interest by contacting SWaMs to determine with certainty whether the SWaMs are interested;
- (e) select portions of the work to be performed by SWaMs in order to increase the likelihood of obtaining SWaM participation (including, where appropriate, breaking down proposed contract work into economically feasible units to facilitate SWaM participation);
- (f) provide interested SWaMs with adequate information about the plans, Specifications, and requirements of the Contract
- (g) negotiate in good faith with interested SWaMs, not rejecting SWaMs as unqualified without sound reasons based on a thorough investigation of their capabilities;
- (h) make efforts to assist interested SWaMs in obtaining bonding, lines of credit, or insurance required by the Department or Contractor;
- (i) make efforts to assist interested SWaMs in obtaining necessary equipment, supplies, materials, or other necessary or related assistance or services; and,
- (j) effectively use the services of available minority, woman and small business community organizations; minority, woman and small business contractors' groups; local, state and federal minority, woman and small business assistance offices; and other organizations that provide assistance in the recruitment and placement of SWaMs.

Any agreement between the Design-Builder and a SWaM firm whereby the SWaM firm agrees not to provide quotations for performance of work to other contractors/consultants is prohibited.

The Design-Builder shall furnish, and require each subcontractor to furnish, on a quarterly basis, information relative to all SWaM involvement on the project. The information shall be indicated on Form C-63, DBE and SWaM Payment Compliance Report or by copies of canceled checks with appropriate identifying notations. If participation achievement is to be fulfilled with a SWaM whose name has not been previously furnished to the Department for the Contract in question, an initial or revised Form C-111, whichever is appropriate, shall be submitted prior to such SWaM beginning the work. Failure to provide the Department the forms by the fifth of the month following each quarterly reporting period may result in delay of the Design-Builders estimate for payment.

If a SWaM, through no fault of the Contractor, is unable or unwilling to fulfill his agreement with the Contractor, the Contractor shall immediately notify the Department and provide all relevant facts. If any subcontractor is relieved of the responsibility to perform work under their subcontract, the Contractor is encouraged to take the appropriate steps to obtain a SWaM to perform an equal or greater dollar value of the remaining subcontracted work. The substitute SWaM's name, description of the work, and dollar value of the work shall be submitted to the Department on Form C-111 prior to such SWaM beginning the work, if such work is to be counted for participation achievement.

**VIRGINIA DEPARTMENT OF TRANSPORTATION
SPECIAL PROVISION FOR
EXHIBIT 107.15.3
LOCAL AND VETERANS HIRING PROGRAM FOR DESIGN-BUILD PROJECTS**

September 2, 2015

Local and Veteran Hiring Program Requirements

(a) General

- (i) The Commonwealth of Virginia is committed to reducing barriers to employment to ensure a diverse workforce in the construction industry. Therefore, the purpose of the Local and Veterans Hiring Program is to support and grow the Commonwealth's commitment by means of a robust hiring and retention program for local workers and veterans and a robust On-the-Job Training (OJT) Program.
- (ii) The Design-Builder and any subcontractors shall comply with this Special Provision.
- (iii) The parties recognize the importance of recruiting, hiring, and technical and workplace training of local workers and veterans in the development of the Project and execution of the Contract. As such, the Design-Builder shall utilize workforce on-the-job training, apprenticeship and recruitment programs to actively recruit local workers and veterans.
- (iv) The Design-Builder shall comply with all applicable state and federal law, regulations, guidelines, and policies in the administration of this Special Provision and the award and administration of subcontracts pursuant to the Contract. Failure by the Design-Builder to carry out the requirement in this Special Provision will subject the Design-Builder to the enforcement mechanisms as set forth herein, but shall not result in a right of the Department to terminate the Contract.
- (v) All time frames referenced in this Special Provision are expressed in business days (Days) unless otherwise indicated. Should the expiration of any deadline fall on a weekend or holiday, such deadline will automatically be extended to the next normal business day.
- (vi) In accordance with the Local and Veterans Hiring Program requirements, the Design-Builder, and subcontractors shall commit to complying fully with this Special Provision. The Design-Builder agrees to assume these contractual at the Design-Builder's expense.
- (vii) For the purposes of this Special Provision, Offeror is defined as any individual, partnership, corporation, or Joint Venture that formally submits a Statement of Qualification or Proposal for the work contemplated there under; Design-Builder is defined as any individual, partnership, or Joint Venture that contracts with the Department to perform the Design-Build Work; and subcontractor is defined as any supplier, manufacturer, or subcontractor performing work or furnishing material,

supplies or services to the Contract. New hires shall be as defined in Section (b) (v) herein below.

