

STATE OF NORTH CAROLINA

DEPARTMENT OF TRANSPORTATION

Invitation for Bid #: 54-CA-11102021

Traffic Data Collection Date of Issue: November 15, 2021

Bid Opening Date: December 7, 2021 At 2:00 p.m. ET

Direct all inquiries concerning this IFB to:

Christian Andresen Procurement Specialist III Email: ctandresen@ncdot.gov Phone: (919)707-2627



STATE OF NORTH CAROLINA

Invitation for Bids

54-CA-11102021

For internal State agency processing, including tabulation of bids in the Interactive Purchasing System (IPS), please provide your company's Federal Employer Identification Number or alternate identification number (e.g. Social Security Number). Pursuant to G.S. 132-1.10(b) this identification number shall not be released to the public. **This page will be removed and shredded, or otherwise kept confidential**, before the procurement file is made available for public inspection.

This page is to be filled out and returned with your bid. Failure to do so may subject your bid to rejection.

ID Number:

Federal ID Number or Social Security Number

Vendor Name

Vendor:

EXECUTION

STATE OF NORTH CAROLINA Department of Transportation				
Refer <u>ALL</u> Inquiries regarding this IFB to: Invitation for Bids # 54-CA-11102021				
Christian Andresen	Bids will be publicly opened: December 7, 2021 at 2:00 PM ET			
ctandresen@ncdot.gov	Contract Type: Open Market, Services			
(919)707-2627	Commodity No. and Description: 781-118 Traffic Data Collection			
	Using Agency: Department of Transportation			
	Requisition No.: N/A			

In compliance with this Invitation for Bids, and subject to all the conditions herein, the undersigned Vendor offers and agrees to furnish and deliver any or all items upon which prices are bid, at the prices set opposite each item within the time specified herein. By executing this bid, the undersigned Vendor certifies that this bid is submitted competitively and without collusion 19A NCAC 02D.0818 (a)), and that none of its officers, directors, or owners of an unincorporated business entity has been convicted of any violations of Chapter 78A of the General Statutes, the Securities Act of 1933, or the Securities Exchange Act of 1934 Furthermore, by executing this bid, the undersigned certifies to the best of Vendor's knowledge and belief, that it and its principals are not presently debarred, suspended, proposed for debarment, declared ineligible or voluntarily excluded from covered transactions by any Federal or State department or agency. The undersigned Vendor certifies that it, and each of its sub-Contractors for any Contract awarded as a result of this IFB, complies with the requirements of Article 2 of Chapter 64 of the NC General Statutes, including the requirement for each employer with more than 25 employees in North Carolina to verify the work authorization of its employees through the federal E-Verify system. G.S. 133-32 and Executive Order 24 (2009) prohibit the offer to, or acceptance by, any State Employee associated with the preparing plans, specifications, estimates for public Contract; or awarding or administering public Contracts; or inspecting or supervising delivery of the public Contract of any gift from anyone with a Contract with the State, or from any person seeking to do business with the State. By execution of this bid response to the IFB, the undersigned certifies, for your entire organization and its employees or agents, that you are not aware that any such gift has been offered, accepted, or promised by any employees of your organization.

Failure to execute/sign bid prior to submittal shall render bid invalid and it WILL BE REJECTED. Late bids cannot be accepted.

STREET ADDRESS:		P.O. BOX:	ZIP:		
CITY & STATE & ZIP:		TELEPHONE NUMBER:	TOLL FREE TEL. NO:		
PRINCIPAL PLACE OF BUSINESS ADDRESS IF DIFFERENT FROM ABOVE (SEE INSTRUCTIONS TO VENDORS ITEM #11):					
PRINT NAME & TITLE OF PERSON SIGNING ON BEHALF OF VENDOR:		FAX NUMBER:			
VENDOR'S AUTHORIZED SIGNATURE:	DATE:	EMAIL:			

Offer valid for at least 90 days from date of bid opening, unless otherwise stated here: ______ days. After this time, any withdrawal of offer shall be made in writing, effective upon receipt by the agency issuing this IFB.

ACCEPTANCE OF BID

VENDOR:

If any or all parts of this bid are accepted by the State of North Carolina, an authorized representative of the Department of Transportation shall affix his/her signature hereto and this document and all provisions of this Invitation for Bid along with the Vendor bid response and the written results of any negotiations shall then constitute the written agreement between the parties. A copy of this acceptance will be forwarded to the successful Vendor(s).

FOR STATE USE ONLY: Offer accepted and Contract awarded this day of, 20	_, as indicated on
the attached certification, by	
(Authorized Representative of the Department of Transportation).	

Table of Contents

1.0	PURPOSE AND BACKGROUND
2.0	GENERAL INFORMATION
2.1	INVITATION FOR BIDS DOCUMENT5
2.2	IFB SCHEDULE
2.3	BID QUESTIONS
2.4	BID SUBMITTAL6
2.5	BID CONTENTS7
2.6	DEFINITIONS, ACRONYMS, AND ABBREVIATIONS8
2.7	NOTICE TO VENDORS REGARDING TERMS AND CONDITIONS9
3.0	METHOD OF AWARD AND BID EVALUATION PROCESS10
3.1	METHOD OF AWARD10
3.2	CONFIDENTIALITY AND PROHIBITED COMMUNICATIONS DURING EVALUATION10
3.3	BID EVALUATION PROCESS11
3.4	PERFORMANCE OUTSIDE THE UNITED STATES11
3.5	TITLE VI and NONDISCRIMINATION12
3.6	INTERPRETATION OF TERMS AND PHRASES17
4.0	REQUIREMENTS17
4.1	CONTRACT TERM17
4.2	PRICING18
4.3	QUALITY ACCEPTANCE INSPECTION
	WARRANTY18
4.5	INVOICES
4.6	VENDORS19
4.7	VENDOR RESPONSIBILITIES AND REQUIREMENTS
4.8	AGENCY RESPONSIBILITIES23
4.9	OTHER ITEMS AND SPECIAL TERMS24
5.0	SCOPE OF WORK26
5.1	GENERAL SPECIFICATIONS26
5.2	SITE DATA26
5.3	TURNING MOVEMENT DATA – STANDARD SINGLE POINT JUNCTION
5.4	MIXED DATA – STANDARD MULTI-POINT JUNCTION
5.5	MIXED DATA – COMPLEX JUNCTION (ORIGINATION/DESTINATION)29
5.6	VOLUME/SPEED/CLASS DATA – SINGLE LOCATION

5.7	VOLUME/SPEED/CLASS DATA – RAIL DIVISION GROUPS	33
5.8	SPOT SPEED (FREE FLOW SPEED) DATA	34
5.9	DELAY DATA	35
5.10	GAP DATA	35
5.11	SATURATION FLOW RATE DATA	36
5.12	TRAVEL TIME DATA	37
5.13	SCHOOL OPERATIONS DATA	37
5.14	PEDESTRIAN CORRIDOR DATA	38
5.15	COMPLIANCE DATA	39
5.16	VOLUME/CLASS DATA – NON-MOTORISTS	40
5.17	VEHICLE OCCUPANCY DATA	41
5.18	VIDEO (GROUND or AERIAL)	42
5.19	QUEUE DATA	42
5.20	VOLUME ONLY DATA (MOTOR VEHICLES) – SINGLE LOCATION	42
5.21	VOLUME ONLY DATA (MOTOR VEHICLES) – SEASONAL STUDY GROUP	43
5.22	GENERAL TRAFFIC DATA	47
5.23	MANUAL CLASSIFICATION DATA	47
5.24	CONTRACT CHANGES	48
АТТАС	HMENT A: PRICING FORM	49
АТТАС	HMENT B: LOCATION OF WORKERS UTILIZED BY VENDOR	51
АТТАС	HMENT C: INSTRUCTIONS TO VENDORS	52
ΑΤΤΑϹ	HMENT D: GENERAL CONTRACT TERMS & CONDITIONS	55
	HMENT E: EXECUTION OF BID NON-COLLUSION, DEBARMENT AND GIFT BAN CERTIFICATION	59
АТТАС	HMENT F: DEBARMENT CERTIFICATION OF PREQUALIFIED BIDDER	65
АТТАС	HMENT G: EXPERIENCE RATE MODIFIER (ERM)	71

This Space is Intentionally Left Blank

1.0 PURPOSE AND BACKGROUND

Pursuant to G.S. 136-18 (1) and G.S. 136-28.1 (f), the purpose of this IFB and any resulting award is to solicit bids from Vendors that have been prequalified in accordance with NCDOT Discipline Code 309 ("Traffic Data Collection") for the collection of traffic data for the North Carolina Department of Transportation (NCDOT) (19A NCAC 02D.0801 (b)). Vendors shall also be prequalified in Discipline Code 551 ("Unmanned Aircraft System (UAS) Operator") prior to conducting any aerial video work. This data is used by a variety of business units in the agency for project development, safety and mobility initiatives, planning, and forecasting in connection with the planning, operations, design, maintenance, repair, and construction of transportation infrastructure.

The work in general will consist of collecting site information and traffic data for each location to include vehicle turning movement, volume/speed/class, and other data types as indicated in the scope of work. Most work will have a two (2) week deadline, but some deadlines may be longer or shorter depending on the type of traffic data collected or the sensitivity of the specific request. Deliverables will generally consist of a summary of site information (road names, signs, signals, weather conditions, maps, pictures, etc.), tabulated and summarized traffic data, and, in some cases, video.

Background for this IFB can be found at the following URLs:

Historical traffic data collection information: https://connect.ncdot.gov/resources/safety/TrafficDataResources/Historical%20Data.pdf

NCDOT traffic data collection web site and information: https://connect.ncdot.gov/resources/safety/Pages/Traffic-Data.aspx

Bids shall be submitted in accordance with the terms and conditions of this IFB and any addenda issued hereto.

2.0 GENERAL INFORMATION

2.1 INVITATION FOR BIDS DOCUMENT

The IFB is comprised of the base IFB document, any attachments, and any addenda released before Contract award. All attachments and addenda released for this IFB in advance of any Contract award are incorporated herein by reference.

2.2 IFB SCHEDULE

The table below shows the *intended* schedule for this IFB. The Contract Lead will make every effort to adhere to this schedule.

Action	Responsibility	Date and Time
Issue IFB	State	November 15, 2021
Submit Written Questions	Vendors	November 22, 2021 by 12:00 PM ET
Submit Bids	Vendors	December 7, 2021 by 2:00 PM ET
Award Contract	State	TBD
Contract Effective Date	State	January 1, 2022

2.3 BID QUESTIONS

Purpose: Upon review of the IFB documents, Vendors may have questions to clarify or interpret the IFB in order to submit the best bid possible. To accommodate the Bid Questions process, Vendors shall submit any such questions by the above due date.

Instructions: Written questions shall be emailed to <u>ctandresen@ncdot.gov</u> by the date and time specified above. Vendors will enter "IFB # 54-CA-11102021 – Questions" as the subject for the email. Questions submittals will include a reference to the applicable IFB section and be submitted in a format shown below:

Reference	Vendor Question	
IFB Section, Page Number	Vendor question?	

Questions received prior to the submission deadline date, the State's response, and any additional terms deemed necessary by the State will be posted in the form of an addendum to the Interactive Purchasing System (IPS), http://www.ips.state.nc.us, and shall become an Addendum to this IFB. No information, instruction or advice provided orally or informally by any State personnel, whether made in response to a question or otherwise in connection with this IFB, shall be considered authoritative or binding. Vendors shall be entitled to rely *only* on written material contained in an Addendum to this IFB.

2.4 BID SUBMITTAL

Instructions: Sealed bids, subject to the conditions made a part hereof and the receipt requirements described below, shall be received at the address indicated in the table below, for furnishing and delivering those items as described herein. Refer to Section 2.6 BID CONTENTS for details on required content of submitted bids.

OFFICE ADDRESS FOR DELIVERY BY ANY OTHER MEANS, SPECIAL DELIVERY, OVERNIGHT DELIVERY, OR BY ANY OTHER CARRIER	
BID NUMBER: 54-CA-11102021 Attn: Christian Andresen N. C. Department of Transportation - Purchasing Section 1 South Wilmington Street, Room 334B Raleigh, NC 27601	

IMPORTANT NOTE: It is the responsibility of the Vendor to have the signed bid physically in this Office by the specified time and date of opening, regardless of the method of delivery. **This is an absolute requirement.** The time of delivery will be marked on each bid when received, and any bid received after the bid submission deadline will not be accepted or evaluated. Sealed bids, subject to the conditions made a part hereof, will be received at the address indicated in the table in this Section, for furnishing and delivering the service as described herein.

All risk of late arrival due to unanticipated delay—whether delivered by hand, U.S. Postal Service, courier or other delivery service or method—is entirely on the Vendor. Note that the U.S. Postal Service generally does not deliver mail to the street address above, but to the State's Mail Service Center. Vendors are cautioned that bids sent via U.S. Mail, including Express Mail, may not be delivered by the Mail Service Center to the agency's purchasing office on the due date in time to meet the bid deadline. All Vendors are urged to take the possibility of delay into account when submitting a bid.

Vendors shall deliver one (1) signed, original executed bid response, one (1) copy of the signed original executed bid, one (1) unredacted electronic copy on flash drive and one (1) redacted (Proprietary and Confidential Information Excluded) electronic copy on flash drive of its bid to the address identified in the table in this Section. Include only bids in response to this IFB in a sealed package. Address package and insert bid number as shown in the table in this Section. The electronic files shall <u>not</u> be password-protected, shall be in .PDF or .XLS format, and shall be capable of being copied to other media including readable in Microsoft Word and/or Microsoft Excel.

Bids shall be marked on the outside of the sealed envelope with the Vendor's name, Bid number and date and time of opening. If Vendor is submitting more than one bid, each bid shall be submitted in separate sealed envelopes and marked accordingly. For delivery purposes, separate sealed bids from a single Vendor may be included in the same outer package.

Attempts to submit a Bid via facsimile (FAX) machine, telephone or electronic means, including but not limited to email, in response to this Invitation for Bids will <u>not</u> be accepted. Bids are subject to rejection unless submitted with the information above included on the outside of the sealed bid package.

Critical updated information may be included in Addenda to this IFB. It is important that all Vendors proposing on this IFB periodically check the State's IPS website for any Addenda that may be issued prior to the bid opening date. All Vendors shall be deemed to have read and understood all information in this IFB and all Addenda thereto.

Contact with anyone working for or with the State regarding this IFB other than the State Contract Lead named on the face page of this IFB in the manner specified by this IFB shall constitute grounds for rejection of said Vendor's offer, at the State's election.

2.5 BID CONTENTS

Instructions: For each of Vendor's bid, Vendors shall populate all attachments of this IFB that require the Vendor to provide information and include an authorized signature where requested, as outlined below. Vendor IFB responses shall include the following items and they should be arranged in the following order:

- a) Cover page with Vendor name and Federal ID Number or Social Security Number (second sheet of IFB).
- b) Completed and signed version of EXECUTION PAGE, along with the body of the IFB and signed receipt pages of any addenda released in conjunction with this IFB, (if required to be returned).
- c) Cover letter (one page maximum).
- d) A list of personnel (one page maximum) that are proposed to perform this work including (1) individual's name, (2) years of experience for this type of work, (3) their position (field data collection, data processor, project manager, etc.), (4) and whether or not they are an employee or non-employee (contract employee, subcontractor, or independent contractor). The project manager (the point of contact individual performing the day to day operations, oversight, assignments and quality control) shall be clearly identified. The project manager and any other individuals listed for this work as being in positions labeled as "oversight", "supervisor", "manager", "specialist", "lead" or their cognates shall be considered key personnel. Vendors not providing this information shall render the bid non-responsive and it shall be rejected.
- e) Completed version of ATTACHMENT A: PRICING FORM in whole U.S. dollar amounts only. Vendors not providing this information in the requested format (whole U.S. dollar amounts) shall render the bid non-responsive and it shall be rejected for any and all items where whole U.S. dollars are not used. Vendors will not be considered for award for any item left blank.
- f) Completed version of ATTACHMENT B: LOCATION OF WORKERS UTILIZED BY VENDOR. Note that any contract employees, subcontractors and/or independent contractors listed in ATTACHMENT B shall conform to the requirements of Section 4.15 VENDORS of this IFB before they can perform any work on, or related to, this IFB.
- g) ATTACHMENT C: INSTRUCTIONS TO VENDORS
- h) ATTACHMENT D: NORTH CAROLINA GENERAL CONTRACT TERMS AND CONDITIONS
- i) Completed and signed ATTACHMENT E: IRAN DIVESTMENT ACT CERTIFICATION
- **j)** Completed and signed ATTACHMENT F: EXPERIENCE RATE MODIFIER (ERM) as well as any additional documentation required by ATTACHMENT F (if applicable). Note that any Vendors not providing this information

shall render the bid non-responsive and it shall be rejected. <u>Vendors having an ERM greater than 1.30 at the time of the bid opening shall not be considered.</u>

k) Proof of insurance in the types and minimum amounts specified in ATTACHMENT D.

2.6 DEFINITIONS, ACRONYMS, AND ABBREVIATIONS

- a) AADT: Annual Average Daily Traffic
- b) **BAFO**: Best and Final Offer, submitted by a Vendor to alter its initial bid, made in response to a request by the issuing agency.
- c) **BUYER:** The employee of the State or Other Eligible Entity that places an order with the Vendor.

d) **BICYCLISTS:** Human-powered vehicle with two wheels in tandem designed to transport, by the action of pedaling,

one or more persons seated on one or more saddle seats on its frame. (G.S. 20-171.8)

- d) CFI: Continuous flow intersection
- e) **CONTRACT LEAD:** Representative of the Department of Transportation who corresponds with potential Vendors in order to identify and contract with that Vendor providing the greatest benefit to the State and who will administer the contract for the State.
- f) ERM: Experience rate modifier
- g) FAA: Federal Aviation Administration
- h) FHWA: Federal Highway Administration
- i) FRA: Federal Railroad Administration
- j) FTS: File Transfer System
- k) HAZMAT: Hazardous Material
- I) HOV: High occupancy vehicle
- m) IFB: Invitation for Bids.
- n) IPS: Interactive Purchasing System
- o) LIDAR: Light detection and ranging
- p) LOT: A grouping of similar products within an IFB.
- q) MPH: Miles per hour
- r) MUTCD: The Manual on Uniform Traffic Control Devices
- s) NCBELS: North Carolina Board of Examiners for Engineers and Surveyors
- t) NCDOT: North Carolina Department of Transportation
- u) NESC: National Electric Safety Code
- v) **NOAA**: National Oceanic and Atmospheric Administration
- w) NWS: National Weather Service
- x) **ON-TIME DELIVERY:** The delivery of all items within a single order to the receiving point designated by the ordering entity within the delivery time required.
- y) **OSHA:** Occupational Safety and Health Administration
- z) **PEDESTRIAN:** Any person not in or upon a motor vehicle or other road vehicle. Includes a person afoot, sitting, lying or working upon a land way or place. (DMV Instruction Manual)
- aa) **PHF:** Peak Hour Factor
- bb) PPD: PostScript Printer Description file
- cc) QUALIFIED BID: A responsive bid submitted by a responsible Vendor.
- dd) REGION A: NCDOT Highway Divisions 1, 2, and 3
- ee) REGION B: NCDOT Highway Divisions 4, 5, 6, 7, and 8

- ff) **REGION C:** NCDOT Highway Divisions 9, 10, and 12
- gg) REGION D: NCDOT Highway Divisions 11, 13, and 14
- hh) RFP: Request for Proposal
- ii) SOP: Safe operating procedures
- jj) **STATE:** The State of North Carolina, including any of its sub-units recognized under North Carolina law.
- kk) **STATE AGENCY:** Any of the more than 400 sub-units within the executive branch of the State, including its departments, boards, commissions, institutions of higher education and other institutions.
- II) TEAAS: Traffic Engineering Accident Analysis System
- mm) **TEPPL:** Traffic Engineering Policies, Practices, and Legal Authority
- nn) TMG: Traffic Monitoring Guide (FHWA)
- oo) TTDT: Truck Tractor Dual Trailer (trucks with twin trailers)
- pp) TTST: Truck Tractor Single Trailer
- qq) **UAS:** Unmanned Aircraft System (i.e. drone)
- rr) **VENDOR:** Supplier, bidder, proposer, company, firm, corporation, partnership, individual or other entity submitting a response to an Invitation for Bids.
- ss) VPD: Vehicles per day

2.7 NOTICE TO VENDORS REGARDING TERMS AND CONDITIONS

It shall be the Vendor's responsibility to read the Instructions, the State's terms and conditions, all relevant exhibits and attachments, and any other components made a part of this IFB, and comply with all requirements and specifications herein. Vendors also are responsible for obtaining and complying with all Addenda and other changes that may be issued in connection with this IFB.

If Vendors have questions, issues, or exceptions regarding any term, condition, instruction or other component within this IFB, those shall be submitted as questions in accordance with the instructions in Section 2.4 BID QUESTIONS. If the State determines that any changes will be made as a result of the questions asked, then such decisions will be communicated in the form of an IFB addendum. The State may also elect to leave open the possibility for later negotiation and amendment of specific provisions of the Contract that have been addressed during the question and answer period. Other than through this process, the State rejects and will not be required to evaluate or consider any additional or modified terms and conditions or Instructions to Vendor submitted with Vendor's bid document. This applies to any language appearing in or attached to the document as part of the Vendor's bid that purports to vary any terms and conditions or Vendors' instructions herein or to render the bid non-binding or subject to further negotiation. *Vendor's bid shall constitute a firm offer.* By execution and delivery of a bid in response to this Invitation for Bids, Vendor agrees that any additional or modified terms and conditions, including Instructions to Vendors, whether submitted purposely or inadvertently, or any purported condition to the offer shall have no force or effect, and will be disregarded. Noncompliance with, or any attempt to alter or delete, this paragraph shall constitute sufficient grounds to reject Vendor's bid as nonresponsive.

If a Vendor desires modification of the terms and conditions of this solicitation, it is urged and cautioned to inquire during the question period, in accordance with the instructions in Section 2.4 BID QUESTIONS, about whether specific language proposed as a modification is acceptable to or will be considered by the State. Identification of objections or exceptions to the State's terms and conditions in the bid itself shall not be allowed and shall be disregarded or the bid rejected. By executing and submitting its bid in response to this IFB, Vendor understands and agrees that the State may exercise its discretion not to consider any and all proposed modifications a Vendor may request and may accept Vendor's bid under the terms and conditions in this IFB.

3.0 METHOD OF AWARD AND BID EVALUATION PROCESS

3.1 METHOD OF AWARD

All qualified bids will be evaluated, and award or awards will be based on the maximum number of lowest responsive bids meeting specifications as follows:

Data Type	Vendors
Turning Movement – Standard Junction	Six (6) Vendors per Region
Mixed Data – Standard Multi-Point Junction	Five (5) Vendors per Region
Volume/Speed/Class – Single Location	Six (6) Vendors per Region
Volume/Speed/Class – Rail Division Groups	Seven (7) Vendors per Region
Volume Only Data – Seasonal Study Group	Eight (8) Vendors per Region
School Operations Data	Four (4) Vendors per Region
Compliance	Four (4) Vendors per Region
All other items	Three (3) Vendors per Region

While the intent of this IFB is to award a Contract to multiple Vendors for all line items, the State reserves the right to make separate awards to different Vendors for one or more line items, to not award one or more line items, or to cancel this IFB in its entirety without awarding a Contract, if it is considered to be most advantageous to the State to do so.

The State reserves the right to waive any minor informality or technicality in bids received.

3.2 CONFIDENTIALITY AND PROHIBITED COMMUNICATIONS DURING EVALUATION

During the evaluation period—from the date bids are opened through the date the contract is awarded—each Vendor submitting a bid (including its representatives, sub-contractors and/or suppliers) is prohibited from having any communications with any person inside or outside the using agency, issuing agency, other government agency office, or body (including the purchaser named above, department secretary, agency head, members of the general assembly and/or governor's office), or private entity, if the communication refers to the content of Vendor's bid or qualifications, the contents of another Vendor's bid, another Vendor's qualifications or ability to perform the contract, and/or the transmittal of any other communication of information that could be reasonably considered to have the effect of directly or indirectly influencing the evaluation of bids and/or the award of the contract. A Vendor not in compliance with this provision shall be disgualified from contract award, unless it is determined in the State's discretion that the communication was harmless, that it was made without intent to influence and that the best interest of the State would not be served by the disqualification. A Vendor's bid may be disqualified if its sub-contractor and supplier engage in any of the foregoing communications during the time that the procurement is active (i.e., the issuance date of the procurement to the date of contract award). Only those discussions, communications or transmittals of information authorized or initiated by the issuing agency for this IFB or general inquiries directed to the purchaser regarding requirements of the IFB (prior to bid submission) or the status of the contract award (after submission) are excepted from this provision.

3.3 BID EVALUATION PROCESS

The State shall review all Vendor responses to this IFB to confirm that they meet the specifications and requirements of the IFB. <u>All Vendors submitting bids shall conform to the requirements of Section 4.15 VENDORS of this</u> <u>IFB at the time of the bid opening or their bids shall be rejected.</u>

- a) Bids are requested for the items as specified. The State reserves the right to reject any bid on the basis of fit, form and function as well as cost. All information furnished on this bid may be used as a factor in determining the award of this contract.
- b) Bids will be received from each responsive Vendor in a sealed envelope or package.
- c) All bids shall be received by the issuing agency not later than the date and time specified on the cover sheet of this IFB.
- d) At that date and time specified as the bid opening, the package containing the bids from each responding firm will be opened publicly and the name of the Vendor and the price(s) bid announced (if requested by a responsive Vendor who is physically present at the bid opening).
- e) The State shall review all Vendor responses to this IFB to confirm that they meet the specifications and requirements of the IFB.
- f) For all responses that pass the initial review process, the State will review and assess the Vendors' pricing. The State may request additional formal responses or submissions from any or all Vendors for the purpose of clarification or to amplify the materials presented in any part of the bid. Vendors are cautioned, however, that the State is not required to request clarification, and often does not. Therefore, all bids should be complete and reflect the most favorable terms available from the Vendor. Prices bid cannot be altered or modified as part of a clarification.
- g) Bids will be evaluated, based on the award criteria identified in Section 3.1 METHOD OF AWARD.

Vendors are cautioned that this is a request for offers, not an offer or request to contract, and the State reserves the unqualified right to reject any and all offers at any time if such rejection is deemed to be in the best interest of the State.

The State reserves the right to reject all original offers and request one or more of the Vendors submitting bids within a competitive range to submit a best and final offer (BAFO), based on discussions and negotiations with the State, if the initial responses to the IFB have been evaluated and determined to be unsatisfactory.

Upon completion of the evaluation process, the State will make award(s) based on the evaluation and post the award(s) to IPS under the IFB number for this solicitation. Award of a Contract to one Vendor does not mean that the other bids lacked merit, but that, all factors considered, the selected bid was deemed most advantageous and represented the best value to the State.

3.4 PERFORMANCE OUTSIDE THE UNITED STATES

Vendor shall complete ATTACHMENT B: LOCATION OF WORKERS UTILIZED BY VENDOR. In addition to any other evaluation criteria identified in this IFB, the State may, for purposes of evaluating proposed or actual <u>contract</u> <u>performance outside of the United States</u>, also consider how that performance may affect the following factors to ensure that any award will be in the best interest of the State:

- a) Total cost to the State
- b) Level of quality provided by the Vendor
- c) Process and performance capability across multiple jurisdictions
- d) Protection of the State's information and intellectual property
- e) Availability of pertinent skills

- f) Ability to understand the State's business requirements and internal operational culture
- g) Particular risk factors such as the security of the State's information technology
- h) Relations with citizens and employees
- i) Contract enforcement jurisdictional issues

3.5 TITLE VI and NONDISCRIMINATION

Revise the 2018 Standard Specifications as follows:

Replace Article 103-4(B) with the following:

The North Carolina Department of Transportation is committed to carrying out the U.S. Department of Transportation's policy of ensuring nondiscrimination in the award and administration of contracts.

The provisions of this section related to United States Department of Transportation (US DOT) Order 1050.2A, Title 49 Code of Federal Regulations (CFR) part 21, 23 United States Code (U.S.C.) 140 and 23 CFR part 200 (or 49 CFR 303, 49 U.S.C. 5332 or 49 U.S.C. 47123) are applicable to all North Carolina Department of Transportation (NCDOT) contracts and to all related subcontracts, material supply, engineering, architectural and other service contracts, regardless of dollar amount. Any Federal provision that is specifically required not specifically set forth is hereby incorporated by reference.

(1) Title VI Assurances (USDOT Order 1050.2A, Appendix A)

During the performance of this contract, the contractor, for itself, its assignees, and successors in interest (hereinafter referred to as the "contractor") agrees as follows:

(a) Compliance with Regulations

The contractor (hereinafter includes consultants) shall comply with the Acts and the Regulations relative to Nondiscrimination in Federally-assisted programs of the U.S. Department of Transportation, Federal Highway Administration (FHWA), as they may be amended from time to time, which are herein incorporated by reference and made a part of this contract.

(b) Nondiscrimination

The contractor, with regard to the work performed by it during the contract, shall not discriminate on the grounds of race, color, or national origin in the selection and retention of subcontractors, including procurements of materials and leases of equipment. The contractor shall not participate directly or indirectly in the discrimination prohibited by the Acts and the Regulations, including employment practices when the contract covers any activity, project, or program set forth in Appendix B of 49 CFR Part 21.

- (c) Solicitations for Subcontractors, Including Procurements of Materials and Equipment In all solicitations, either by competitive bidding, or negotiation made by the contractor for work to be performed under a subcontract, including procurements of materials, or leases of equipment, each potential subcontractor or supplier shall be notified by the contractor of the contractor's obligations under this contract and the Acts and the Regulations relative to Nondiscrimination on the grounds of race, color, or national origin.
- (d) Information and Reports

The contractor shall provide all information and reports required by the Acts, the Regulations, and directives issued pursuant thereto and shall permit access to its books, records, accounts, other sources of information, and its facilities as may be determined by the Recipient or the FHWA to be pertinent to ascertain compliance with such Acts, Regulations, and instructions. Where any information required of a contractor is in the exclusive possession of another who fails or refuses to furnish the information, the contractor shall so certify to the Recipient or the FHWA, as appropriate, and shall set forth what efforts it has made to obtain the information.

(e) Sanctions for Noncompliance:

In the event of a contractor's noncompliance with the Non-discrimination provisions of this contract, the Recipient will impose such contract sanctions as it and/or the FHWA may determine to be appropriate, including, but not limited to:

- (i) Withholding payments to the contractor under the contract until the contractor complies; and/or
- (ii) Cancelling, terminating, or suspending a contract, in whole or in part.
- (f) Incorporation of Provisions

The contractor shall include the provisions of paragraphs one through six in every subcontract, including procurements of materials and leases of equipment, unless exempt by the Acts, the Regulations and directives issued pursuant thereto. The contractor shall take action with respect to any subcontract or

Vendor:

procurement as the Recipient or the FHWA may direct as a means of enforcing such provisions including sanctions for noncompliance. Provided, that if the contractor becomes involved in, or is threatened with litigation by a subcontractor, or supplier because of such direction, the contractor may request the Recipient to enter into any litigation to protect the interests of the Recipient. In addition, the contractor may request the United States to enter into the litigation to protect the interests of the United States.

(2) Title VI Nondiscrimination Program (23 CFR 200.5(p))

The North Carolina Department of Transportation (NCDOT) has assured the USDOT that, as a condition to receiving federal financial assistance, NCDOT will comply with Title VI of the Civil Rights Act of 1964 and all requirements imposed by Title 49 CFR part 21 and related nondiscrimination authorities to ensure that no person shall, on the ground of race, color, national origin, limited English proficiency, sex, age, or disability (including religion/creed or income-level, where applicable), be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any programs, activities, or services conducted or funded by NCDOT. Contractors and other organizations under contract or agreement with NCDOT must also comply with Title VI and related authorities, therefore:

- (a) During the performance of this contract or agreement, contractors (e.g., subcontractors, consultants, vendors, prime contractors) are responsible for complying with NCDOT's Title VI Program. Contractors are not required to prepare or submit Title VI Programs. To comply with this section, the prime contractor shall:
 - Post NCDOT's Notice of Nondiscrimination and the Contractor's own Equal Employment Opportunity (EEO) Policy in conspicuous locations accessible to all employees, applicants and subcontractors on the jobsite.
 - 2. Physically incorporate the required Title VI clauses into all subcontracts on federally-assisted and statefunded NCDOT projects, and ensure inclusion by subcontractors into all lower-tier subcontracts.
 - 3. Required Solicitation Language. The Contractor shall include the following notification in all solicitations for bids and requests for work or material, regardless of funding source: "The North Carolina Department of Transportation, in accordance with the provisions of Title VI of the Civil Rights Act of 1964 (78 Stat. 252, 42 US.C. §§ 2000d to 2000d-4) and the Regulations, hereby notifies all bidders that it will affirmatively ensure that any contract entered into pursuant to this advertisement, disadvantaged business enterprises will be afforded full and fair opportunity to submit bids in response to this invitation and will not be discriminated against on the grounds of race, color, or national origin in consideration for an award. In accordance with other related nondiscrimination authorities, bidders and contractors will also not be discriminated against on the grounds of sex, age, disability, low-income level, creed/religion, or limited English proficiency in consideration for an award."
 - 4. Physically incorporate the FHWA-1273, in its entirety, into all subcontracts and subsequent lower tier subcontracts on Federal-aid highway construction contracts only.
 - 5. Provide language assistance services (i.e., written translation and oral interpretation), free of charge, to LEP employees and applicants. Contact NCDOT OCR for further assistance, if needed.
 - 6. For assistance with these Title VI requirements, contact the NCDOT Title VI Nondiscrimination Program at 1-800-522-0453.
- (b) Subrecipients (e.g. cities, counties, LGAs, planning organizations) may be required to prepare and submit a Title VI Plan to NCDOT, including Title VI Assurances and/or agreements. Subrecipients must also ensure compliance by their contractors and subrecipients with Title VI. (23 CFR 200.9(b)(7))
- (c) If reviewed or investigated by NCDOT, the contractor or subrecipient agrees to take affirmative action to correct any deficiencies found within a reasonable time period, not to exceed 90 calendar days, unless additional time is granted by NCDOT. (23 CFR 200.9(b)(15))
- (d) The Contractor is responsible for notifying subcontractors of NCDOT's External Discrimination Complaints Process.
 - 1. Applicability

Title VI and related laws protect participants and beneficiaries (e.g., members of the public and contractors) from discrimination by NCDOT employees, subrecipients and contractors, regardless of funding source.

2. Eligibility

Any person—or class of persons—who believes he/she has been subjected to discrimination based on race, color, national origin, Limited English Proficiency (LEP), sex, age, or disability (and religion in the context of employment, aviation, or transit) may file a written complaint. The law also prohibits intimidation or retaliation of any sort.

- Time Limits and Filing Options Complaints may be filed by the affected individual(s) or a representative and must be filed no later than 180 calendar days after the following:
- (i) The date of the alleged act of discrimination; or

- (ii) The date when the person(s) became aware of the alleged discrimination; or
- (iii) Where there has been a continuing course of conduct, the date on which that conduct was discontinued or the latest instance of the conduct.
 - Title VI and related discrimination complaints may be submitted to the following entities:
- North Carolina Department of Transportation, Office of Civil Rights, Title VI Program, 1511 Mail Service Center, Raleigh, NC 27699-1511; toll free 1-800-522-0453
- Federal Highway Administration, North Carolina Division Office, 310 New Bern Avenue, Suite 410, Raleigh, NC 27601, 919-747-7010
- US Department of Transportation, Departmental Office of Civil Rights, External Civil Rights Programs Division, 1200 New Jersey Avenue, SE, Washington, DC 20590; 202-366-4070
- 4. Format for Complaints Complaints must be in writing and signed by the complainant(s) or a representative, and include the complainant's name, address, and telephone number. Complaints received by fax or e-mail will be acknowledged and processed. Allegations received by telephone will be reduced to writing and provided to the complainant for confirmation or revision before processing. Complaints will be accepted in other languages, including Braille.
- Discrimination Complaint Form Contact NCDOT Civil Rights to receive a full copy of the Discrimination Complaint Form and procedures.
- 6. Complaint Basis

Allegations must be based on issues involving race, color, national origin (LEP), sex, age, disability, or religion (in the context of employment, aviation or transit). "Basis" refers to the complainant's membership in a protected group category.

TABLE 103-1 COMPLAINT BASIS				
Protected Categories	Definition	Examples	Applicable Nondiscrimination Authorities	
Race and Ethnicity	An individual belonging to one of the accepted racial groups; or the perception, based usually on physical characteristics that a person is a member of a racial group	Black/African American, Hispanic/Latino, Asian, American Indian/Alaska Native, Native Hawaiian/Pacific Islander, White	Title VI of the Civil Rights Act of 1964; 49 CFR Part 21; 23 CFR 200; 49 U.S.C. 5332(b); 49 U.S.C. 47123. (<i>Executive Order 13166</i>)	
Color	Color of skin, including shade of skin within a racial group	Black, White, brown, yellow, etc.		
National Origin (Limited English Proficiency)	Place of birth. Citizenship is not a factor. (Discrimination based on language or a person's accent is also covered)	Mexican, Cuban, Japanese, Vietnamese, Chinese		
Sex	Gender. The sex of an individual. <i>Note:</i> Sex under this program does not include sexual orientation.	Women and Men	1973 Federal-Aid Highway Act; 49 U.S.C. 5332(b); 49 U.S.C. 47123.	
Age	Persons of any age	21-year-old person	Age Discrimination Act of 1975 49 U.S.C. 5332(b); 49 U.S.C. 47123.	
Disability	Physical or mental impairment, permanent or temporary, or perceived.	Blind, alcoholic, para-amputee, epileptic, diabetic, arthritic	Section 504 of the Rehabilitation Act of 1973; Americans with Disabilities Act of 1990	

Religion (in the context of employment) (<i>Religion/ Creed in all</i> <i>aspects of any aviation or</i> <i>transit-related</i> <i>construction</i>)	An individual belonging to a religious group; or the perception, based on distinguishable characteristics that a person is a member of a religious group. In practice, actions taken as a result of the moral and ethical beliefs as to what is right and wrong, which are sincerely held with the strength of traditional religious views. <i>Note:</i> Does not have to	Muslim, Christian, Sikh, Hindu, etc.	Title VII of the Civil Rights Act of 1964; 23 CFR 230; FHWA-1273 Required Contract Provisions. (49 U.S.C. 5332(b); 49 U.S.C. 47123)
	are sincerely held with the		
	0		
	be associated with a recognized religious group or church; if an		
	individual sincerely holds to the belief, it is a protected religious		
	practice.		