(b) Design-Build Work

- (i) During performance of the Design-Build Work, the Department has established a minimum requirement of 75% for local worker and/or veteran new hire participation. New hire participation represents employees paid specifically for work performed on the project and may be randomly verified through the checking of payrolls. Hiring by subcontractors will count toward meeting the percentage goal. Veteran shall mean any person that meets the definition of "veteran" in either 38 USC §101 or 5 USC §2108. Local worker shall mean that the person resides in the following jurisdictions: Counties of Arlington, Fauquier, Fairfax, Loudoun, Prince William, Stafford, and Spotsylvania, as well as the Cities of Alexandria, Fairfax, Falls Church, Manassas and Manassas Park.

The Department and the Design-Builder agree to manage this goal as follows:

- (A) the Design-Builder shall submit for the Department's review and approval and initial Hiring Development Plan, and an updated Hiring Development Plan as further described herein. The initial and updated Hiring Development Plan shall be submitted within 30 Days after Contract award and on January 30 of each year prior to achieving Substantial Completion of the Project. The Hiring Development Plan shall define the Design-Builder's approach to meeting the workforce minimum requirements set forth in this Section (b) (i);
- (B) the Design-Builder shall designate resources, including a liaison officer designated and made known to the Department who is assigned the responsibility of administering and promoting an active and inclusive Hiring Development Plan to ensure all programs related to the Hiring Development Plan are compliant with this Special Provision. The designation and identity of this officer needs to be submitted as part of the Initial and Updated Hiring Development Plan;
- (C) the Design-Builder shall ensure that local workers and veterans have been given full and fair opportunity to participate in the hiring process for vacant positions;
- (D) the Design-Builder shall make Good Faith Efforts to obtain local workers and veterans' participation in the execution and performance of the Contract at or above the established local worker & veteran hiring goal set forth in this Section (b) (i);
- (E) the Design-Builder shall provide to the Department each calendar quarter, after approval of the Initial Hiring Development Plan, documentation of all local worker and veteran workforces; and
- (F) each calendar quarter, the Design-Builder will provide Good Faith Efforts documentation using Form C-66, VDOT Local Worker and Veteran Employment Report or equivalent tracking measures and other supplemental information as appropriate. Current workforce and local

and veteran new hires shall be tracked by the number of employees and not how many hours such employee is paid. Form C-66 or Design-Builder's equivalent report in a format otherwise acceptable to the Department, shall be used to capture the Design-Builder's workforce at contract execution and local workers and veterans hired and terminated during the course of the project.

- (ii) During the performance of the Design-Build Work, the parties will work cooperatively to accomplish the local worker and veteran recruitment, hiring and OJT objectives, as established in the approved Hiring Development Plan and its subsequent updates. The Department will assist the Design-Builder in meeting the Design-Build Work workforce minimum requirements set forth in Section (b) (i) by offering assistance in the following activities:
 - (A) the parties will jointly conduct outreach meetings for local workers and veterans; and
 - (B) the parties will jointly identify agencies or firms that actively employ or recruit local workers and veterans.
- (iii) The Design-Builder acknowledges that the Department's assistance and cooperation will not eliminate or reduce the Design-Builder's responsibility to achieve the Design-Build Work workforce minimum requirements set forth in Section (b) (i) or demonstrate Good Faith Efforts. The Design-Builder is expected to utilize a variety of means and methods and creative strategies to do so. These strategies should be employed during the performance of the Design-Build Work. The Design-Builder shall meet the workforce minimum requirements set forth in Section (b) (i) or demonstrate that Good Faith Efforts have been made.
- (iv) When there is a workforce minimum requirement for the Design-Build Work, the Design-Builder shall make Good Faith Efforts to meet the workforce minimum requirement through obtaining enough local and veteran worker workforce participation or documenting the Good Faith Efforts it made to do so. The Department shall not disregard showings of Good Faith Efforts, and it gives the Design-Builder the right to have the Department reconsider a decision that their Good Faith Efforts were insufficient. The Department must seriously consider the Design-Builder's documentation of Good Faith Efforts. The Department will issue Good Faith Efforts Guidelines providing examples, procedures and reporting requirements for the Design-Builder's consideration.
- (v) During the performance of the Design-Build Work the following procedures shall apply to the Hiring Development Plan for compliance purposes:
 - (A) **Hiring:** The Design-Builder shall use standard hiring practices, including interviews, to consider all qualified applicants in the defined local geographic area to meet the established local and veteran hiring goal. The Design-Builder shall make Good Faith Efforts to fill all available positions with local and veteran applicants. Local Workforce Development Centers and the Virginia Employment Commission may be used for applicant referrals. The Design-Builder is encouraged to partner with local Workforce Development Centers for local applicants;

- (B) **New Hire:** Employees who work on the Project to whom the employer anticipates paying earnings include full-time, part-time, and temporary statuses that are employed for a specific project. New hires shall include employees reporting to work for the first time or re-hires (employees who return to work after being laid off, furloughed, separated, granted a leave without pay, or terminated from employment); and
- (C) **Good Faith Efforts Described:** The Department will determine if the Design-Builder has demonstrated adequate Good Faith Efforts, and if given all relevant circumstances, those efforts were made actively and aggressively to meet the local and veteran hiring goal. Efforts to obtain local and veteran hiring goals are not Good Faith Efforts if they could not reasonably be expected to produce a level of local worker's participation sufficient to meet the local and veteran hiring goal set forth in this Special Provision.