(3) Pertinent Nondiscrimination Authorities

During the performance of this contract, the contractor, for itself, its assignees, and successors in interest agrees to comply with the following non-discrimination statutes and authorities, including, but not limited to:

- Title VI of the Civil Rights Act of 1964 (42 U.S.C. § 2000d et seq., 78 stat. 252), (prohibits discrimination on the basis of race, color, national origin); and 49 CFR Part 21.
- The Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970, (42 U.S.C. § 4601), (prohibits unfair treatment of persons displaced or whose property has been acquired because of Federal or Federal-aid programs and projects);
- Federal-Aid Highway Act of 1973, (23 U.S.C. § 324 et seq.), (prohibits discrimination on the basis of sex);
- Section 504 of the Rehabilitation Act of 1973, (29 U.S.C. § 794 et seq.), as amended, (prohibits discrimination on the basis of disability) and 49 CFR Part 27;
- The Age Discrimination Act of 1975, as amended, (42 U.S.C. § 6101 et seq.), (prohibits discrimination on the basis of age);
- Airport and Airway Improvement Act of 1982, (49 USC § 471, Section 47123), as amended, (prohibits discrimination based on race, creed, color, national origin, or sex);
- (g) The Civil Rights Restoration Act of 1987, (PL 100-209), (Broadened the scope, coverage and applicability of Title VI of the Civil Rights Act of 1964, The Age Discrimination Act of 1975 and Section 504 of the Rehabilitation Act of 1973, by expanding the definition of the terms "programs or activities" to include all of the programs or activities of the Federal-aid recipients, sub-recipients and contractors, whether such programs or activities are Federally funded or not);
- (h) Titles II and III of the Americans with Disabilities Act, which prohibit discrimination on the basis of disability in the operation of public entities, public and private transportation systems, places of public accommodation, and certain testing entities (42 U.S.C. §§ 12131-12189) as implemented by Department of Transportation regulations at 49 C.F.R. parts 37 and 38;
- (i) The Federal Aviation Administration's Nondiscrimination statute (49 U.S.C. § 47123) (prohibits discrimination on the basis of race, color, national origin, and sex);
- (j) Executive Order 12898, Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations, which ensures Nondiscrimination against minority populations by discouraging programs, policies, and activities with disproportionately high and adverse human health or environmental effects on minority and low-income populations;
- (k) Executive Order 13166, Improving Access to Services for Persons with Limited English Proficiency, and resulting agency guidance, national origin discrimination includes discrimination because of Limited English proficiency (LEP). To ensure compliance with Title VI, you must take reasonable steps to ensure that LEP persons have meaningful access to your programs (70 Fed. Reg. at 74087 to 74100);
- (I) Title IX of the Education Amendments of 1972, as amended, which prohibits you from discriminating because of sex in education programs or activities (20 U.S.C. 1681 et seq).
- (m) Title VII of the Civil Rights Act of 1964 (42 U.S.C. § 2000e et seq., Pub. L. 88-352), (prohibits employment discrimination on the basis of race, color, religion, sex, or national origin).

(4) Additional Title VI Assurances

**The following Title VI Assurances (Appendices B, C and D) shall apply, as applicable

(a) Clauses for Deeds Transferring United States Property (1050.2A, Appendix B)

The following clauses will be included in deeds effecting or recording the transfer of real property, structures, or improvements thereon, or granting interest therein from the United States pursuant to the provisions of Assurance 4.

NOW, THEREFORE, the U.S. Department of Transportation as authorized by law and upon the condition that the North Carolina Department of Transportation (NCDOT) will accept title to the lands and maintain the project constructed thereon in accordance with the North Carolina General Assembly, the Regulations for the Administration of the Federal-Aid Highway Program, and the policies and procedures prescribed by the Federal Highway Administration of the U.S. Department of Transportation in accordance and in compliance with all requirements imposed by Title 49, Code of Federal Regulations, U.S. Department of Transportation, Subtitle A, Office of the Secretary, Part 21, Nondiscrimination in Federally-assisted programs of the U.S Department of Transportation pertaining to and effectuating the provisions of Title VI of the Civil Rights Act of 1964 (78 Stat. 252; 42 U.S.C. § 2000d to 2000d-4), does hereby remise, release, quitclaim and convey unto the NCDOT all the right, title and interest of the U.S. Department of Transportation in and to said lands described in Exhibit A attached hereto and made a part hereof. (HABENDUM CLAUSE)

TO HAVE AND TO HOLD said lands and interests therein unto the North Carolina Department of Transportation (NCDOT) and its successors forever, subject, however, to the covenants, conditions, restrictions and reservations herein contained as follows, which will remain in effect for the period during which the real property or structures are used for a purpose for which Federal financial assistance is extended or for another purpose involving the provision of similar services or benefits and will be binding on the NCDOT, its successors and assigns.

The NCDOT, in consideration of the conveyance of said lands and interests in lands, does hereby covenant and agree as a covenant running with the land for itself, its successors and assigns, that (1) no person will on the grounds of race, color, or national origin, be excluded from participation in, be denied the benefits of, or be otherwise subjected to discrimination with regard to any facility located wholly or in part on, over, or under such lands hereby conveyed [,] [and]* (2) that the NCDOT will use the lands and interests in lands and interests in lands so conveyed, in compliance with all requirements imposed by or pursuant to Title 49, Code of Federal Regulations, U.S. Department of Transportation, Subtitle A, Office of the Secretary, Part 21, Non-discrimination in Federally-assisted programs of the U.S. Department of Transportation, Effectuation of Title VI of the Civil Rights Act of 1964, and as said Regulations and Acts may be amended [, and (3) that in the event of breach of any of the above-mentioned nondiscrimination conditions, the Department will have a right to enter or re-enter said lands and facilities on said land, and that above described land and facilities will thereon revert to and vest in and become the absolute property of the U.S. Department of Transportation and its assigns as such interest existed prior to this instruction].* (*Reverter clause and related language to be used only when it is determined that such a clause is necessary in order to make clear the purpose of Title VI.)

(b) Clauses for Transfer of Real Property Acquired or Improved Under the Activity, Facility, or Program (1050.2A, Appendix C)

The following clauses will be included in deeds, licenses, leases, permits, or similar instruments entered into by the North Carolina Department of Transportation (NCDOT) pursuant to the provisions of Assurance 7(a):

- 1. The (grantee, lessee, permittee, etc. as appropriate) for himself/herself, his/her heirs, personal representatives, successors in interest, and assigns, as a part of the consideration hereof, does hereby covenant and agree [in the case of deeds and leases add "as a covenant running with the land"] that:
- (i.) In the event facilities are constructed, maintained, or otherwise operated on the property described in this (deed, license, lease, permit, etc.) for a purpose for which a U.S. Department of Transportation activity, facility, or program is extended or for another purpose involving the provision of similar services or benefits, the (grantee, licensee, lessee, permittee, etc.) will maintain and operate such facilities and services in compliance with all requirements imposed by the Acts and Regulations (as may be amended) such that no person on the grounds of race, color, or national origin, will be excluded from participation in, denied the benefits of, or be otherwise subjected to discrimination in the use of said facilities.
 - 2. With respect to licenses, leases, permits, etc., in the event of breach of any of the above Nondiscrimination covenants, the NCDOT will have the right to terminate the (lease, license, permit, etc.) and to enter, re-enter, and repossess said lands and facilities thereon, and hold the same as if the (lease, license, permit, etc.) had never been made or issued. *

3. With respect to a deed, in the event of breach of any of the above Nondiscrimination covenants, the NCDOT will have the right to enter or re-enter the lands and facilities thereon, and the above described lands and facilities will there upon revert to and vest in and become the absolute property of the NCDOT and its assigns. *

(*Reverter clause and related language to be used only when it is determined that such a clause is necessary to make clear the purpose of Title VI.)

(c) Clauses for Construction/Use/Access to Real Property Acquired Under the Activity, Facility or Program (1050.2A, Appendix D)

The following clauses will be included in deeds, licenses, permits, or similar instruments/ agreements entered into by the North Carolina Department of Transportation (NCDOT) pursuant to the provisions of Assurance 7(b):

- The (grantee, licensee, permittee, etc., as appropriate) for himself/herself, his/her heirs, personal
 representatives, successors in interest, and assigns, as a part of the consideration hereof, does hereby
 covenant and agree (in the case of deeds and leases add, "as a covenant running with the land") that
 (1) no person on the ground of race, color, or national origin, will be excluded from participation in,
 denied the benefits of, or be otherwise subjected to discrimination in the use of said facilities, (2) that in
 the construction of any improvements on, over, or under such land, and the furnishing of services
 thereon, no person on the ground of race, color, or national origin, will be excluded from participation
 in, denied the benefits of, or otherwise be subjected to discrimination, (3) that the (grantee, licensee,
 lessee, permittee, etc.) will use the premises in compliance with all other requirements imposed by or
 pursuant to the Acts and Regulations, as amended, set forth in this Assurance.
- 2. With respect to (licenses, leases, permits, etc.), in the event of breach of any of the above Non¬ discrimination covenants, the NCDOT will have the right to terminate the (license, permit, etc., as appropriate) and to enter or re-enter and repossess said land and the facilities thereon, and hold the same as if said (license, permit, etc., as appropriate) had never been made or issued. *
- 3. With respect to deeds, in the event of breach of any of the above Nondiscrimination covenants, the NCDOT will there upon revert to and vest in and become the absolute property of the NCDOT and its assigns. *

(*Reverter clause and related language to be used only when it is determined that such a clause is necessary to make clear the purpose of Title VI.)

3.6 INTERPRETATION OF TERMS AND PHRASES

This Invitation for Bids serves two functions: (1) to advise potential Vendors of the parameters of the solution being sought by the Department; and (2) to provide (together with other specified documents) the terms of the Contract resulting from this procurement. As such, all terms in the Invitation for Bids shall be enforceable as contract terms in accordance with the General Contract Terms and Conditions. The use of phrases such as "shall," "must," and "requirements" are intended to create enforceable contract conditions. In determining whether bids should be evaluated or rejected, the Department will take into consideration the degree to which Vendors have proposed or failed to propose solutions that will satisfy the Department's needs as described in the Invitation for Bids. Except as specifically stated in the Invitation for Bids, no one requirement shall automatically disqualify a Vendor from consideration. However, failure to comply with any single requirement may result in the Department exercising its discretion to reject a bid in its entirety.

4.0 **REQUIREMENTS**

This Section lists the requirements related to this IFB. By submitting a bid, the Vendor agrees to meet all stated requirements in this Section as well as any other specifications, requirements and terms and conditions stated in this IFB. If a Vendor is unclear about a requirement or specification or believes a change to a requirement would allow for the State to receive a better bid, the Vendor is urged and cautioned to submit these items in the form of a question during the Question and Answer period in accordance with Section 2.3.

4.1 CONTRACT TERM

The Contract shall have a term of three (3) years, beginning on the date indicated in the Contract award (the "Effective Date"). At any time during the Contract's term, the State shall have the option, in its sole discretion, to cancel the

Contract for any reason with ten (10) days written notice. In addition, the State reserves the right to extend a contract term for a period of up to 180 days in 90-day-or-less increments. This contract is a multi-year operations contract let pursuant to the provisions of N.C. General statute 136-28.1. In accordance with N.C. General Statute 136-28.1, an award in an operations contract shall not exceed \$5,000,000 per year. This contract is limited to \$5,000,000 per year. No payments in excess of this amount will be disbursed, in accordance with the Statute.

4.2 PRICING

Bid price shall be in whole U.S. dollars and shall constitute the total cost to State for each data item awarded, including all applicable charges for shipping, delivery, handling, administrative and other similar fees. Vendor shall not invoice for any amounts not specifically allowed for in this IFB. Complete ATTACHMENT A: PRICING FORM and include with Bid.

4.3 QUALITY ACCEPTANCE INSPECTION

Data will be reviewed for quality and Vendors will be evaluated on quality.

INVOICES WILL NOT BE PAID BY THE USING AGENCY UNTIL THE DATA HAS BEEN ACCEPTED.

4.4 WARRANTY

Vendor warrants that all data furnished under this IFB will be of good quality in accordance with industry standards. The warranty will be until the data is accepted by the Agency (or its designee) or for a period not to exceed thirty (30) calendar days from date the data is received by the Agency (or its designee), whichever comes first. Vendor also warrants that equipment and software used to collect and/or process data under this IFB is calibrated, tested, installed, and used in accordance with manufacturer's specifications. Such warranty shall cover the cost of data collection, data processing, equipment, software, labor, and travel at no additional cost to the State.

The report of a problem does not presuppose that every call must result in an "on-site" re-count. The Vendor and/or sub-contractor shall utilize best efforts to resolve problems in a timely fashion through the use of acceptable methods to include, but not limited to, verbal problem analysis and remote diagnosis of already collected/processed data. The warranty requirement does not impose any additional duty on the State to make other than normal and good faith problem resolution efforts or expenditures of time. Vendor is responsible for compliance with warranty terms by any third-party service provider.

4.5 INVOICES

The vendor shall provide invoices as follows:

- The Vendor shall submit one monthly invoice within fifteen (15) calendar days after the work was approved in the Sharepoint system. If the data submitted has not been accepted within 30 business days following submission of the data, contact the NCDOT Traffic Data Program Manager.
- Invoices must be submitted to the NCDOT Contract Lead on the Vendor's official letterhead stationery and must be identified by a unique invoice number.
- Invoices must bear the correct contract number and purchase order number to ensure prompt payment. The Vendor's failure to include the correct purchase order number may cause delay in payment.
- Invoices shall include individual request numbers, Highway Divisions, type(s) of traffic data collected, amounts based on the assignment (notice to proceed) date and shall state the billing cycle (beginning and ending dates), the total amount of fees due, and the original signature of the Vendor's project manager.
- Invoices shall also contain Vendor's billing address.

4.6 VENDORS

The term "Vendor" used in this IFB collectively means the prime contractor and any contract employees, subcontractors and/or independent contractors that may be used by the prime contractor. Any person or company doing work related to this IFB that was not awarded work under this IFB is considered a subcontractor when they are doing work for a Vendor that was awarded work under this IFB.

NCDOT does not differentiate between contract employees, subcontractors, and independent contractors and, therefore, considers all contract employees and independent contractors to be subcontractors under the various terms of this contract. As such, all contract employees, subcontractors, and independent contractors shall follow pre-established Departmental rules (such as being prequalified to do the work they are engaged in) and contractual requirements (such as meeting insurance coverage, being approved by the NCDOT prior to conducting any work, and adhering to all other contract provisions and conditions). In short, all contract employees, subcontractors, and independent contractors are required to meet all the same requirements as the prime contractor (Vendor).

All Vendors (including contract employees, subcontractors, and independent contractors) shall at all times:

- 1. Be prequalified for NCDOT Discipline Code 309 ("Traffic Data Collection").
- 2. Have an Experience Rate Modifier (ERM) of 1.30 or less or be ineligible for an ERM. Note that this only applies to Vendors required to have worker's compensation insurance (see below).
- 3. Have active registration with the North Carolina Department of the Secretary of State to do work in North Carolina if performing work related to this contract within North Carolina.
- 4. Have worker's compensation insurance in the type and amount listed in ATTACHMENT D, Item 16, if performing any work in North Carolina.
- 5. Have commercial general liability insurance in the type and amount listed in ATTACHMENT D, Item 16.
- 6. Have automobile insurance in the type and amount listed in ATTACHMENT D, Item 16, if performing any work in North Carolina.
- 7. Have their insurance(s) through a provider/providers authorized to operate in North Carolina as required by ATTACHMENT D, Item 16.
- 8. Provide updates to any of the above information within ten (10) business days following a written request (email, letter, etc.) to do so.

It shall be the responsibility any Vendor (prime contractor) awarded work under this IFB to ensure that any contract employees, subcontractors and/or independent contractors that may be used by the prime contractor meet the above requirements. It shall also be the responsibility any Vendor (prime contractor) awarded work under this IFB to notify NCDOT of their intent to utilize contract employees, subcontractors, and/or independent contractors, and receive written approval from NCDOT, prior to having them perform any work.

Updated insurance and ERM information should be provided as soon as possible following any renewals and/or coverage changes. No work shall be assigned without current insurance and ERM information being on file with NCDOT from all Vendors including contract employees, subcontractors, and independent contractors

<u>Under no circumstances shall a vendor awarded work under this IFB subcontract work to another vendor</u> <u>awarded work under this IFB.</u>

4.7 VENDOR RESPONSIBILITIES AND REQUIREMENTS

 All original calculations, field notes, drawings, videos, data files, and any other necessary project information prepared by Vendors (electronic and hard copy) shall be the property of the NCDOT and shall be turned over to the NCDOT upon completion of the work or when requested. The retention of traffic data records by Vendors shall conform to the Functional Schedule for North Carolina State Agencies (currently record number 10311 "Traffic Recorder Counts"), which may be reviewed at the following URL:

https://files.nc.gov/dncr-archives/documents/files/10 InfrastructureMgmt rev2020 final.pdf

- 2. Vendor shall be responsible for ensuring that submittals are accurate and in a format compatible with NCDOT analysis software or needs (current and future).
- 3. Vendor shall obtain approval prior to making any changes on original requests.
- 4. If requested to collect data when schools are in session, Vendor shall be responsible for contacting the appropriate schools (public, private, traditional, year-round, colleges, universities, day cares, etc.) to verify that the schools will actually be in regular session (not delayed openings, early release days, teacher workdays, track-out days, etc.). Vendor shall be responsible for requesting further instructions if school closure or other events affects requested deadlines. Vendor shall notify any affected schools of the date, time, and location of traffic data collection prior to conducting the actual work and explain what affects, if any, the data collection will have on traffic to and from the school. All correspondence shall be documented.
- 5. Vendor shall notify appropriate law enforcement agencies (Highway Patrol, Police, Sheriff, University, etc.) of the date, time, duration, and location of traffic data collection prior to conducting the actual work, preferably at least twenty-four (24) hours in advance.
- 6. Vendor shall be responsible for obtaining and securing all necessary permissions for the use of utility poles, public vehicular areas, right-of-way, etc., prior to collecting data. Vendor shall make this information available when requested.
- 7. Vendor personnel shall be equipped with cellular telephones or other communication devices to facilitate resolution of potential problems regarding the work.
- 8. Vendor personnel shall have identification (personal and company) at all times.
- 9. Any vehicles used on this project shall be equipped with markings identifying and prominently displaying the name of the Vendor. Any equipment installed in the field should also be marked with the name of the Vendor.
- 10. Vendors shall be responsible for the completeness, accuracy, presentation, and review of any work sublet to others.
- 11. Vendor shall be responsible for the safety of its personnel (counters, count equipment installers, etc.), any sub-Vendors (contract employees, subcontractors and/or independent contractors utilized by the prime), and the traveling public and shall adhere to all applicable state and federal occupational safety and health laws and regulations. Vendor shall also conform to <u>DOT Workplace Safety Manual</u> SOP and MUTCD standards for mobile operations (if applicable).
- 12. Vendor shall be responsible for ensuring its personnel adhere to applicable state and federal labor laws and regulations regarding work hours, breaks, etc. Vendor staff shall not take breaks at the end of the count period.

- 13. The size of all non-video electronic submittals (PDF, PPD, spreadsheets, etc.) should be no greater than six (6) megabytes (MB).
- 14. Submittals shall match a naming convention provided by NCDOT.
- 15. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.
- 16. Vendors shall be responsible for the presentation and explanation of their work (methods, equipment, standard practices, etc.) at any meetings, hearings, consultations, discussions, and field conferences as requested by the NCDOT.
- 17. Vendors shall be required to cooperate and coordinate fully with other Vendors, municipalities, local officials, etc., as directed by the NCDOT.
- 18. Any revisions to the collected data shall be provided to the NCDOT. If failure to do so results in incorrect designs in plans prepared by others, the Vendor shall be fully liable for all claims against the NCDOT including redesign costs, delay costs, and the cost of other corrective measures as determined to be necessary by the NCDOT.
- 19. If Vendor receives instructions or directions that are considered beyond the scope of work as outlined in the specifications, then no work shall be performed until the matter is resolved.
- 20. Vendor shall notify the NCDOT of significant changes within the Vendor (e.g., change of address, telephone number, project-related personnel changes, hiring or separation of project-related subcontractors or independent contractors, etc.).
- 21. Vendor shall maintain all books, documents, papers, records, and other information pertaining to work and costs incurred on this project and to make such materials available at its offices at all reasonable times during the contract period and for three (3) years from the date of final payment for inspection by the NCDOT or its designees.
- 22. Each request received by the Vendor from the NCDOT shall be considered a notice to proceed for that specifically requested work and location, and Vendor personnel shall keep a copy of the request with them at all times while collecting data. Requests will be provided through the online traffic data collection system, and locations will have GPS coordinates with six (6) decimals.
- 23. The Vendor shall verify that all equipment is used in accordance with manufacturer's specifications and is calibrated and working properly when installed.
- 24. If Vendor utilizes video or other technology that requires attachment to any poles, utilities, or other structures, they shall have prior approval from the structure owner and they shall be bonded, a licensed electrician, and have general liability insurance, and all work shall be in compliance with the NESC.
- 25. All work performed shall comply with federal, state and local statutes, ordinances, and codes.
- 26. All work performed shall comply with federal, state and local safety regulations and procedures.
- 27. Vendors shall complete all assignments, regardless of due date or submittal date, if they are assigned prior to the end of the contract.
- 28. Vendor shall be available for work on this project on and after the effective date provided in the Notice of Award.

- 29. Some weather conditions require the Vendor to contact the requestor to indicate that the Vendor will not proceed with the data collection and postpone to another eligible date. All such notifications shall be by email prior to sending any personnel to the target site.
- 30. Vendor personnel shall provide on request to law enforcement officers, school officials, citizens, etc., their names, the names and phone numbers of their supervisors, and the name and phone number of the NCDOT data collection program manager in order to facilitate independent verification of the validity of the work.
- 31. Vendor personnel shall not speculate, or provide opinions, on why the data is being collected, what it will be used for, or the potential results of any analysis.
- 32. Vendor shall ensure that any personnel (employee, contract employee, subcontractor, or independent contractor) working on this project is legally able to work on this project.
- 33. Vendor shall provide a current/updated list of employees, contract employees, subcontractors, and independent contractors within three (3) business days whenever requested by NCDOT.
- 34. Vendor shall verify the status (current or former) and standing (employee, contract employee, subcontractor, or independent contractor) of any names provided by NCDOT within two (2) business days whenever requested by NCDOT.
- 35. Vendor shall not extrapolate/interpolate data.
- 36. Vendor shall notify NCDOT within one (1) business day of any incident resulting in injuries or fatalities to any individual, or damage in any amount equal to or exceeding \$2,000 to any property, as a result of doing work on this project, shall submit a form approved by NCDOT specifying the details of the incident within five (5) business days of the incident, and shall fully cooperate with any subsequent questions or investigations related to the incident.
- 37. This project is for the collection of data. Unless otherwise specifically required or prohibited by NCDOT, the Vendor has wide latitude as to the number of personnel, methods, and/or number and types of equipment used to collect the data.
- 38. Vendor shall point out any discrepancies that may exist between route numbers, GPS coordinates, and/or street names in the field versus what NCDOT has provided on the request.
- 39. Vendor shall conform to specific measures for the quality control, validity, and acceptance of data as developed and distributed by NCDOT. However, data that appears to be suspect or has inconsistencies or imbalances that are unreasonable or cannot be explained may need to be re-tabulated or re-counted at no cost to NCDOT.
- 40. Vendor shall provide copies of equipment test and calibration logs upon request and within five (5) business days of the request.
- 41. Vendors are solely responsible for the damage to vehicles resulting from their equipment or the installation of the equipment, and any compensation thereof for repairs and/or replacement of said vehicles.
- 42. Vendors utilizing UAS (i.e. drones) shall follow appropriate FAA and State regulations.

4.8 AGENCY RESPONSIBILITIES

- 1. NCDOT shall provide written requests, which shall describe the location, duration, collection times, estimated AADT, and type each traffic data collection to be performed.
- 2. NCDOT shall provide a map of, or an internet link to, each location (and an approximate location for any equipment installation, if applicable).
- 3. NCDOT shall coordinate and submit all requests to the Vendor.
- 4. NCDOT shall periodically provide evaluations based on guidance from the Chief Engineers Office to each Vendor.
- 5. NCDOT, upon verification of completed work and processing of any Vendor invoice, shall make payment to the Vendor.
- 6. NCDOT shall extend due dates by a number of business days equal to the length of any postponements if a request is postponed due to predicted precipitation. All guidance on precipitation and postponements shall be by email.
- 7. NCDOT shall provide a naming convention for submittals.
- 8. NCDOT shall provide "Feature User" access to TEAAS and/or access to FTS to Vendors as requested.
- 9. NCDOT shall notify Vendors of any future changes in submittal formats and/or software needs as soon as practical along with detailed information of the changes and shall provide reasonable time frames for conformity.
- 10. NCDOT shall notify Vendors of any changes in specifications for quality control and acceptance of data as soon as practical and shall provide reasonable time frames for conformity.
- 11. NCDOT shall have the right to approve or reject any Vendor or subcontractor personnel for this project, with or without cause or reason.
- 12. NCDOT shall pay vendors a flat \$100 "recovery" fee for any requests that vendors have gone to a site but counts are unable to be completed due to an error by NCDOT (such as scheduled construction). Such fee is completely at the discretion of NCDOT and shall only be considered following verification from the vendor that staff actually traveled to the site and that the vendor notified NCDOT of the issue prior to collecting data.

4.9 OTHER ITEMS AND SPECIAL TERMS

- 1. Collection and processing of basic raw traffic data is technician level work and does not require certification under the purview of a licensed professional engineer nor requires the Vendor to be licensed or registered with the NCBELS.
- 2. Reasonable extensions to time frames or deadlines may be made by mutual consent by all involved parties for unforeseen or unavoidable delays, or interference with the usual or normal traffic pattern or flow of a location.
- 3. Traffic data collection generally requires a two-week turnaround. However, turnaround times for counts that are for a duration of forty-eight (48) hours or less at a single location may be reduced to as little as one week (expedited). Turnaround times for other counts such as for week-long (24/7) counts, mixed data counts, or batch/group counts (i.e. multiple count locations) may be extended to as much as one month or more. Deadlines shall be specified when a data collection request is made. Note that in some cases there may be an urgent need to collect data within a certain time period, but the submittal of the data may follow normal time frames. Specific days may also be requested.
- 4. All portions of a submittal (PDF, PPD, spreadsheets, video, etc.) must be received by close of business (5:00 p.m. eastern time) on the specified deadline date in order to get credit for an on-time submittal.
- 5. All submittal items (PDF, PPD, spreadsheets, etc.), and each page and/or file therein (if multiple pages and/or files) shall be labeled with the count number.
- 6. Requests may be on specific days, dates, and/or times (including weekends and holidays).
- Requests should be verified and approved by the requestor within 30 calendar days after submittal. Any
 request not approved by the requestor within 30 days will automatically be approved by the NCDOT
 Traffic Data Collection Request System.
- 8. Peak hours shall be defined as 7:00 a.m. to 9:00 a.m. (AM peak), 11:00 a.m. to 1:00 p.m. (lunch peak), and 4:00 p.m. to 6:00 p.m. (PM peak), unless otherwise specified. Data collectors should not take breaks during these hours.
- 9. Volume/speed/class data may be collected between 6:00 a.m. on Mondays and 6:00 p.m. on Fridays, unless otherwise specified. All other data shall be collected between 2:00 p.m. on Mondays and 2:00 p.m. on Fridays, unless otherwise specified.
- 10. Any award, if awarded, is not a guarantee of work. Assignment of any work is dependent on the needs of the agency. If and when work is assigned, it will be done based on the existing work load of the vendors and the amount of work to be assigned.
- 11. Any award pursuant to this IFB shall have an effective date as provided in the Notice of Award.
- 12. TEAAS features reports shall be considered the official record for the purposes of distances.
- 13. For non-motorist (bicycle and pedestrian) data collection, locations may be on road (i.e. streets and roads) or off road (i.e. sidewalks, greenways, etc.), and they may be paved or unpaved.
- 14. A junction with offset approaches shall be considered one location if the offset approaches are within one hundred fifty (150) feet of each other, at their nearest points, regardless of the type or amount of any traffic control devices.

- 15. Junctions are defined as those portions of a roadway that allow for more than one movement (through, left, right, and/or U-turn) regardless of mode type (motor vehicle, bicycle, pedestrian, etc.) or traffic control (sign, signal, roundabout, etc.).
- 16. Video submittals shall have a date and time stamp and shall be clear and useful (i.e. fully capture all vehicles entering, traveling through, turning, and/or stopping at a specific location, and shall not be blocked by truck tractors with trailers such as FHWA classes 8-13). Where necessary (such as collecting compliance data), video shall also capture traffic control devices (such as stop bars and signal indications) and shall have the capacity to capture the exact time (part of a second) when a signal indication changes or signals/flashers are activated/deactivated. At a minimum, video should be color at 24 frames per second, 352 x 240 pixels, 1.5 Mbps (VBR), and playable on Windows Media Player version 12.
- 17. No data shall be collected on holidays, during road/street closures, in work zones, etc., unless otherwise directed. Vendor shall verify with the requestor (and copy the NCDOT Contract Manager), or the NCDOT Contract Manager, whether or not to proceed with the work if any of these activities are present unless already indicated on the notice to proceed.
- 18. No data shall be collected during, or immediately following, extreme weather conditions that affect travel unless otherwise directed. Extreme weather conditions, for the purposes of this IFB, include any active or projected non-frozen precipitation of a long duration, active or projected frozen precipitation that is expected to affect travel (i.e. close schools, cover roads and sidewalks, etc.), temperatures below 30° Fahrenheit, temperatures above 100° Fahrenheit, or fog that is thick enough to hide approaches, traffic signal indications, or other items necessary for the data collection. No data shall be collected during, or immediately following, states of emergencies and/or evacuations (in North Carolina or affecting North Carolina) that would reasonably disrupt normal traffic flow at the requested site unless otherwise directed. The Vendor shall email the requestor, and copy the NCDOT Traffic Data Collection Program Manager, to ask for guidance on whether or not to proceed with the data collection or to postpone (prior to sending personnel to the site). Due dates shall be extended by a number of business days equal to the length of any postponements.
- 19. No data shall be collected in the immediate aftermath of a natural or other disaster if the disaster affects traffic flows in the area.
- 20. Intrusive data collection sensors (tubes, plates, loops, etc.) shall not be installed in the travel lanes of roadway segments with posted speed limits greater than fifty-five (55) miles per hour (MPH). Intrusive data collection sensors (tubes, plates, loops, etc.) shall not be installed in the travel lanes of high-volume roads (AADT > 25,000 VPD) between 6:00 a.m. and 8:00 p.m.
- 21. Statutory definitions shall apply unless an item is specifically defined otherwise within this IFB.
- 22. Unless otherwise specified herein, data collection methods and submittals should conform to the most recent edition of the FHWA <u>Traffic Monitoring Guide</u>.

5.0 SCOPE OF WORK

5.1 GENERAL SPECIFICATIONS

This IFB is for the collection and processing of traffic data. This data is used by a wide variety of business units in the NCDOT for project development, safety and mobility initiatives, planning, and forecasting.

The work in general shall consist of collecting site information and traffic data for each requested location to include vehicle turning movement, volume/speed/class, and other data types as indicated below. Most work shall have a two (2) week deadline, but some deadlines may be longer or shorter depending on the type of traffic data collected or the sensitivity of the specific request. Deliverables will generally consist of a summary of site information, a summary of weather conditions, maps, pictures, tabulated and summarized traffic data, and, in some cases, video.

Vendors submitting bids for one or more data types are expected to collect, process, and deliver the information as requested regardless of roadway geometrics or characteristics (horizontal or vertical curvature, skew, posted speed limit, number of lanes, etc.). Each Vendor, unless specifically stated otherwise, has wide latitude to use any resources and techniques that are acceptable by industry standards to fulfill the requirements herein.

5.2 SITE DATA

Vendor shall compile site data of each requested location (regardless of data collection type) to include, but not limited to, the following:

- Assignment number (count number, order number, station number, etc.), GPS coordinates (minimum of six decimals), count type, contractor's name and contact information (address, telephone numbers, etc.), subcontractor's name and role (data collection and/or data processing – only if a subcontractor was used), collection date(s), collection times, and break times (if appropriate).
- 2. Official weather conditions for the general area including maximum temperature (Fahrenheit), minimum temperature (Fahrenheit), precipitation (inches), snowfall (inches), average sky cover (0.0 1.0), and weather conditions (sunshine, rain, light rain, fog, haze, etc., or "no significant weather was observed") for each day counted. Local climate information recorded at NOAA shall be considered the official record for this information (https://w2.weather.gov/climate/).
- 3. Observed weather conditions for the site for each day counted (same categories as above), if on site during data collection.
- 4. Method of collection (manual, video, automated, blended, etc.) and tabulation (PETRAPro[®] analysis software, automated length based algorithm software, NCDOT Axle Based Classification tree, etc.) of the data. Manufacturer, model, and type of equipment used to collect the data (Jamar[®] TDC-12 electronic count board, TRAX[®] automatic data recorder, Wavetronix[®] Smart Sensor V, etc.). Also include the configuration of the sensors, if applicable.
- 5. General location type (intersection, corridor, multi-use path, driveway, crosswalk, roundabout, superstreet, railroad crossing, bridge, etc.).
- 6. Site sketch or aerial photograph of the location including the name of each development (stores, banks, fast food, etc.) in each quadrant, or on either side, of the location (if present). This shall also include a description of any landmarks, intersections, generalized land use, interchanges, and driveways adjacent to, and in close proximity with, the location, and the location(s) of observers (counters) and/or data collection equipment.
- 7. Statement of unique conditions (if applicable) of local land uses being served by particular classes of vehicles that may cause higher volumes for the classes (such as a quarry being served by dump trucks).

- 8. NCDOT division, county name, city name (if applicable), orientation of location, and directional north.
- 9. Identification of approaches by interstate (I), primary (US, NC), or secondary (SR) route number(s) and local street name(s).
- 10. For each approach, the number of lanes and lane movement designations (left, through, right, or combination).
- 11. For each approach, posted speed limits (if present), posted school zone speed limits and effective times (if present), and posted advisory speeds (if present).
- 12. For each approach, a statement as to whether or not the distance to the nearest roadway (non-driveway) stop sign is less than three hundred (300) feet.
- 13. For each approach, a statement as to whether or not the distance to the nearest traffic signal is less than three hundred (300) feet.
- 14. For each approach, a statement as to whether or not an at-grade railroad crossing is present within two hundred (200) feet (measured from the stop/yield line to the center of the track nearest to the intersection) and, if present, the measured distance.
- 15. Photographs of each approach of the location (facing the location AND facing upstream), any data collection equipment that has been installed (cameras, tubes, recorders, induction plates, radar, etc.), traffic control devices including signs, signals, and pavement markings (if not already pictured in the approach photographs), and all identification numbers that may be present (signal cabinets, railroad crossing numbers, etc.). Photographs should be current, on-site, and are to be taken under optimal ambient light conditions (generally during daylight). Pictures/photographs/images from third party entities (i.e. Google Maps, Google Earth, Bing, etc.) shall not be used. There should be no more than two (2) photographs per page when submitting deliverables, and time stamps should not interfere with viewing of the relevant items of the photographs (such as signal heads, signs, data collection equipment, etc.).
- 16. Presence of area lighting (if any).
- 17. Traffic control devices (such as traffic signals, pedestrian signals, flashers, stop signs, yield signs, railroad crossing gates, pavement markings, etc.), their locations, and their inventory numbers, if applicable (such as signal cabinets, railroad gate cabinets, etc.).
- 18. Presence of disabled pedestrians, including type of disability, and the approach they cross. If disabled pedestrians were not present, this should also be noted. This shall include disabled pedestrians within any crosswalks and/or crossing within approximately fifty (50) feet of the intersection proper.
- 19. Presence of highway construction activities that impact the normal flow or patterns of traffic (regardless of distance).
- 20. Description and time of occurrence of any disruption of normal traffic patterns occurring during data collection (such as crashes, short traffic signal phases, lack of signal progression, signal malfunction, downpours, heavy snow, etc.) and duration of disruption.
- 21. Statement that the equipment used for data collection was calibrated per manufacturer instructions (if applicable) and operating properly when used or installed.
- 22. Additional site data as required for the specific traffic data being collected as indicated in the following sections.

- 23. Date(s) and time(s) of any railroad activations (if railroad gates and/or flashers are present).
- 24. FRA land use categories defined as the predominant type of development in the vicinity (up to 1,000 feet) as follows:
 - a. Open space sparsely or undeveloped, lightly populated, or agricultural
 - b. Residential built up residential area
 - c. Commercial retail stores and businesses, office and personal services
 - d. Industrial manufacturing, construction, heavy products, factories, and warehouses
 - e. Institutional schools, churches, hospitals, parks, and other community facilities

5.3 TURNING MOVEMENT DATA – STANDARD SINGLE POINT JUNCTION

Standard single point junctions include, but are not limited to, single lane roundabouts, continuous flow intersections, and offset intersections (where the nearest points are <= 150 feet apart). Turning movement data is used to determine the number of motor vehicles, bicycles, and pedestrians making left, right, and through movements over a specified period of time and can be summarized as total volume by movement or separated out by type (classification). Data collected shall encompass all possible movements (through, left, and/or right; and U-turns if requested) regardless of any traffic control devices (stop/yield signs, signals, directional cross overs, islands, etc.) that may be present.

The Vendor shall collect and compile turning movement data as follows:

- 1. Use software consistent with NCDOT needs (primarily PETRAPro[®], but other common file types such as a spreadsheet may also be requested)
- 2. Collect in fifteen (15) minute increments. However, increments of one (1), five (5), thirty (30), and sixty (60) minutes may also be requested.
- 3. Collect for thirteen (13) hours (from 6:00 a.m. to 7:00 p.m., unless otherwise requested) standard duration. However, sixteen (16) hour counts (6:00 a.m. to 10:00 p.m., unless otherwise requested) may also be requested.
- 4. Collect from all approaches (including driveways or access connections that act as an approach).
- 5. Data shall be in southbound, westbound, northbound, and eastbound order.
- 6. U-turn movements on each approach may also be requested.
- 7. The presence of queuing (defined as more than 8-10 vehicles) on each approach may also be requested. If there is queuing on any movement at the end of a 15-minute count period, this queuing needs to be noted on the submittal form as a yes or no queue check box for each movement.
- 8. May include vehicle classifications (**OPTION ONLY not collected unless requested**).

Option A – NCDOT 4 Class Scheme (default option)

- PV (FHWA classes 1, 2, 3)
- DUALS (FHWA classes 4, 5, 6, 7)
- TTST (FHWA classes 8, 9, 10)
- TWINS (FHWA classes 11, 12, 13)

Option B – Traditional Classes

- Long combination vehicles (five or more axles, including trailers)
- Dump trucks and 3-axle/4-axle trucks
- HAZMAT vehicles (tanker trucks, etc.)
- Trucks (generalized vehicles with 3 or more axles)
- Emergency Vehicles (police, fire, EMS shall have lights and/or sirens activated)
- Mopeds/Scooters
- School buses
- Motorcycles
- Transit buses
- Truck tractors with twin trailers
- Truck tractors with 53' trailers
- 9. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, count data in requested increments, summaries and diagrams of total movements, AM peak hours, and PM peak hours. If classifications have been requested (option A or option B), then count data for each type of classification requested shall also be provided in requested increments, summaries and diagrams of total movements, AM peak hours, and PM peak hours of total movements, AM peak hours, and PM peak hours.
 - Raw turning movement data in an electronic format (currently, PPD) with column headers (left to right) labeled as, and data ordered as, southbound, westbound, northbound, and eastbound.
 If class was requested, then two electronic downloads are required one with the classes broken out and one with the classes combined.
 - c. If a video was requested. it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.4 MIXED DATA – STANDARD MULTI-POINT JUNCTION

Standard multi-point junctions include, but are not limited to, traditional interchanges, diverging diamond interchanges, single point urban interchanges, and junctions where slip lanes are >150' from a junction but the movements are still considered part of the junction. Turning movement data, volume speed class data, and/or volume data is used to determine the number of motor vehicles, bicycles, and pedestrians making left, right, and through movements over a specified period of time for each point within the junction influence area and can be summarized as total volume by movement or separated out by vehicle type (classification). Data collected shall encompass all possible movements (through, left, and/or right; and U-turns if requested) regardless of any traffic control devices (stop/yield signs, signals, directional cross overs, islands, etc.) that may be present. The Vendor shall collect, compile, and submit multi-point junction data as follows:

- 1. Turning movement data (if needed), standard duration see Section 5.3
- 2. Volume/Speed/Class data (if needed), standard duration see Section 5.6
- 3. Volume only data (if needed), standard duration see Section 5.20

5.5 MIXED DATA – COMPLEX JUNCTION (ORIGINATION/DESTINATION)

Complex junctions are locations with designs in which some traffic streams must traverse more than one point to complete their desired movements, where those points are too far apart to both be seen from a single viewpoint, and where standard traffic data collection methods by themselves will not provide a full picture of all turning

movements thereby necessitating some type of origin-destination study technique in addition to standard data collection techniques. Data for complex junctions is used to determine the number of motor vehicles, bicycles, and pedestrians making left, right, and/or through movements over a larger and/or more complex area than a standard single point or multi-point junction for a specified period of time and can be summarized as total volume by movement and separated out by type (classification). Data collection shall encompass all possible movements (through, left, and/or right; and U-turns if requested) regardless of any traffic control devices (stop/yield signs, signals, directional cross overs, islands, etc.) that may be present.