Good Faith Efforts may be determined by soliciting for vacant positions through reasonable and available means in the local area, such as but not limited to, advertising, written notices to local Workforce Development Centers and the Virginia Employment Commission.

A list of actions the Contractor may take to meet the local worker and veteran's hiring goal can be found in the Good Faith Efforts Guidelines.

(c) Local Worker and Veteran Workforce Participation Reporting and Assessment

- (i) The Design-Builder and each subcontractor shall report to the Department quarterly, within 15 Days after each calendar quarter ends, on the Design-Builder's efforts to (A) satisfy the local and veteran worker workforce minimum requirements set forth in Section (b)(i) or (B) demonstrate Good Faith Efforts to accomplish the local and veteran worker workforce minimum requirements set forth in Section (b)(i).
- (ii) The Department will assess, confirm and communicate to the Design-Builder within 30 Days after receiving each quarterly report whether the Design-Builder has (A) satisfied the local worker and veteran workforce minimum requirements, (B) demonstrated Good Faith Efforts, or (C) failed to satisfy the requirements of clause (A) and (B) of this Section (c)(ii), and the reasons why the Department has determined Good Faith Efforts has not been satisfied.
- (iii) The Design-Builder shall report compliance on Form C-66, VDOT Local Worker and Veteran Employment Report, in accordance with the instructions attached to the form or an equivalent report in a format otherwise acceptable to the Department.

(d) Failure to Demonstrate Local Worker and Veteran Recruitment and Hiring Good Faith Efforts Related to Design-Build Work

- (i) If the Department notifies the Design-Builder pursuant to Section (d) that the Design-Builder has failed to satisfy the requirements of clause (A) and (B) of Section (c)(i) with respect to the local worker and veteran participation workforce minimum requirements for the Design-Build Work for a quarterly period, the Design-Builder will have until the end of the next consecutive quarter to demonstrate that it has satisfied the requirements of either clause (A) and (B) of Section (c)(ii) with respect to such local worker and veteran participation workforce minimum requirements.
- (ii) If the Design-Builder has failed to satisfy the requirements of clause (A) and (B) of Section (c)(ii) with respect to the local worker and veteran participation workforce minimum requirements for the Design-Build Work for two consecutive quarters based on the determinations by the Department pursuant to Section (c), the Design-Builder will prepare and submit, at the Design-Builder's sole cost and expense, a Participation Performance Improvement Plan for the Department's review and approval. The Participation Performance Improvement Plan will describe the specific actions and measures that the Design-Builder will undertake to improve its performance with respect to satisfying the requirements of clause (A) and (B) of Section (c)(ii) with respect to the participation workforce minimum requirements for the Design-Build Work. The Design-Builder will submit the Participation Performance Improvement Plan within 15 days after receiving notice from the Department pursuant to Section (d) that the Design-Builder has failed to satisfy the requirements of clause (A) and (B) of Section (c)(ii). The Design-Builder will reimburse the Department for its Allocable Costs in reviewing, approving and monitoring the Design-Builder's compliance with the Participation Performance Improvement Plan until the Design-Builder satisfies the requirements of either clause (A) or (B) of Section (c)(ii) with respect to the local worker and veteran participation workforce minimum requirements set forth in Section (b) (i) for the Design-Build Work.

(e) Project Completion Related to the Design Build Work

The Design-Builder may submit documentation to the Department to substantiate that failure was beyond the Design-Builder's control and that all feasible means had been used to achieve the local and veteran hiring goal. The Department, upon verification of such documentation shall determine whether the Design-Builder has met the requirements of this Special Provision.

(f) Existing Local and Veteran Workforce

Existing local and veteran workforce participation in the execution and performance of the Contract will count toward the Design-Builder's total local workers and veteran's workforce. This information will be captured on the VDOT Local Worker and Veteran Employment Report (Form C-66). Local workers residing in the jurisdictions as set out in Section (b) (i) will be included in the Design-Builder's workforce. Only veterans, as defined in Section (b) (i), who reside in the Commonwealth of Virginia will be included in this computation.