Complex junctions include, but are not limited to: synchronized streets (superstreets), quadrant lefts, multiple lane roundabouts, and traffic circles, which usually include multiple standard single point junctions, cross-overs, mainline corridors, median U-turn intersections, quadrant roadway intersections, one-way pair intersections, split diamond interchanges, and interchanges in which the ramps intermingle with frontage roads. The Vendor shall collect and compile complex junction data for each part of a complex junction (individual intersections, U-turn locations, redirected movements, cross overs, mainline corridors, etc.), and the entire complex junction as a whole, as follows:

- 1. Turning movement data (if needed), standard duration see Section 5.3
- 2. Volume/Speed/Class data (if needed), standard duration see Section 5.6
- 3. Volume only data (if needed), standard duration see Section 5.20
- 4. Supply collected data, as follows:
 - a. Data collection reports for each part of the complex junction in one PDF document consisting of a cover sheet with site data, photographs, count data in requested increments, summaries and diagrams of total movements, AM peak hours, and PM peak hours. If classifications have been requested (option A or option B), then count data for each type of classification requested shall also be provided in requested increments, summaries and diagrams of total movements, AM peak hours, and PM peak hours.
 - b. Data collection summary of the complex junction as a whole (overall origination/destination) in one PDF document consisting of a cover sheet with site data, photographs, count data in requested increments, summaries and diagrams of total movements, AM peak hours, and PM peak hours. If classifications have been requested (option A or option B), then count data for each type of classification requested shall also be provided in requested increments, summaries and diagrams of total movements, AM peak hours.
 - c. Raw turning movement data in an electronic format (currently, PPD or spreadsheet depending on the type of data collected).
 - If a video was requested, it will be uploaded to the link called "Vendor Video Upload" located on the NCDOT Traffic Data Collection Request System.
- 5. There are examples provided on the website which is open to all agencies for this type of data collection. <u>https://connect.ncdot.gov/resources/safety/TrafficDataResources/Examples%20of%20Mixed%20Data%20Complex%20Junction.pdf</u>

5.6 VOLUME/SPEED/CLASS DATA – SINGLE LOCATION

Volume/speed/class data is generally collected to determine the number, direction, speed, and classification of motor vehicles, bicycles, and pedestrians at a given location. Vendor may submit bids for two (2) lane locations (defined as two through lanes that may or may not include a two-way center turn lane) and/or multi-lane locations

(more than two through lanes, with or without median/barrier). The Vendor shall collect and compile volume/speed/class data as follows:

- Collect for forty-eight (48) continuous hours (standard duration). However, one hundred sixty-eight (168) continuous hour counts (7 days) may also be requested. If multiple counters are used, they shall collect data concurrently with each other.
- 2. Data collection equipment shall not be installed in any work zones, unless specifically requested.
- 3. Data shall be collected where traffic flow is steady, preferably at least one thousand (1,000) feet from any road or ramp junction. On shorter length segments, counters should be installed mid-block away from higher volume driveways and, if necessary, counters may be staggered by direction to avoid queuing traffic from traffic signals.
- Collect by lane and direction (or just by direction if a low volume road and no lane delineation) in one
 (1) hour increments. However, fifteen (15) minute increments may also be requested.
- The default bins for speed data shall be 0-14.99, 15-19.99, 20-24.99, 25-29.99, 30-34.99, 35-39.99, 40-44.99, 45-49.99, 50-54.99, 55-59.99, 60-64.99, 65-69.99, 70-74.99, and 75+ (unless otherwise directed).
- 6. Raw speed data may be provided (if requested) in a three (3) column spreadsheet with the columns (from left to right) being as follows: "Vehicle Count", "Time Stamp", and "MPH". The "Vehicle Count" column shall be in whole numbers, the "Time Stamp" column shall be in hours, minutes, and seconds using a 24-hour clock (i.e. "13:05:31"), and the "MPH" column shall be in whole numbers.
- 7. If count equipment capable of detecting axles is used (two axle sensors per lane) then the default bins for class data shall be the <u>FHWA Thirteen (13) Class Scheme</u>, plus one bin for "Undefined", and the FHWA classes shall be determined using the <u>NCDOT Axle Based Classification Tree</u>.
- 8. If count equipment capable of detecting <u>motor</u> vehicle length is used (radar, etc.) then the bins for class data shall be the <u>NCDOT 4 Class Scheme</u> using the following process. When counting pedestrian and bicycle data specify the appropriate bin that will need to be used:
 - a. Specify the Length Bins (recommended initial bins are indicated below, but shall be adjusted based on the vehicle mix for the location and the data collection equipment calibrated accordingly actual length bins used shall be indicated on data collection reports):

Rural LocationPassenger Vehicles: 0' to <= 21.5'</td>Duals: > 21.5' to <= 49.0'</td>TTST: > 49.0' to <= 83.0'</td>Twins: > 83.0'Urban LocationDuals: > 20.01

Passenger Vehicles: 0' to <= 20.0' Duals: > 20.0' to <= 43.0' TTST: > 43.0' to <= 83.0' Twins: > 83.0'

- b. Allow the sensor to auto-calibrate
- c. Validate the sensor is classifying properly
- d. Adjust the sensor settings and/or length bins if necessary and revalidate

- 9. The percent (%) "Undefined" should not exceed 15% for any hour for any individual lane, 10% for any hour of the total volume, or 5% for either twenty-four (24) hour period of the total volume for either axle-based or length-based methods.
- 10. If count equipment that directly classifies motor vehicles (by axle or length) cannot be used, then a mix of equipment and direct observation may be performed. In these cases, the following shall apply:
 - a. The number of vehicles shall be collected for the entire collection cycle in fifteen (15) minute increments.
 - b. Classification shall be collected by direct observation (manually) for Duals, TTST, and TTDT.
 - c. Classification shall be collected for fourteen (14) hours (6:00 a.m. through 8:00 p.m., unless otherwise specified).
 - d. Classification shall be collected in fifteen (15) minute increments.
 - e. Classification shall follow the <u>NCDOT 4 Class Scheme</u>. <u>https://www.fhwa.dot.gov/policyinformation/tmguide/tmg_fhwa_pl_13_015.pdf</u>
- 11. If methods other than the above (axle based, length based, mixed, visual, etc.) are utilized, they must be clearly explained and detailed.
- 12. Supply collected data, as defined above, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, count data (volume, speed, and class) by lane and direction in 1-hour increments (or 15-minute increments, if specified or requested) with daily totals, summaries, percentages, and AM/PM peak hours, and peak directional (D) percentage. Speed data shall also include, by direction, the median, mean, pace, high, low, 85th percentile, and percent of vehicles above the posted speed limit by vehicles. The count number shall be indicated on each page of the document. Also, clearly indicate what method(s) and equipment were utilized to collect and process the data (i.e. axle based, length based, mixed, other detailed).
 - b. Raw volume data in an electronic format using a spreadsheet provided by the NCDOT (this spreadsheet may be adjusted as needed for roads with more than two lanes).
 - c. If non-intrusive equipment (electronic count boards, side fire radar, etc.) is used (i.e. mixed manual)
 then the export files from the equipment should also be included (PPD, etc.).
 - d. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.7 VOLUME/SPEED/CLASS DATA – RAIL DIVISION GROUPS

Volume/speed/class data is generally collected to determine the number, direction, speed, and classification of motor vehicles at a given location. Also, data for at-grade railroad crossing is required by the Rail Division as part of its Investigative Index (II) produced every April and for the FRA crossing inventory. The Vendor shall collect and compile volume/speed/class data as follows:

- 1. Collect for forty-eight (48) continuous hours.
- 2. Data collection equipment shall not be installed in any work zones, unless specifically requested.
- 3. Data shall be collected where traffic flow is steady, preferably at least one thousand (1,000) feet from any road or ramp junction. On shorter length segments, counters should be installed mid-block away from higher volume driveways and, if necessary, counters may be staggered by direction to avoid queuing traffic from traffic signals. When tubes are put in place ensure that there is no other road intersection or major driveways in between the tube and the railroad crossing. If the placement of the tube is not safe or feasible, the vendor shall email the requestor, and copy the NCDOT Traffic Data Collection Program Manager, to ask for guidance on how to proceed with the data collection location.
- 4. Collect by direction in one (1) hour increments. However, fifteen (15) minute increments may also be requested.
- 5. Locations will be assigned individually for non-railroad crossing locations. Locations involving railroad crossings will be assigned in groups of no more than twenty-five (25) crossings, all within the same Highway Division and, where possible, within general proximity to each other.
- 6. For groups of counts being conducted for the Rail Division, if normal traffic flow is affected by construction at one or more locations, or the location is on a gravel road or within an intersection/junction, then the contractor shall contact the requestor. Submittal due dates shall be extended a minimum of two business days for each affected location.
- 7. Data shall be collected throughout the year. However, locations involving at-grade railroad crossings shall only have data collected during the months of January through May and September through November.
- The default bins for speed data shall be 0-14.99, 15-19.99, 20-24.99, 25-29.99, 30-34.99, 35-39.99, 40-44.99, 45-49.99, 50-54.99, 55-59.99, 60-64.99, 65-69.99, 70-74.99, and 75+ (unless otherwise directed).
- 9. Raw speed data may be provided (if requested) in a three (3) column spreadsheet with the columns (from left to right) being as follows: "Vehicle Count", "Time Stamp", and "MPH". The "Vehicle Count" column shall be in whole numbers, the "Time Stamp" column shall be in hours, minutes, and seconds using a 24-hour clock (i.e. "13:05:31"), and the "MPH" column shall be in whole numbers.
- The default bins for class data shall be the <u>FHWA Thirteen (13) Class Scheme</u> plus one bin for "Undefined". If count equipment capable of detecting axles is used (two axle sensors per lane) then the FHWA classes shall be determined using the <u>NCDOT Axle Based Classification Tree</u>.
- 11. The percent (%) "Undefined" should not exceed 10% for any hour of the total volume or 5% for either twenty-four (24) hour period of the total volume.
- 12. Data collected for groups of at-grade railroad crossings shall be due within thirty (30) calendar days of the assignment.
- 13. Supply collected data, as defined above, as follows:

- a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, FRA land use categories (if the location is at a railroad crossing), count data (volume, speed, and class) by direction in 1-hour increments (or 15-minute increments, if requested) with daily totals, summaries, classification and other percentages, truck percentages, and AM/PM peak hours. Speed data shall also include, by direction, the median, mean, pace, high, low, 85th percentile, and percent of vehicles above the posted speed limit by vehicles. The count number and crossing number shall be indicated on each page of the document.
- b. Raw volume data in an electronic format using a spreadsheet provided by the NCDOT.
- c. For requests with groups of locations at railroad crossings, a summary spreadsheet (provided by the NCDOT) named "YY-MM-DIV-##" (where YY is the two-digit year, MM is the two-digit month, and ## is the two-digit division number, using leading zeros where appropriate).
- d. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.8 SPOT SPEED (FREE FLOW SPEED) DATA

Spot speed data is generally collected to determine the free flow speed of motor vehicles (usually single vehicles or platoon-leading vehicles) at a particular location. The Vendor shall collect and compile spot speed data as follows:

- 1. Collect free flow speeds from isolated vehicles or the lead vehicle of platoons.
- 2. No data shall be collected if any lane closures or active construction/maintenance work is located within two (2) miles of the target site, unless otherwise requested or the work zone is the target site.
- 3. Equipment, personnel, and/or vehicles shall be as inconspicuous as possible.
- 4. Collect for four (4) continuous hours (approximately 2 hours per direction), or a minimum specified number of cars and trucks per direction, whichever comes first (begin and end times to be provided by requestor). However, twenty-four (24) continuous hours may also be requested.
- 5. LIDAR shall be used to collect speeds for the four (4) continuous hours. However, other equipment and/or methods may be used to collect free flow speeds for the twenty-four (24) continuous hour option.
- 6. Collection by lane may also be requested (**OPTION ONLY not collected unless requested**).
- 7. Vehicle speeds may be broken out for long combination vehicles (truck tractors with trailers, FHWA classifications 8-13) if requested (**OPTION ONLY not collected unless requested**).
- 8. Supply collected data, as defined above, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, and the median, mean, pace, high, low, 50th percentile speed, 85th percentile speed, and percent of vehicles above the speed limit by vehicles in each direction (additional tabulations for long combination vehicles, if requested).
 - b. Raw speed data showing individual data points in an electronic format (Excel spreadsheet).
 - c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.9 DELAY DATA

Delay data is collected to determine the time, in seconds, that vehicles have to wait at a location, usually a stop controlled or signalized junction. This data is typically collected for the approach with the highest estimated volume during the critical peak hours to obtain delay characteristics while traffic is operating under the heaviest conditions. The Vendor shall collect and compile delay data as follows:

- 1. Collect in fifteen (15) second intervals.
- 2. Collect for two (2) continuous hours (begin and end times and approach to be provided by requestor).
- 3. Additional approaches may be requested (**OPTION ONLY not collected unless requested and additional approach/approaches are specified by requestor**).
- 4. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, and delay data in 15-second intervals.
 - b. For un-signalized locations, the data collection reports should also include a statistical summary for all the data (for each approach counted) to include total vehicle count, delayed vehicle count, average stopped time, maximum stopped time, minimum seconds for delay, average queue, queue density, and maximum queue.
 - c. For signalized locations, the data collection reports should also include a statistical summary for all the data (for each approach counted) to include total vehicle count (approach total), delayed vehicle count (stopped volume), total delay, average delay per stopped vehicle, average delay for all vehicles, and the percent of vehicles stopped.
 - d. Raw delay data showing individual data points in an electronic format (PPD file if an electronic count board is used, or Excel spreadsheet if another method is used).
 - e. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.10 GAP DATA

Gap data includes the time and/or distance between motor vehicles passing a particular point on a roadway. Gap data is usually collected for the critical peak period. The Vendor shall collect and compile gap data as follows:

- 1. No gap data shall be collected if any lane closures or active construction/maintenance work is located within two (2) miles of the target site, unless the work zone is the target site.
- 2. Collect for all lanes in each direction.
- 3. Collect in intervals of fifteen (15) minutes.
- 4. Summarize in bins of two (2) seconds to thirty-plus (30+) seconds (in 2 second increments).
- 5. Collect for two (2) continuous hours (begin and end times to be provided by requestor). However, special event systems may need a sixteen (16) hour gap study, begin and end times to be provided by requestor (**OPTION ONLY not collected unless requested**).
- 6. Supply collected data, as follows:
- a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, gap data in 15-minute increments, volume, and a peak hour analysis to include the peak hour, the peak time, and the PHF.
- b. Raw gap data showing individual data points in an electronic format (PPD file if an electronic count board is used, or Excel spreadsheet if another method is used).
- c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.11 SATURATION FLOW RATE DATA

Saturation flow rate data is collected at a signalized junction by phase showing the number of vehicles, with respect to time, allowed to travel through the location during one cycle. Saturation flow rate data is usually collected for the critical peak period on the approach with the highest estimated volume. The Vendor shall collect and compile saturation flow rate data as follows:

- 1. No saturation flow rate data shall be collected if any lane closures or active construction/maintenance work is located within two (2) miles of the target site, unless the work zone is the target site.
- 2. Collect for two (2) continuous hours (begin and end times to be provided by requestor).
- 3. Additional approaches may be requested (**OPTION ONLY not collected unless requested and additional approach/approaches are specified by requestor**).
- 4. Collect for all through lanes on each approach counted, up to a maximum of four (4) total lanes. If there are less than four (4) through lanes, then saturation flow rate data may be collected for left turn lanes and/or right turn lanes (**OPTION ONLY not collected unless requested and only if there are fewer than four through lanes**) for a maximum of four (4) total lanes per approach.
- 5. Include phase changes and/or approach volumes (queue totals during red phase).
- 6. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, saturation flow data, phase, timing, and a summary (for each approach counted) to include the volume that arrived on red, the volume that arrived on green, the lost time, and the saturation flow rate.
 - b. Raw saturation flow data showing individual data points in an electronic format (PPD file if an electronic count board is used, or Excel spreadsheet if another method is used).
 - c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.12 TRAVEL TIME DATA

Travel time data is the amount of time required for motor vehicles, bicycles, and pedestrians to travel from one particular location (terminal) to another, and studies are typically performed during peak volume hours to obtain travel characteristics while traffic is operating under loaded conditions. Travel time data is usually collected at specific locations along the route. The Vendor shall collect and compile travel time data as follows:

- 1. No travel time data shall be collected if any lane closures or active construction/maintenance work is located within two (2) miles of the target site, unless the work zone is the target site.
- 2. Collected for two (2) continuous hours (begin and end times to be provided by requestor). However, durations of forty-eight (48) hours and one hundred sixty-eight (168) hours may also be requested.
- 3. Data and field notes shall include the description and locations of terminals and intermediary nodes.
- 4. Sources of delay shall be recorded and classified as follows: signal, congestion, stop sign, pedestrian, and up to four others (to be defined by the requestor).
- 5. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, count data by run and direction, field notes (including terminal descriptions and intermediary nodes), and delay source summaries (if applicable).
 - b. Raw travel time data showing individual data points in an electronic format (PPD file if an electronic count board is used, or Excel spreadsheet if another method is used).
 - c. If a video was requested, it will be uploaded to the link called "Vendor Video Upload" located on the

NCDOT Traffic Data Collection Request System.

5.13 SCHOOL OPERATIONS DATA

School operations data is collected in order to understand how school related traffic affects the adjacent roadways. A site at or near the school campus property is the point of collection. (A site is not the entire school campus.) The term "site" for this specific data includes, but is not limited to, driveways, roadway intersection, or segments of roads between intersections and/or driveways. Data is only collected on an average school day, which is usually only on a Tuesday, Wednesday, or Thursday, but does not include the first two weeks of school (all schools), the last two weeks of elementary and middle schools, the last four weeks of high schools, and the week before holidays. Vendors shall provide a per site bid amount. The Vendor shall collect and compile data as follows:

- 1. Collect for twelve (12) hours (6:00 a.m. through 6:00 p.m., unless otherwise specified). Note that this may or may not include before school and/or after school programs or activities as instructed by the requestor. Vendor shall coordinate with the requestor on the actual dates of data collection.
- 2. Collect for the entrance(s) specified by the requestor.
- 3. Collect turning movement data (see Section 5.3) for motor vehicles in five (5) minute increments. All vehicles dropping off/picking up children in through lanes shall be noted with a time stamp and direction of travel as should have been turning left, or turning right, even though they may have been counted as through movements.

- 4. Collect turning movement data (see Section 5.3) for bicycles in five (5) minute increments regardless of what facility they are on (road, sidewalk, mixed use path, etc.).
- 5. Collect turning movement data (see Section 5.3) for pedestrians in five (5) minute increments regardless of what facility they are on (road, sidewalk, mixed use path, etc.).
- 6. Collect queue length data (distance in feet) along all approaches in 30 second increments (only collect this when traffic is actually queued onto the approaches.). Queue length may be collected by directly measuring distance or by number of vehicles converted to length (assuming 22' per vehicle). If TTST or TTDT vehicles are in the queue just note their time but do not adjust their length (they still count as one vehicle).
- 7. Collect the number of students using city/regional public transportation (not a school bus) to/from a bus stop located near or adjacent to the school (collect the time of each bus arrival and how many students ride each bus, etc.).
- 8. Collect the number of students being walked to school by a parent or guardian (collect the time of each arrival and how many students were escorted).
- 9. Supply collected data, for each requested entrance, as follows:
 - a. Turning movement data in five (5) minute increments (see Section 5.3 for details).
 - b. Queue data in both tabulated and graphical (length versus time) format (spreadsheet).
 - c. A visual (map, aerial photograph, etc.) indicating how far each queue extended.
 - d. If a video was requested, it will be uploaded to the link called "Vendor Video Upload" located on

the

NCDOT Traffic Data Collection Request System.

5.14 PEDESTRIAN CORRIDOR DATA

Pedestrian corridor data is generally intended to capture any pedestrian activity in the analysis zone. This would include crossing movements, as well as movements parallel to the roadway facility. The Vendor shall collect and compile pedestrian corridor data as follows:

- 1. No data shall be collected if any lane closures or active construction/maintenance work is located at, or within two (2) miles of, the target site (unless the work zone is the target site).
- 2. No data shall be collected during rain or snow weather events, or immediately following rain/snow weather events where the aftermath of those weather events affects non-motorist travel (flooding, snow/ice on the roadways or sidewalks, etc.).
- 3. Collect for thirteen (13) hours (6:00 a.m. through 7:00 p.m., unless otherwise specified). However, twenty-four (24) or forty-eight (48) continuous hours may also be requested.
- 4. Collected in fifteen (15) minute increments. Increments of five (5) minutes may also be requested.
- 5. Collected in zones up to approximately three hundred fifty (350) feet in length along the corridor. Multiple zones may be necessary for each corridor. Only one request needs to be submitted if along the same corridor. For example, if the length is 5250 feet it will be divided by each 350 feet for payment purposes. This would equate to 15 counts.

- 6. Data and field notes shall include a map or maps of the pedestrian corridor sites and their volume and the times crossed as well as the movements parallel to the roadway.
- 7. Data Collected shall include the direction of pedestrian travel of each zone.
- 8. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, map(s) indicating crossing sites, crossing data/volume as well as pedestrian movements parallel to the roadway.
 - b. Raw data in an electronic format (Excel spreadsheet).
 - c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.15 COMPLIANCE DATA

Compliance data is the tabulation of unit (motor vehicle, bicycle, and pedestrian) actions grouped by compliance/non-compliance with statutes, ordinances, traffic control devices (signals, signs, and pavement markings), etc. This data is usually site specific, such as at an intersection/junction or crosswalk, and is usually specific to evaluating one statute, device, etc. However, in some cases this may cover a section of road such as merge and weaving areas. The Vendor shall collect and compile compliance data as follows:

- 1. No data shall be collected if traffic control devices (including push buttons or other activation devices) are hidden or not visible (such as due to fog, light conditions, etc.), inoperable, malfunctioning (such as a traffic signal in flash mode or is dark), or damaged to the point of being unreadable or unrecognizable (i.e. a stop sign has been knocked down, etc.). However, if the condition is temporary then indicate the start and end time of the condition but count for the rest of the time.
- 2. When the collection of compliance data involves pedestrians and bicyclists, it shall not be collected during rain or snow weather events, or immediately following rain/snow weather events where the aftermath of those weather events affects non-motorist travel (flooding, snow/ice on the roadways or sidewalks, etc.).
- 3. Collect for thirteen (13) hours (6:00 a.m. through 7:00 p.m., unless otherwise specified). However, twenty-four (24), forty-eight (48), or one hundred sixty-eight (168) continuous hours may also be requested.
- 4. Collected in fifteen (15) minute increments
- 5. Compliance/non-compliance data shall be collected by direction and lane for each of the following modes: motor vehicles, bicycles, and pedestrians.
- 6. If a pedestrian push button (or other activation device) is present, then collected data shall include whether or not the equipment was engaged/put into use prior to crossing AND whether or not the pedestrian waited for activation prior to crossing.
- 7. Additional detailed guidance for data (explanations, definitions, spreadsheet, flow chart, examples, etc.) shall be provided by the requestor.
- 8. Video should clearly show all compliance events and the operations of any traffic control devices.

- 9. Contact the requestor for clarification on any data items and/or their definitions for the specific compliance issue being counted.
- 10. Compliance data may be requested occasionally by the NCDOT Rail Division for grade crossings. Such data collected shall include the number of train activations by active warning devices, the number of train movements at the grade crossing, the number of vehicles advancing beyond stop bar while railroad signals are activated, the number of vehicles driving around activated gates/flashers, and the compliance of motorists at adjacent junctions where railroad preemption is installed.
- 11. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, compliance/noncompliance data by unit (with time stamps that correspond to the video data), direction, and lane/approach.
 - b. Raw data in an electronic format (Excel spreadsheet).
 - c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.16 VOLUME/CLASS DATA – NON-MOTORISTS

Volume/classification data is generally collected to determine the number, direction, and type (classification) of non-motorized transportation system users (pedestrians and bicyclists) at a given location. Locations may be on road (i.e. streets and roads) or off road (i.e. sidewalks, greenways, etc.), and they may be paved or unpaved.

The Vendor shall collect and compile data as follows:

- 1. Collect for twenty-four (24) hours per day for seven (7) consecutive days (one week).
- 2. Collect by direction in fifteen (15) minute increments.
- 3. Data collection equipment shall not be installed in any work zones, unless specifically requested.
- 4. Data collection methods and/or equipment shall identify all bicycles regardless of material (carbonfiber, aluminum, steel, titanium, etc.).
- 5. If data is to be collected near an road or ramp junction, it should be collected at least one thousand (1,000) feet from the road or ramp junction.
- 6. The default bins for classification data shall (1) bicyclists and (2) pedestrians.
- 7. Collect additional site information as follows:
 - a. Grades, median or buffer divisions, on-street parking, sidewalk buffer width (if applicable), presence of sidewalk or pathway, presence of bicycle marking or lane, approximate width of offroad path or multi-use trail, and other geometrics for each approach, if appropriate. This information may be separate or included within the cross section required below.
 - b. A cross section sketch of the corridor or multi-use path including, but not limited to, the width of vehicular travel lanes, bicycle lanes, parking, shoulders, medians, buffers, sidewalks, greenways, and/or trails within the study area.

- c. Presence, type (parallel, diagonal, etc.), and duration (two-hour limit, no time limit, etc.) of any on-street parking.
- d. Presence, width, and type of any shoulder rumble strips/stripes. If present, include the length/width of a typical rumble, distance from edge line, and any gaps (and length of typical gap).
- 8. Data collected for individual location assignments shall be due within thirty (30) calendar days.
- 9. All raw data must be provided consistent with the most current edition of the FHWA TMG.
- 10. Supply collected data as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, count data (volume and classification) by direction in 15-minute increments) with daily totals, summaries, and percentages. The crossing number (if the location is at a railroad crossing) shall be indicated on each page of the document.
 - b. Raw volume data in an electronic format using an Excel spreadsheet formatted as requested by NCDOT (following TMG format conventions).
 - c. If a video was requested, it will be uploaded to the link called "Vendor Video Upload" located on the NCDOT Traffic Data Collection Request System.

5.17 VEHICLE OCCUPANCY DATA

Vehicle occupancy data is generally collected to determine the number of operators and passengers using motor vehicles. The Vendor shall collect and compile data as follows:

- 1. No data shall be collected if any lane closures or active construction/maintenance work is located at, or within two (2) miles of, the target site (unless the work zone is the target site).
- 2. Collect for thirteen (13) hours (6:00 a.m. through 7:00 p.m., unless otherwise specified).
- 3. Collected in fifteen (15) minute increments.
- 4. The default bins for occupancy data shall be (1) vehicles with only the operator, (2) vehicles with an operator and one passenger (HOV2), and (3) vehicles with an operator and more than one passenger (HOV3).
- 5. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, map(s), and data/volume.
 - b. Raw data in an electronic format (Excel spreadsheet is preferred).
 - c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.18 VIDEO (GROUND or AERIAL)

Video does not have traffic data processing or tabulation associated with it but is rather the collection of movements and interactions at a fixed location. The Vendor shall collect video as follows:

- 1. Collect for twelve (12) hours, twenty-four (24) hours, forty-eight (48) hours, or one hundred sixty-eight (168) hours.
- 2. Supply collected data, as follows:
 - a. If a video was requested, it will be uploaded to the link called "Vendor Video Upload" located on

the

NCDOT Traffic Data Collection Request System.

5.19 QUEUE DATA

Queue data is generally a measure of demand exceeding capacity, and is usually measured by the number of motor vehicles, or distance, from a specific point along an approach (provided by the requestor) typically performed during peak volume hours. The Vendor shall collect and compile queue data as follows:

- 1. Collect for two (2) continuous hours (specific location and begin/end times to be provided by requestor).
- 2. Collect in one (1) minute increments.
- 3. Collect distance in feet.
- 4. Additional approaches may be requested (**OPTION ONLY not collected unless requested and additional approach/approaches are specified by requestor.**
- 5. Additional detailed guidance for data (explanations, definitions, spreadsheet, flow chart, examples, etc.) shall be provided by the requestor as needed.
- 6. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, queue data by approach (if multiple approaches were requested).
 - b. Raw data in an electronic format (Excel spreadsheet).
 - c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.20 VOLUME ONLY DATA (MOTOR VEHICLES) – SINGLE LOCATION

Volume data is generally collected to determine the number and direction of motor vehicles at a given location. The Vendor shall collect and compile volume data as follows:

- Collect for forty-eight (48) continuous hours (standard duration). However, one hundred twenty (120) continuous hour counts (5 days) or one hundred sixty-eight (168) continuous hour counts (7 days) may also be requested. If multiple counters are used, they shall collect data concurrently with each other.
- 2. Data collection equipment shall not be installed in any work zones, unless specifically requested.

- 3. Data shall be collected where traffic flow is steady, preferably at least one thousand (1,000) feet from any road or ramp junction. On shorter length segments, counters should be installed mid-block away from higher volume driveways and, if necessary, counters may be staggered by direction to avoid queuing traffic from traffic signals.
- 4. Collect by direction in one (1) hour increments. However, fifteen (15) minute increments may also be requested.
- 5. Volume counts collected using equipment with axle-based sensing technology shall be reported in axle pairs (2 axle detections = 1 count). Counts collected with equipment using vehicle-based sensing technology shall be reported as collected.
- 6. Supply collected data, as defined above, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, count data (volume) by direction in 1-hour increments (or 15-minute increments, if requested) with daily totals and AM/PM peak hours. The count number shall be indicated on each page of the document.
 - b. Raw volume data in an electronic format using a spreadsheet provided by the NCDOT.
 - c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.21 VOLUME ONLY DATA (MOTOR VEHICLES) – SEASONAL STUDY GROUP

Volume data is generally collected to determine the number and direction of motor vehicles at a given location. Seasonal counts are a series of volume counts collected at a location used to identify the general level of variation in travel experienced during the year. This involves collecting a volume count at the same location on typical travel days during each of the four seasons defined by the NCDOT. The Seasonal Study Group is a set of count locations used to sample the seasonal travel patterns on corridors within a study area. Seasonal counts are collected at each study group location to identify the character of seasonal travel in an area. The requirements for the Seasonal Study Group are:

- 1. Studies will be assigned in groups of no more than fifty (50) locations, all within the same county and, where possible, within general proximity to each other. Studies will generally have a minimum of twenty-five (25) locations.
- 2. A study group may be assigned to a vendor at any time during the year and will require collection of counts in the next four (4) consecutive seasons from the date assigned (unless a location and/or study are discontinued see specifications, below). For example, a group with fifty (50) locations may require two hundred (200) volume counts.
- 3. DOT seasons are defined as winter (December February), spring (March May), summer (June August), and fall (September November).
- 4. Vendor shall be responsible for scheduling data collection at each location of an assigned group as follows:
 - a. All locations within a study group shall be counted within a four (4) week time period within the season being counted.

- b. There shall be a minimum of sixty (60) days between the end of counts collected in one season and the start of counts collected in the subsequent season, unless otherwise directed by the requestor (see Item 12a, below).
- c. Counts shall be collected during typical conditions experienced during the season being counted. For example, summer counts shall be collected when school is not in session in an area with a traditional school calendar as schools are not in session most of the summer season. Counts collected while school is in session under these circumstances shall not be accepted. Vendors shall contact the requestor in advance of collection if they are unsure of which conditions are appropriate for an area.
- d. Vendors shall schedule collection of counts outside of events that have a widespread impact in an area (e.g. State Fair, Azalea Festival, NASCAR races).
- e. Counts shall not be collected on holidays or days associated with a holiday weekend (e.g. Friday, Saturday, and Sunday on Memorial Day weekend).
- f. Counts shall not be collected the week of the 4th of July holiday, the week of Thanksgiving holiday, and the two weeks of the Christmas and New Year's Day holidays. This includes the weekend days on either end of these weeks (if applicable).
- g. Due to the extended period of the seasonal study process, changes may occur in an area causing shifts in travel not related to seasonal variation (e.g. new long term construction detours, new routes opening). Vendors shall notify the requestor when this occurs in an area prior to data collection for the next season. The requestor may discontinue data collection on some or all locations within a study group depending on the nature of the changes.
- 5. Vendor shall supply the requestor with a schedule of the data collection for each season (i.e. study counts are planned to be collected between Date A and Date B) in advance of actual data collection for the requestor's review and approval (this can be done by email).
- 6. Collect for one hundred twenty (120) continuous hours to include twenty-four (24) hours of data for each of Wednesday, Thursday, Friday, Saturday, and Sunday.
- 7. Data collection equipment shall not be installed in any work zones, unless specifically requested.
- 8. Data shall be collected where traffic flow is steady, preferably at least one thousand (1,000) feet from any road or ramp junction. On shorter length segments, counters should be installed mid-block away from higher volume driveways and, if necessary, counters may be staggered by direction to avoid queuing traffic from traffic signals.
- 9. Collect by direction in one (1) hour increments.
- Volume counts collected using equipment with axle-based sensing technology shall be reported in axle pairs (2 axle detections = 1 count). Counts collected with equipment using vehicle-based sensing technology shall be reported as collected.
- 11. Site and equipment selection is performed by the vendor during the first season a location is counted. All counts collected in subsequent seasons shall be collected at the same site using the same type of equipment as used in the first season.

- 12. Data collection at locations may be discontinued due to changes in conditions at that location that cause changes in travel unrelated to seasonal variation. An entire study may be discontinued if an area experiences a major event that impacts travel for an extended period (e.g. flooding). Due to the extended period of the study and the potential for changes occurring, the vendor shall:
 - a. Submit a general schedule by email of the weeks planned for collection of a study group two weeks prior to the start of the season being counted; the requestor may direct the vendor to adjust the schedule due to specific conditions that occur in a study area. The schedule provided in this item shall supersede the general sixty (60) day requirement (see Item 4b, above).
 - b. Collect data at each site at the same location as collected in the first season for all subsequent seasons.
 - c. Contact the requestor by email if a minor shift in location is required for a location prior to data collection indicating the original and proposed locations and the reason for the shift; in general minor shifts may be accepted if no major intersections/junctions or driveways are between the original and proposed locations; all shifts must be approved by the requestor prior to data collection at the shifted location.
 - d. Discontinue data collection at a location in all subsequent seasons if data could not be collected in a season; the Vendor will be notified through email by the requestor if a data collection at a location has been discontinued.
- 13. Requestor shall assign a location identifier specific to individual locations (recurring locations) that is different from the count number so locations may be grouped for all four seasons counted.
- 14. Additional notes, requirements, and specifications:
 - a. All scheduling and location shift emails shall be submitted to the requestor (i.e. Data Systems Engineer with the Traffic Survey Group, Project Manager with the Mobility and Safety Division, etc.). A response should be provided within one (1) week of the email submittal date. Vendors shall not proceed with data collection until receiving notification from the requestor for each email submitted.
 - b. A study group may have additional counts required in addition to the standard four (4) seasonal counts. For example, a county located in the mountain region may have two (2) sets of counts collected in the fall season. A set of counts may be collected during the peak fall colors when travel is highest and a second set of counts outside that time period within the same season. The requestor will discuss the logistics of conducting the additional counts with the Vendor prior to assignment of the study group.
 - c. Due to the variable amount of work associated with a Seasonal Study Group and the potential for discontinuing collection on some locations, vendors shall provide a per count quote. Vendors shall be paid for counts as they are collected each season. Vendors shall not be paid for counts collected at discontinued locations or that do not meet the requirements specified above.
 - d. The requestor may cancel some or all data collection for a Seasonal Study Group at any point during the study period. The Vendor will be notified by the requestor through email if a study group has been cancelled. Vendors shall be paid for all counts collected meeting the requirements specified above through the cancellation date including those counts in progress at the time of the notification.
- 15. Supply collected data, for each location (station) within a study group, as follows:

- a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, and volume count data by direction in 1-hour increments with daily totals and daily AM/PM peak hours. The count number and location identifier shall be indicated on each page of the document.
- b. Raw volume data in an electronic format using a spreadsheet provided by the NCDOT.
- c. Video data in an electronic format, if requested to upload the videos it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.
- 16. Supply collected data <u>for each study group</u>, as defined above, in a spreadsheet providing raw daily volume summary data in tabular format with the following fields:
 - a. StationID: Requestor assigned location (station) identifier for the count location
 - b. Season: The NCDOT season for which the data was collected
 - c. Start Date: The date for the Wednesday volume count
 - d. Wednesday: Two-way total daily volume for the Wednesday 24-hour count
 - e. Thursday: Two-way total daily volume for the Thursday 24-hour count
 - f. Friday: Two-way total daily volume for the Friday 24-hour count
 - g. Saturday: Two-way total daily volume for the Saturday 24-hour count
 - h. Sunday: Two-way total daily volume for the Sunday 24-hour count
 - i. Remarks: A brief summary of any unusual conditions observed at the count location (station) during the period of data collection

NOTE - locations that have seasonal counts collected in each season will have four (4) records in this table, one for each season counted, when the seasonal study is completed. Locations that are discontinued will have records for those seasonal counts that were collected. The Vendor shall submit this spreadsheet to the requestor each time a set of seasonal counts are completed. The spreadsheet shall be submitted to the requestor within two (2) weeks of completion of the last count collected for a season.

5.22 GENERAL TRAFFIC DATA

General traffic data is the collection of traffic data of a previously unforeseen type not otherwise included in these specifications. Vendors shall provide a person-hour quote if bidding on this item, and payment shall be made in a mutually agreed upon total of person-hours for a given request. The following items shall be mutually agreed upon between the requestor and the vendor prior to the collection of the traffic data for each request:

- 1. Definition of the traffic data needed and post collection deliverables.
- 2. Location(s), duration, increments, start time, and end time of the data collection. A specific day or days may also be agreed upon.
- 3. Total person-hours required to do the work for each request to include travel time, processing time, time on site, etc.
- 4. Additional detailed guidance for data (explanations, definitions, spreadsheet, flow chart, examples, etc.) shall be provided by the requestor as needed.
- 5. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, and traffic data in the agreed upon format.
 - b. Raw data in an electronic format (Excel spreadsheet or other defined format).

c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*" located on the NCDOT Traffic Data Collection Request System.

5.23 MANUAL CLASSIFICATION DATA

Classification data is collected to determine the types (classes) of motor vehicles, bicyclists and/or pedestrians at a location. Manual classification data is usually collected when intrusive automated equipment cannot be installed in travel lanes (such as due to safety issues, will not count correctly due to poor traffic flow conditions, etc.). Manual classification data may be collected by direct observation (all manual) or a combination of direct observation and non-intrusive automated equipment (mixed manual – collected concurrently). The Vendor shall collect and compile classification data as follows:

- 1. Collect for fourteen (14) hours (6:00 a.m. through 8:00 p.m., unless otherwise specified).
- 2. Collect by direction in fifteen (15) minute increments.
- 3. Classification will follow one of the following two (2) options:

Option A – NCDOT 4 Class Scheme (default option)

- PV (FHWA classes 1, 2, 3)
- DUALS (FHWA classes 4, 5, 6, 7)
- TTST (FHWA classes 8, 9, 10)
- TWINS (FHWA classes 11, 12, 13)

Option B – Traditional Classes

- Pedestrians
- Long combination vehicles (five or more axles, including trailers)
- Dump trucks and 3-axle/4-axle trucks
- HAZMAT vehicles (tanker trucks, etc.)
- Trucks (generalized vehicles with 3 or more axles)

- Emergency Vehicles (police, fire, EMS shall have lights and/or sirens activated)
- Bicycles
- Mopeds/Scooters
- School buses
- Motorcycles
- Transit buses
- Truck tractors with twin trailers
- Truck tractors with 53' trailers
- 4. Supply collected data, as follows:
 - a. Data collection reports in one PDF document consisting of a cover sheet with site data, photographs, classification data by direction in 15-minute increments, AM and PM peak hour summaries, peak directional (D) percentage, class summaries by direction, total volumes by direction, percent distribution by class by direction.
 - b. Raw classification data showing individual data points in an electronic spreadsheet format. If non-intrusive equipment (electronic count boards, side fire radar, etc.) is used (i.e. mixed manual) then the export files from the equipment should also be included.
- c. If a video was requested, it will be uploaded to the link called "*Vendor Video Upload*' located on the NCDOT Traffic Data Collection Request System.

5.24 CONTRACT CHANGES

Contract changes, if any, over the life of the contract shall be implemented by contract amendments agreed to in writing by the State and Vendor.

Attachments to this IFB begin on the next page.

ATTACHMENT A: PRICING FORM

Vendor shall enter price amounts only for items they are bidding. Vendors shall not be considered for any item left blank. Amounts shall be in whole U.S. dollars. Items containing amounts other than whole U.S. dollars shall not be considered for award.

Region:	A	В	С	D
Divisions:	1, 2, 3	4, 5, 6, 7, 8	9, 10, 12	11, 13, 14
	Turning Moveme	ent Data – Standard Sing	le Point Junction	
Per Location				
	Mixed Dat	ta – Standard Multi-Poin	t Junction	
Per Location				
	Mixed Data – Co	mplex Junction (Origina	tion/Destination)	
Per Location				
	Volume/Speed/Class I	Data – Single Location, T	wo (2) Through Lanes	
48 Hours				
168 hours (7 days)				
v	olume/Speed/Class Data	a – Single Location, Mul	ti-Lane (>2 through lane	s)
48 Hours				
168 hours (7 days)				
Volume/Speed/	Class Data (groups of <	= 25 at-grade railroad cr	ossings) – one amount f	or entire group
48 hours				
	Sr	oot Speed (Free Flow) Da	ata	
4 hours				
24 hours				
		Delay Data		
Per Approach				
		Gap Data		
2 hours				
16 hours				
	5	Saturation Flow Rate Dat	a	
Per Approach				
		Travel Time Data		
2 hours				
48 hours				
168 hours (7 days)				
		School Operations Data		
Per Entrance				
	Pedes	strian Corridor Data (per	zone)	
13 hours				
24 hours				
48 hours				

Continued on next page...

Region:	Α	В	С	D
Divisions:	1, 2, 3	4, 5, 6, 7, 8	9, 10, 12	11, 13, 14
		Compliance Data		
13 hours				
24 hours				
48 hours				
168 hours (7 days)				
	Volun	ne/Class Data (non-moto	orists)	
168 hours (7 days)				
	l l	Vehicle Occupancy Data	l	
13 hours				
		Video (Ground)		
12 hours				
24 hours				
48 hours				
168 hours (7 days)				
		Video (Aerial)		
12 hours				
24 hours				
48 hours				
168 hours (7 days)				
		Queue Data		
Per Approach				
	Volume Only D	ata (Motor Vehicles) – S	ingle Location	
48 hours				
120 hours (5 days)				
168 hours (7 days)				
Volume Only Data (Mo	tor Vehicles) – Seasona	I Study Group (groups o	of <= 50 locations, <u>bid a</u>	mount is per location)
Per Location				
		General Traffic Data		
Per Person Hour				
	Μ	anual Classification Dat	a	
14 Hours				

ATTACHMENT B: LOCATION OF WORKERS UTILIZED BY VENDOR

The Vendor shall detail the location(s) at which performance will occur, as well as the manner in which it intends to utilize resources or workers outside of the United States in the performance of this Contract. The State will evaluate the additional risks, costs, and other factors associated with such utilization prior to making an award. Please complete items a, b, and c below.

a)	Nill any work under this Contract be performed outside the United States?	
----	---	--

If the Vendor answered "YES" above, Vendor shall complete items 1 and 2 below:

- 1. List the location(s) outside the United States where work under this Contract will be performed by the Vendor, any sub-Contractors, employees, or other persons performing work under the Contract:
- 2. Describe the corporate structure and location of corporate employees and activities of the Vendor, its affiliates or any other sub-Contractors that will perform work outside the U.S.:

b)	The Vendor agrees to provide notice, in writing to the State, of the relocation of the	
	Vendor, employees of the Vendor, sub-Contractors of the Vendor, or other persons	🗌 YES 🗌 NO
	performing services under the Contract outside of the United States	

NOTE: All Vendor or sub-Contractor personnel providing call or contact center services to the State of North Carolina under the Contract **shall** disclose to inbound callers the location from which the call or contact center services are being provided.

c) Identify all U.S. locations at which performance will occur:

This Space is Intentionally Left Blank

ATTACHMENT C: INSTRUCTIONS TO VENDORS

- 1. <u>READ, REVIEW AND COMPLY</u>: It shall be the Vendor's responsibility to read this entire document, review all enclosures and attachments, and any addenda thereto, and comply with all requirements specified herein, regardless of whether appearing in these Instructions to Vendors or elsewhere in this IFB document.
- 2. <u>LATE BIDS</u>: Late bids, regardless of cause, will not be opened or considered, and will automatically be disqualified from further consideration. It shall be the Vendor's sole responsibility to ensure delivery at the designated office by the designated time.
- 3. <u>ACCEPTANCE AND REJECTION</u>: The State reserves the right to reject any and all bids, to waive any informality in bids and, unless otherwise specified by the Vendor, to accept any item in the bid. If either a unit price or an extended price is obviously in error and the other is obviously correct, the incorrect price will be disregarded.
- 4. <u>BASIS FOR REJECTION</u>: The State reserves the right to reject any and all offers, in whole or in part, by deeming the offer unsatisfactory as to quality or quantity, delivery, price or service offered, non-compliance with the requirements or intent of this solicitation, lack of competitiveness, error(s) in specifications or indications that revision would be advantageous to the State, cancellation or other changes in the intended project or any other determination that the proposed requirement is no longer needed, limitation or lack of available funds, circumstances that prevent determination of the best offer, or any other determination that rejection would be in the best interest of the State.
- 5. <u>EXECUTION</u>: Failure to sign the Execution page (page 3 of the IFB) in the indicated space will render bid non-responsive, and it shall be rejected.
- 6. ORDER OF PRECEDENCE: In cases of conflict between specific provisions in this solicitation or in any resulting contract, the order of precedence shall be (high to low) (1) any special terms and conditions specific to this IFB, including any negotiated terms; (2) requirements and specifications in Sections 2, 4, and 5 of this IFB; (3) North Carolina General Contract Terms and Conditions in ATTACHMENT D: GENERAL CONTRACT TERMS AND CONDITIONS; (4) Instructions in ATTACHMENT C: INSTRUCTIONS TO VENDORS; and (5) Vendor's Bid.
- 7. INFORMATION AND DESCRIPTIVE LITERATURE: Vendor shall furnish all information requested and in the spaces provided in this document. Further, if required elsewhere in this bid, each Vendor shall submit with their bid sketches, descriptive literature and/or complete specifications covering the products offered. Reference to literature submitted with a previous bid or available elsewhere will not satisfy this provision. Bids that do not comply with these requirements shall constitute sufficient grounds to reject the bid.
- 8. <u>RECYCLING AND SOURCE REDUCTION</u>: It is the policy of the State to encourage and promote the purchase of products with recycled content to the extent economically practicable, and to purchase items which are reusable, refillable, repairable, more durable and less toxic to the extent that the purchase or use is practicable and cost-effective. We also encourage and promote using minimal packaging and the use of recycled/recyclable products in the packaging of commodities purchased. However, no sacrifice in quality of packaging will be acceptable. The company remains responsible for providing packaging that will adequately protect the commodity and contain it for its intended use. Companies are strongly urged to bring to the attention of purchasers those products or packaging they offer which have recycled content and that are recyclable.
- **9.** <u>SUSTAINABILITY</u>: To support the sustainability efforts of the State of North Carolina we solicit your cooperation in this effort. Pursuant to Executive Order 156 (1999), it is desirable that all responses meet the following:
 - All copies of the bid are printed <u>double sided</u> except for (1) the ID Number page (Federal ID Number or Social Security Number) and (2) ATTACHMENT F (the Experience Rate Modifier page).
 - All submittals and copies are printed on recycled paper with a minimum post-consumer content of 30%.
 - Unless absolutely necessary, all bids and copies should minimize or eliminate use of non-recyclable or non-reusable materials such as plastic report covers, plastic dividers, vinyl sleeves, and GBC binding. Three-ringed binders, glued materials, paper clips, and staples are acceptable.
 - Materials should be submitted in a format which allows for easy removal, filing and/or recycling of paper and

binder materials. Use of oversized paper is strongly discouraged unless necessary for clarity or legibility.

- 10. <u>PRINCIPAL PLACE OF BUSINESS</u>: The "Principal Place of Business" is defined as that principal place from which the trade or business of the Vendor is directed or managed.
- 11. <u>CONFIDENTIAL INFORMATION</u>: To the extent permitted by applicable statutes and rules, the State will maintain confidential trade secrets that the Vendor does not wish disclosed. As a condition to confidential treatment, each page containing trade secret information shall be identified in boldface at the top and bottom as "CONFIDENTIAL" by the Vendor, with specific trade secret information enclosed in boxes or similar indication. Cost information shall not be deemed confidential under any circumstances. Regardless of what a Vendor may label as a trade secret, the determination whether it is or is not entitled to protection will be determined in accordance with G.S. 132-1.2. Any material labeled as confidential constitutes a representation by the Vendor that it has made a reasonable effort in good faith to determine that such material is, in fact, a trade secret under G.S. 132-1.2. Vendors are urged and cautioned to limit the marking of information as a trade secret or as confidential so far as is possible.
- 12. <u>PROTEST PROCEDURES</u>: Unless otherwise allowed by the Engineer, any formal protest to any proposed bid shall be made in writing (e-mail is acceptable) to the Engineer for the project within five (5) days of bid opening and shall clearly indicate that it is a "bid protest". The protest must list each item that the protester believes is grounds for rendering a bid defective. The Engineer will evaluate the protest and determine, in his/her discretion, whether any further action should be taken. Further action may consist of, but not be limited to, seeking additional information and/or clarification from any and all bidders regarding the alleged complaint/protest, rejecting any or all bids, finding any or all bids irregular, finding any or all bidders "not responsible", holding a possible informal meeting to discuss the protest, or other actions in the discretion of the Engineer. After further evaluation the Engineer will notify the protesting party what further action, if any, will be taken with regard to the protest. All awards are final and are not subject to further review. Bid status and award notices are posted on the Internet at https://www.ips.state.nc.us/ips/.
- **13.** <u>MISCELLANEOUS</u>: Masculine pronouns shall be read to include feminine pronouns, and the singular of any word or phrase shall be read to include the plural and vice versa.
- 14. <u>COMMUNICATIONS BY VENDORS</u>: In submitting its bid, the Vendor agrees not to discuss or otherwise reveal the contents of its bid to any source, government or private, outside of the using or issuing agency until after the award of the Contract or cancellation of this IFB. All Vendors are forbidden from having any communications with the using or issuing agency, or any other representative of the State concerning the solicitation, during the evaluation of the bids (i.e., after the public opening of the bids and before the award of the Contract), unless the State directly contacts the Vendor(s) for purposes of seeking clarification or another reason permitted by the solicitation. A Vendor shall not: (a) transmit to the issuing and/or using agency any information commenting on the ability or qualifications of any other Vendor to provide the advertised good, equipment, commodity; (b) identify defects, errors and/or omissions in any other communication or conduct that could influence the evaluation and/or award of the Contract that is the subject of this IFB. Vendors not in compliance with this provision may be disqualified, at the option of the State, from the Contract award. Only those communications with the using agency or issuing agency authorized by this IFB are permitted.
- 15. <u>TABULATIONS</u>: Bid tabulations can be electronically retrieved at the Interactive Purchasing System (IPS), <u>https://www.ips.state.nc.us/ips/BidNumberSearch.aspx</u>. Click on the IPS BIDS icon, click on Search for Bid, enter the bid number, and then search. Lengthy or complex tabulations may be summarized, with other details not made available on IPS, and requests for additional details or information concerning such tabulations cannot be honored.

- 16. VENDOR REGISTRATION AND SOLICITATION NOTIFICATION SYSTEM: The North Carolina electronic Vendor Portal (eVP) allows Vendors to electronically register free with the State to receive electronic notification of current procurement opportunities for goods and services of potential interests to them available on the Interactive Purchasing System, as well as notifications of status changes to those solicitations. Online registration and other purchasing information is available at the following website https://www.ips.state.nc.us/.
- 17. <u>WITHDRAWAL OF BID</u>: A bid may be withdrawn only in writing and actually received by the office issuing the IFB prior to the time for the opening of bids identified on the cover page of this IFB (or such later date included in an Addendum to the IFB). A withdrawal request shall be on Vendor's letterhead and signed by an official of the Vendor authorized to make such request. Any withdrawal request made after the opening of bids shall be allowed only for good cause shown and in the sole discretion of the State
- **18.** <u>INFORMAL COMMENTS</u>: The State shall not be bound by informal explanations, instructions or information given at any time by anyone on behalf of the State during the competitive process or after award. The State is bound only by information provided in this IFB and in formal Addenda issued through IPS.
- <u>COST FOR BID PREPARATION</u>: Any costs incurred by Vendor in preparing or submitting bids are the Vendor's sole responsibility; the State of North Carolina will not reimburse any Vendor for any costs incurred prior to award.
- 20. <u>VENDOR'S REPRESENTATIVE</u>: Each Vendor shall submit with its bid the name, address, and telephone number of the person(s) with authority to bind the firm and answer questions or provide clarification concerning the firm's bid.
- 21. <u>INSPECTION AT VENDOR'S SITE</u>: The State reserves the right to inspect, at a reasonable time, the equipment/item, plant or other facilities of a prospective Vendor prior to Contract award, and during the Contract term as necessary for the State determination that such equipment/item, plant or other facilities conform with the specifications/requirements and are adequate and suitable for the proper and effective performance of the Contract.

This Space is Intentionally Left Blank

ATTACHMENT D: GENERAL CONTRACT TERMS & CONDITIONS

1. DEFAULT AND PERFORMANCE BOND: If, through any cause, Vendor shall fail to fulfill in timely and proper manner the obligations under this contract, the State shall have the right to terminate this contract by giving written notice to the Vendor and specifying the effective date thereof. In that event, all finished or unfinished deliverable items under this contract prepared by the Vendor shall, at the option of the State, become its property, and the Vendor shall be entitled to receive just and equitable compensation for any acceptable work completed on such materials. Notwithstanding, Vendor shall not be relieved of liability to the State for damages sustained by the State by virtue of any breach of this contract, and the State may withhold any payment due the Vendor for the purpose of setoff until such time as the exact amount of damages due the State from such breach can be determined. The State reserves the right to require at any time a performance bond or other acceptable alternative performance guarantees from a Vendor without expense to the State.

In addition, in the event of default by the Vendor under this contract, or upon the Vendor filing a petition for bankruptcy or the entering of a judgment of bankruptcy by or against the Vendor, the State may immediately cease doing business with the Vendor, immediately terminate this contract for cause, and may act to debar the Vendor from doing future business with the State.

2. <u>GOVERNMENTAL RESTRICTIONS</u>: In the event any Governmental restrictions are imposed which necessitate alteration of the material, quality, workmanship or performance of the items offered prior to their delivery, it shall be the responsibility of the Vendor to notify, in writing, the Contract Lead at once, indicating the specific regulation which required such alterations. The State reserves the right to accept any such alterations, including any price adjustments occasioned thereby, or to cancel the Contract.

3. STANDARD SPECIAL PROVISIONS:

AVAILABILITY OF FUNDS – TERMINATION OF CONTRACTS

(5-20-08)

Z-2

General Statute 143C-6-11. (h) Highway Appropriation is hereby incorporated verbatim in this contract as follows:

(h) Amounts Encumbered. – Transportation project appropriations may be encumbered in the amount of allotments made to the Department of Transportation by the Director for the estimated payments for transportation project contract work to be performed in the appropriation fiscal year. The allotments shall be multiyear allotments and shall be based on estimated revenues and shall be subject to the maximum contract authority contained in *General Statute 143C-6-11(c)*. Payment for transportation project work performed pursuant to contract in any fiscal year other than the current fiscal year is subject to appropriations by the General Assembly. Transportation project contracts shall contain a schedule of estimated completion progress, and any acceleration of this progress shall be subject to the approval of the Department of Transportation project contract, and any transportation project contract shall be so terminated or suspended if funds will not be available for payment of the work to be performed during that fiscal year pursuant to the contract. In the event of termination of any contract, the contractor shall be given a written notice of termination at least 60 days before completion of scheduled work for which funds are available. In the event of termination, the contractor shall be paid for the work already performed in accordance with the contract specifications.

Payment will be made on any contract terminated pursuant to the special provision in accordance with Subarticle 108-13(E) of the *2018 Standard Specifications*.

4. **TAXES:** Any applicable taxes shall be invoiced as a separate item.

All agencies participating in this Contract are exempt from Federal Taxes, such as excise and transportation. Exemption forms submitted by the Vendor will be executed and returned by the using agency.

b. Prices offered are not to include any personal property taxes, nor any sales or use tax (or fees) unless required by the North Carolina Department of Revenue.

- 5. <u>SITUS</u>: The place of this Contract, its situs and forum, shall be North Carolina, where all matters, whether sounding in Contract or tort, relating to its validity, construction, interpretation and enforcement shall be determined.
- 6. <u>GOVERNING LAWS</u>: This Contract is made under and shall be governed, construed and enforced in accordance with the laws of the State of North Carolina, without regard to is conflict of laws rules.
- 7. <u>PAYMENT TERMS</u>: Payment terms are Net not later than 30 days after receipt of correct invoice or acceptance of goods, whichever is later. The using agency is responsible for all payments to the Vendor under the Contract. Payment by some agencies may be made by procurement card, if the Vendor accepts that card (Visa, MasterCard, etc.) from other customers, and it shall be accepted by the Vendor for payment under the same terms and conditions as any other method of payment accepted by the Vendor. If payment is made by procurement card, then payment may be processed immediately by the Vendor.
- 8. <u>AFFIRMATIVE ACTION</u>: The Vendor will take affirmative action in complying with all Federal and State requirements concerning fair employment and employment of people with disabilities, and concerning the treatment of all employees without regard to discrimination by reason of race, color, religion, sex, national origin or disability.
- 9. <u>INTELLECTUAL PROPERTY INDEMNITY</u>: Vendor shall hold and save the State, its officers, agents and employees, harmless from liability of any kind, including costs and expenses, resulting from infringement of the rights of any third party in any copyrighted material, patented or unpatented invention, articles, device or appliance delivered in connection with this contract.
- 10. <u>TERMINATION FOR CONVENIENCE</u>: If this contract contemplates deliveries or performance over a period of time, the State may terminate this contract at any time by providing seven (7) days' notice in writing from the State to the Vendor. In that event, all finished or unfinished deliverable items prepared by the Vendor under this contract shall, at the option of the State, become its property. If the contract is terminated by the State as provided in this section, the State shall pay for services satisfactorily completed by the Vendor, less any payment or compensation previously made.
- 11. <u>ADVERTISING</u>: Vendor agrees not to use the existence of this Contract or the name of the State of North Carolina as part of any commercial advertising or marketing of products or services. A Vendor may inquire whether the State is willing to act as a reference by providing factual information directly to other prospective customers.
- 12. <u>ACCESS TO PERSONS AND RECORDS</u>: During and after the term hereof, the State Auditor and any using agency's internal auditors shall have access to persons and records related to this Contract to verify accounts and data affecting fees or performance under the Contract.

13. <u>ASSIGNMENT</u>: No assignment of the Vendor's obligations nor the Vendor's right to receive payment hereunder shall be permitted.

However, upon written request approved by the issuing purchasing authority and solely as a convenience to the Vendor, the State may:

- a. Forward the Vendor's payment check directly to any person or entity designated by the Vendor, and
- b. Include any person or entity designated by Vendor as a joint payee on the Vendor's payment check.

In no event shall such approval and action obligate the State to anyone other than the Vendor and the Vendor shall remain responsible for fulfillment of all Contract obligations. Upon advance written request, the State may, in its unfettered discretion, approve an assignment to the surviving entity of a merger, acquisition or corporate reorganization, if made as part of the transfer of all or substantially all of the Vendor's assets. Any purported assignment made in violation of this provision shall be void and a material breach of this Contract.

14. INSURANCE:

COVERAGE - During the term of the Contract, the Vendor at its sole cost and expense shall provide commercial insurance of such type and with such terms and limits as may be reasonably associated with the Contract. As a minimum, the Vendor shall provide and maintain the following coverage and limits:

a. <u>Worker's Compensation</u> - The Vendor shall provide and maintain Worker's Compensation Insurance, as required by the laws of North Carolina, as well as employer's liability coverage with minimum limits of \$500,000.00, covering all of Vendor's employees who are engaged in any work under the Contract. If any work is sub-contracted, the Vendor shall require the sub-Contractor to provide the same coverage for any of his employees engaged in any work under the Contract.

b. <u>Commercial General Liability</u> - General Liability Coverage on a Comprehensive Broad Form on an occurrence basis in the minimum amount of \$500,000.00 Combined Single Limit. (Defense cost shall be in excess of the limit of liability.). If any work is sub-contracted, the Vendor shall require the sub-Contractor to provide the same coverage for any work under the Contract.

c. <u>Automobile</u> - Automobile Liability Insurance, to include liability coverage, covering all owned, hired and non-owned vehicles, used in connection with the Contract. The minimum combined single limit shall be \$250,000.00 bodily injury and property damage; \$250,000.00 uninsured/under insured motorist; and \$2,500.00 medical payment. If any work is sub-contracted, the Vendor shall require the sub-Contractor to provide the same coverage for any of the sub-Contractor's vehicles engaged in any work under the Contract, if the sub-Contractor uses vehicles in connection with this Contract.

REQUIREMENTS - Providing and maintaining adequate insurance coverage is a material obligation of the Vendor and is of the essence of this Contract. All such insurance shall meet all laws of the State of North Carolina. Such insurance coverage shall be obtained from companies that are authorized to provide such coverage and that are authorized by the Commissioner of Insurance to do business in North Carolina. The Vendor shall at all times comply with the terms of such insurance policies, and all requirements of the insurer under any such insurance policies, except as they may conflict with existing North Carolina laws or this Contract. The limits of coverage under each insurance policy maintained by the Vendor shall not be interpreted as limiting the Vendor's liability and obligations under the Contract.

- 15. <u>GENERAL INDEMNITY</u>: The Vendor shall hold and save the State, its officers, agents, and employees, harmless from liability of any kind, including all claims and losses accruing or resulting to any other person, firm, or corporation furnishing or supplying work, services, materials, or supplies in connection with the performance of this Contract, and from any and all claims and losses accruing or resulting to any person, firm, or corporation that may be injured or damaged by the Vendor in the performance of this Contract and that are attributable to the negligence or intentionally tortious acts of the Vendor provided that the Vendor is notified in writing within 30 days that the State has knowledge of such claims. The Vendor represents and warrants that it shall make no claim of any kind or nature against the State's agents who are involved in the delivery or processing of Vendor goods to the State. The representation and warranty in the preceding sentence shall survive the termination or expiration of this Contract.
- **16.** <u>COMPLIANCE WITH LAWS</u>: Vendor shall comply with all laws, ordinances, codes, rules, regulations, and licensing requirements that are applicable to the conduct of its business and its performance in accordance with this contract, including those of federal, state, and local agencies having jurisdiction and/or authority.
- 17. <u>ENTIRE AGREEMENT</u>: This IFB and any documents incorporated specifically by reference represent the entire agreement between the parties and supersede all prior oral or written statements or agreements. This IFB, any Addenda hereto, and the Vendor's bid are incorporated herein by reference as though set forth verbatim.

All promises, requirements, terms, conditions, provisions, representations, guarantees, and warranties contained herein shall survive the contract expiration or termination date unless specifically provided otherwise herein, or unless superseded by applicable Federal or State statutes of limitation.

- **18.** <u>AMENDMENTS</u>: This contract may be amended only by a written amendment duly executed by the State and the Vendor.
- 19. <u>WAIVER</u>: The failure to enforce or the waiver by the State of any right or an event of breach or default on one occasion or instance shall not constitute the waiver of such right, breach or default on any subsequent occasion or instance.
- 20. FORCE MAJEURE: Neither party shall be deemed to be in default of its obligations hereunder if and so long as it is prevented from performing such obligations as a result of events beyond its reasonable control, including without limitation, fire, power failures, any act of war, hostile foreign action, nuclear explosion, riot, strikes or failures or refusals to perform under subcontracts, civil insurrection, earthquake, hurricane, tornado, or other catastrophic natural event or act of God.
- 21. <u>SOVEREIGN IMMUNITY</u>: Notwithstanding any other term or provision in this contract, nothing herein is intended nor shall be interpreted as waiving any claim or defense based on the principle of sovereign immunity that otherwise would be available to the State under applicable law.

ATTACHMENT E: EXECUTION OF BID NON-COLLUSION, DEBARMENT AND GIFT BAN CERTIFICATION

EXECUTION OF BID NON-COLLUSION, DEBARMENT AND GIFT BAN CERTIFICATION CORPORATION

The prequalified bidder being duly sworn, solemnly swears (or affirms) that neither he, nor any official, agent or employee has entered into any agreement, participated in any collusion, or otherwise taken any action which is in restraint of free competitive bidding in connection with any bid or contract, that the bidder has not been convicted of violating *N.C.G.S.* §133-24 within the last three years, and that the bidder intends to do the work with his own bona fide employees or subcontractors and will not bid for the benefit of another contractor.

By submitting this non-collusion, debarment and gift ban certification, the Contractor is attesting his status under penalty of perjury under the laws of the United States in accordance with the Debarment Certification attached, provided that the Debarment Certification also includes any required statements concerning exceptions that are applicable.

N.C.G.S. §133-32 and Executive Order 24 prohibit the offer to, or acceptance by, any State Employee of any gift from anyone with a contract with the State, or from any person seeking to do business with the State. By execution of any response in this procurement, you attest, for your entire organization and its employees or agents, that you are not aware that any such gift has been offered, accepted, or promised by any employees of your organization.

SIGNATURE OF PREQUALIFIED BIDDER

	Full name	of Co	rporation
	Address a	as Pre	qualified
Attest	Secretary/Assistant Secretary (Select appropriate title)	_ Ву	President/Vice President/Assistant Vice (Select appropriate title)
	Print or type Signer's name		Print or type Signer's name

CORPORATE SEAL

NON-COLLUSION, AFFADAVIT, DEBARMENT AND GIFT BAN CERTIFICATION

PARTNERSHIP

The prequalified bidder, being duly sworn, solemnly swears (or affirms) that neither he, nor any official, agent or employee has entered into any agreement, participated in any collusion, or otherwise taken any action which is in restraint of free competitive bidding in connection with any bid or contract, that the bidder has not been convicted of violating *N.C.G.S.* § 133-24 within the last three years, and that the bidder intends to do the work with its own bona fide employees or subcontractors and will not bid for the benefit of another contractor.

By submitting this non-collusion, debarment and gift ban certification, the Contractor is attesting his status under penalty of perjury under the laws of the United States in accordance with the Debarment Certification attached, provided that the Debarment Certification also includes any required statements concerning exceptions that are applicable.

N.C.G.S. § 133-32 and Executive Order 24 prohibit the offer to, or acceptance by, any State Employee of any gift from anyone with a contract with the State, or from any person seeking to do business with the State. By execution of any response in this procurement, you attest, for your entire organization and its employees or agents, that you are not aware that any such gift has been offered, accepted, or promised by any employees of your organization.

SIGNATURE OF PREQUALIFIED BIDDER

	Full Name of Partnership	
	Address as Prequalified	
Signature of Witness	Signature	of Partner
Print or Type Signer's Name	Print or Type S	igner's Name

NON-COLLUSION AFFADAVIT, DEBARMENT AND GIFT BAN CERTIFICATION

LIMITED LIABILITY COMPANY

The prequalified bidder, being duly sworn, solemnly swears (or affirms) that neither he, nor any official, agent or employee has entered into any agreement, participated in any collusion, or otherwise taken any action which is in restraint of free competitive bidding in connection with any bid or contract, that the bidder has not been convicted of violating *N.C.G.S.* § 133-24 within the last three years, and that the bidder intends to do the work with its own bona fide employees or subcontractors and will not bid for the benefit of another contractor.

By submitting this non-collusion, debarment and gift ban certification, the Contractor is attesting his status under penalty of perjury under the laws of the United States in accordance with the Debarment Certification attached, provided that the Debarment Certification also includes any required statements concerning exceptions that are applicable.

N.C.G.S. § 133-32 and Executive Order 24 prohibit the offer to, or acceptance by, any State Employee of any gift from anyone with a contract with the State, or from any person seeking to do business with the State. By execution of any response in this procurement, you attest, for your entire organization and its employees or agents, that you are not aware that any such gift has been offered, accepted, or promised by any employees of your organization.

SIGNATURE OF PREQUALIFIED BIDDER

	Full Name of Firm
A	ddress as Prequalified
Signature of Witness	Signature of Member/Manager/Authorized Agent (Select appropriate Title)

Print or Type Signer's Name

Print or Type Signer's Name

NON-COLLUSION, DEBARMENT AND GIFT BAN CERTIFICATION

JOINT VENTURE (2) or (3)

The bidder, being duly sworn, solemnly swears (or affirms) that neither he, nor any official, agent or employee has entered into any agreement, participated in any collusion, or otherwise taken any action which is in restraint of free competitive bidding in connection with any bid or contract, that the bidder has not been convicted of violating *N.C.G.S. § 133-24* within the last three years, and that the bidder intends to do the work with its own bona fide employees or subcontractors and will not bid for the benefit of another contractor.

By submitting this non-collusion, debarment and gift ban certification, the Contractor is attesting his status under penalty of perjury under the laws of the United States in accordance with the Debarment Certification attached, provided that the Debarment Certification also includes any required statements concerning exceptions that are applicable.

N.C.G.S. § 133-32 and Executive Order 24 prohibit the offer to, or acceptance by, any State Employee of any gift from anyone with a contract with the State, or from any person seeking to do business with the State. By execution of any response in this procurement, you attest, for your entire organization and its employees or agents, that you are not aware that any such gift has been offered, accepted, or promised by any employees of your organization.

SIGNATURE OF PREQUALIFIED BIDDER

Instructions: **2** Joint Venturers Fill in lines (1), (2) and (3) and execute. **3** Joint Venturers Fill in lines (1), (2), (3) and (4) and execute. On Line (1), fill in the name of the Joint Venture Company. On Line (2), fill in the name of one of the joint venturers and execute below in the appropriate manner. On Line (3), print or type the name of the other joint venturer and execute below in the appropriate manner. On Line (4), fill in the name of the third joint venturer, if applicable and execute below in the appropriate manner.

		Name of Joint Venture	
		Name of Contractor	
_		Address as Prequalified	
	Signature of Witness or Attest	BY	Signature of Contractor
	Signatic of Willess of Allest		Signature of Contractor
	Print or Type Signer's Name		Print or Type Signer's Name
	If Corporation, affix Corporate Seal	AND	
		Name of Contractor	
		Address as Prequalified	
		BY	
	Signature of Witness or Attest		Signature of Contractor
	Print or Type Signer's Name		Print or Type Signer's Name
	If Corporation, affix Corporate Seal	AND	
		Name of Contractor	
		Address as Prequalified	
		BY	
	Signature of Witness or Attest		Signature of Contractor
	Print or Type Signer's Name		Print or Type Signer's Name
	If Corporation, affix Corporate Seal		

(1)

NON-COLLUSION, DEBARMENT AND GIFT BAN CERTIFICATION

INDIVIDUAL DOING BUSINESS UNDER A FIRM NAME

The bidder, being duly sworn, solemnly swears (or affirms) that neither he, nor any official, agent or employee has entered into any agreement, participated in any collusion, or otherwise taken any action which is in restraint of free competitive bidding in connection with any bid or contract, that the bidder has not been convicted of violating *N.C.G.S.* § 133-24 within the last three years, and that the bidder intends to do the work with its own bona fide employees or subcontractors and will not bid for the benefit of another contractor.

By submitting this non-collusion, debarment and gift ban certification, the Contractor is attesting his status under penalty of perjury under the laws of the United States in accordance with the Debarment Certification attached, provided that the Debarment Certification also includes any required statements concerning exceptions that are applicable.

N.C.G.S. § 133-32 and Executive Order 24 prohibit the offer to, or acceptance by, any State Employee of any gift from anyone with a contract with the State, or from any person seeking to do business with the State. By execution of any response in this procurement, you attest, for your entire organization and its employees or agents, that you are not aware that any such gift has been offered, accepted, or promised by any employees of your organization.

SIGNATURE OF PREQUALIFIED BIDDER

Name of Bidder

Trading and Doing Business As

Address as Prequalified

Signature of Witness

Print or Type Signer's Name

Signature of Bidder, Individual

Individual Name

Full name of Firm

Print or Type Signer's Name

NON-COLLUSION, DEBARMENT AND GIFT BAN CERTIFICATION

INDIVIDUAL DOING BUSINESS IN HIS OWN NAME

The bidder, being duly sworn, solemnly swears (or affirms) that neither he, nor any official, agent or employee has entered into any agreement, participated in any collusion, or otherwise taken any action which is in restraint of free competitive bidding in connection with any bid or contract, that the bidder has not been convicted of violating *N.C.G.S.* § 133-24 within the last three years, and that the bidder intends to do the work with its own bona fide employees or subcontractors and will not bid for the benefit of another contractor.

By submitting this non-collusion, debarment and gift ban certification, the Contractor is attesting his status under penalty of perjury under the laws of the United States in accordance with the Debarment Certification attached, provided that the Debarment Certification also includes any required statements concerning exceptions that are applicable.

N.C.G.S. § 133-32 and Executive Order 24 prohibit the offer to, or acceptance by, any State Employee of any gift from anyone with a contract with the State, or from any person seeking to do business with the State. By execution of any response in this procurement, you attest, for your entire organization and its employees or agents, that you are not aware that any such gift has been offered, accepted, or promised by any employees of your organization.

SIGNATURE OF PREQUALIFIED BIDDER

Name of Bidder

Print or Type Name

Address as Prequalified

Signature of Bidder, Individually

Print or type Signer's Name

Signature of Witness

Print or type Signer's name

ATTACHMENT F: DEBARMENT CERTIFICATION OF PREQUALIFIED BIDDER

Conditions for certification:

- 1. The prequalified bidder shall provide immediate written notice to the Department if at any time the bidder learns that his certification was erroneous when he submitted his debarment certification or explanation that is file with the Department, or has become erroneous because of changed circumstances.
- 2. The terms covered transaction, debarred, suspended, ineligible, lower tier covered transaction, participant, person, primary covered transaction, principal, proposal, and voluntarily excluded, as used in this provision, have the meanings set out in the Definitions and Coverage sections of the rules implementing Executive Order 12549. A copy of the Federal Rules requiring this certification and detailing the definitions and coverages may be obtained from the Contract Officer of the Department.
- 3. The prequalified bidder agrees by submitting this form that he will not knowingly enter into any lower tier covered transaction with a person who is debarred, suspended, declared ineligible, or voluntarily excluded from participation in NCDOT contracts, unless authorized by the Department.
- 4. For Federal Aid projects, the prequalified bidder further agrees that by submitting this form he will include the Federal-Aid Provision titled *Required Contract Provisions Federal-Aid Construction Contract (Form FHWA PR 1273)* provided by the Department, without subsequent modification, in all lower tier covered transactions.
- 5. The prequalified bidder may rely upon a certification of a participant in a lower tier covered transaction that he is not debarred, suspended, ineligible, or voluntarily excluded from the covered transaction, unless he knows that the certification is erroneous. The bidder may decide the method and frequency by which he will determine the eligibility of his subcontractors.
- 6. 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 provision. The knowledge and information of a participant is not required to exceed that which is normally possessed by a prudent person in the ordinary course of business dealings.
- 7. Except as authorized in paragraph 6 herein, the Department may terminate any contract if the bidder 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 by the Federal Government.

DEBARMENT CERTIFICATION

The prequalified bidder certifies to the best of his knowledge and belief, that he and his principals:

- a. Are not presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from covered transactions by any Federal department or agency;
- b. 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;
- c. 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 b. of this certification; and
- d. Have not within a three-year period preceding this proposal had one or more public transactions (Federal, State or local) terminated for cause or default.
- e. Will submit a revised Debarment Certification immediately if his status changes and will show in his bid proposal an explanation for the change in status.

If the prequalified bidder cannot certify that he is not debarred, he shall provide an explanation with this submittal. An explanation will not necessarily result in denial of participation in a contract.

Failure to submit a non-collusion affidavit and debarment certification will result in the bidder's bid being considered non-responsive.

Check here if an explanation is attached to this certification.

ATTACHMENT G: EXPERIENCE RATE MODIFIER (ERM)

*** CONFIDENTIAL ***

Name of current or potential contractor/vendor:

For internal State agency processing, please indicate your company's current Experience Rate Modifier (ERM) as determined by the insurer providing your worker's compensation insurance, the North Carolina Rate Bureau (NCRB), or the National Council on Compensation Insurance (NCCI).

Experience Rate Modifier eligibility for contracts with the North Carolina Department of Transportation is based solely in accordance with the Experience Rating Eligibility criteria set forth by the North Carolina Rate Bureau. No other State or Territorial criteria shall apply.

Pursuant to N.C.G.S. §58-36-16 the experience rate modifier shall not be released to the public. This page shall be kept confidential and shall not be made available for public inspection.

This form i	• •	actor/vendor desiring to perform work. and any subconsultants.
Enter most current ERM here:	- OR -	Not eligible for an ERM*
Check one of the following:	intrastate	interstate
Rating effective date:		

* Any contractor/vendor indicating they are not eligible for an Experience Rate Modifier in accordance with the criteria set forth by the North Carolina Rate Bureau (NCRB) shall submit written documentation from either the NCRB or their Worker's Compensation insurance carrier verifying that they are not eligible, and such documentation shall be provided on the letterhead of the NCRB or the insurance carrier, respectively.

Signature	Date
Printed Name	Title
	[This Form Must Be Signed]
	*** CONFIDENTIAL ***